

YEAR 1 REPORT | 2021

External Evaluation of the Texas Child Mental Health Care Consortium

Lara S. Savas, PhD, Program Evaluation Lead Co-PI
Melissa F. Peskin, PhD, Program Evaluation Lead Co-PI
David Lairson, PhD, Cost Analysis Lead
Belinda Hernandez, PhD, Implementation Science
Erica Frost, MPH, Program Manager
Robert Addy, PhD, Statistical Analysis
Jeanette Deason, MPH, Graduate Research Assistant
Rachel Farias, MPH, Graduate Research Assistant
Yijiong Yang, MHA, Graduate Research Assistant

*Center for Health Promotion & Prevention Research, University of Texas Health
Science Center at Houston (UTHealth) School of Public Health*

Quianta Moore, MD, JD, Rice University Lead
Jacquie Klotz, MA, Database Manager
Rice University's Baker Institute for Public Policy

Cynthia Walsh-Castado, PhD
Sylvia Epps, PhD
David Getman, PhD
Chelsea Whiting
Elenne Valladares.

Decision Information Resources, Inc.



This work was funded by the Texas Legislature and the Texas Child Mental Health Care Consortium.

TABLE OF CONTENTS

Executive Summary.....	1
A. Background	15
B. Formative Evaluation: CPAN & TCHATT	18
C. CPAN and TCHATT Data Sources	31
D. Process and Outcome Evaluation: CPAN & TCHATT	37
D1. CPAN: Reach and Services Delivered	37
D2. TCHATT: Reach and Services Delivered	57
D3. Contextual Factors Influencing CPAN Engagement and Implementation	67
D4. Contextual Factors Influencing TCHATT Engagement and Implementation	90
E. Residents' Perceptions of CPWE	111
F. Comparison of Texas CPAN Initiative to other States	126
G. Cost Analysis: CPAN & TCHATT	134
H. Key Challenges Identified	143
References	144
Appendices.....	145
Appendix A. Process Mapping Interview Guides.....	145
Appendix B. Process Maps.....	163
Appendix C. Logic Models.....	212
Appendix D. Constructs and Metrics Tables.....	216
Appendix E. Data Cleaning and Reconciliation Process.....	230
Appendix F. Supplemental CPAN and TCHATT Results.....	235
Appendix G. Surveys and Survey Protocols.....	240
Appendix H. Codebooks.....	277
Appendix I. CPWE Resident Interview Guide.....	385
Appendix J. Time-Driven Activity-Based Costing Model Results.....	389
Appendix K. Proposed Manuscript.....	404

EXECUTIVE SUMMARY

The External Evaluation was funded in September 2020 to evaluate the Texas Child Psychiatry Access Network (CPAN), Texas Child Access through Telemedicine (TCHAT), and the Child Psychiatry Workforce Expansion (CPWE) programs. The 86th Texas Legislature created and funded these initiatives as part of the Texas Child Mental Health Care Consortium (TCMHCC) to increase access to mental health services for Texas youth through the coordinated efforts of 12 higher education health-related institutions (HRIs). These initiatives are designed to promote statewide coordination and extension of psychiatric or other mental health care services through the provision of consultation services and training to pediatricians in community settings and telemedicine in schools, among others services.

This report provides a one-year evaluation of CPAN, TCHAT and CPWE for the first year of implementation (through August 2021). The external evaluation scope comprised five major components using a mixed methods approach:

- 1) Formative (qualitative assessment and workflow process mapping) evaluation through key-informant interviews and review of existing data sources to establish a baseline of current practice for each HRI, as well as for a sample of clinics and districts/schools engaged in CPAN and TCHAT;
- 2) Ongoing process and outcome evaluation:
 - a. An examination of reach and services delivered (through analysis of the TCMHCC Tray-based data management system [existing HRI data tracking system])
 - b. Contextual factors influencing CPAN and TCHAT engagement and implementation (through External Evaluation surveys of providers and school staff);
- 3) Evaluation of residents' perceptions of CPWE through in-depth qualitative interviews;
- 4) Review and comparison of Texas CPAN initiative to other states through a comprehensive literature review; and
- 5) Cost analysis of CPAN and TCHAT using a Time-Driven Activity-Based Costing (TDABC) model and collecting pre-implementation costs associated with CPAN and TCHAT for each HRI, prior to "going live" with the provision of services.

Key Findings

1) Formative Evaluation. Key findings from the CPAN and TCHAT process mapping interviews.

- After completing 24 HRI (12 CPAN and 12 TCHAT), 12 CPAN clinic, and 12 TCHAT school district process maps, we identified a set of common elements used among 1) HRIs focused on outreach, enrollment and engagement of clinics/providers and school districts, and delivery of mental health services; 2) a sample of clinics enrolled in CPAN; and 3) a sample of school districts enrolled in TCHAT. Process mapping and qualitative findings indicate variation in implementation processes, outreach and engagement strategies, and resources used across sites.
- Innovative strategies identified from CPAN HRI interviews include: promoting CPAN to past graduates through the HRI alumni program (outreach), bringing a laptop to CPAN outreach events to enroll PCPs in-person (enrollment), providing clinics with a “mock call” to demonstrate the process of calling into CPAN (engagement), and going beyond simply providing referrals by connecting PCPs directly with psychiatrists affiliated with the HRI (service delivery).
- Innovative strategies identified from TCHAT HRI interviews include: targeting school districts based on needs of services or resource mapping (outreach), obtaining signed District Implementation Plans from school districts prior to launch (enrollment), conducting campus liaison focus groups to improve program experience (engagement), and HRI staff going to schools to assist with TCHAT sessions (service delivery).
- Several HRI leads expressed interest in learning more about processes used by other HRIs, providing insight into the usefulness of the maps as a learning tool that will help facilitate sharing of unique strategies and leveraging best practices.
- Given the geographic scope and large numbers of implementation sites, the process maps have potential to serve as a pragmatic tool that will help to identify best practices, and to leverage outreach efforts across HRIs to improve HRI-led enrollment of clinics, providers, and school districts. Comparison of process maps across organizations helps identify inconsistencies in current practices, and opportunities to identify topics for training or discussion to improve processes (e.g., potentially using the Project Echo-based sessions as a forum for program implementers to exchange lessons learned and implementation strategies).
- All (n=12) interviewed clinics reported receiving brochures or other information about CPAN during the enrollment process, but only five clinics reported receiving any training from the HRI. Among the clinics that did not receive training, several (n=4) indicated that a training would have been helpful.
- There was variation in follow-up communication that school counselors reported from the HRI. Some (n=3) counselors mentioned that there is not much communication from the HRI after submitting referrals. They indicated that they would appreciate receiving status updates from HRIs

on students going through TCHAT sessions. Conversely, several counselors (n=7) were very pleased with the level of communication they have had with the HRI. Counselors mentioned receiving brief updates between sessions and, in some cases, a final report with HRI recommendations for ongoing care.

2a) Process and Outcome Evaluation. Key findings on reach and services delivered for CPAN and TCHAT (from based on HRI data tracking systems [i.e., extracted from the TCMHCC centralized data management system, Trayt]).

The multi-level CPAN and TCHAT process evaluation focused on organization reach (specifically, enrollment of clinic, provider and schools to develop the CPAN and TCHAT referring networks across the state) as well as individual reach to students and providers (i.e., students referred for TCHAT assessments and providers that called CPAN). Outcome evaluation focused on HRI delivery of mental health consultation support and referrals to providers serving youth (CPAN outcome evaluation), as well as HRI delivery of student mental health assessments, short-term treatment, and referrals for ongoing care (TCHAT outcome evaluation).

Key findings related to these topics will be presented for CPAN and then TCHAT.

CPAN

CPAN Network Development: Clinic and Provider Reach. To monitor progress in development and rollout of the CPAN initiative across HRIs, we examined HRIs' CPAN reach in terms of enrollment of clinics and providers. In total, across all HRI networks from May 1, 2020-August 31, 2021, CPAN enrolled 1,090 clinics and 6,729 providers (Table 1). Examination of clinic enrollment by geography characteristics (USDA Economic Research Service Rural-Urban Continuum Codes) and social vulnerability characteristics (CDC Social Vulnerability Index Codes) reveal that CPAN is attaining the goal to develop a diverse network of clinic partners in terms of geography and social vulnerability. Specific key results are as follows:

- Across all HRIs, 14% of clinics targeted completed enrollment in CPAN (1,090 of 8,024¹ clinics in Texas targeted for enrollment) in the first year of funding (Table 1). The majority (44.8%) of enrolled clinics represented pediatric clinics, followed by family medicine (27.1%) and family and pediatric clinics (23.1%) (Table 2).
- The geographic distribution of clinics enrolled, characterized by the rural to urban continuum, reflects an overrepresentation of clinics located in non-metropolitan counties (13.5% of CPAN enrolled clinics) compared with Texas clinics that serve Texas youth overall (3.7%), and 1.3% of

¹ Obtained from the list of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased from the Texas Medical Board by COSH.

CPAN enrolled clinics are located in rural counties compared with Texas clinics that serve youth overall (3.0%) (Table 3). Within the major metropolitan areas, the geographic spread of community clinics enrolled reflect widespread coverage across community settings (Figures 6a-b).

- Almost half (44.5%) of enrolled clinics are located in areas in the highest two quintiles of vulnerable counties (CDC Social Vulnerability Index [SVI] score over 0.6) compared with 53.9% of all clinics targeted for enrollment¹ (Table 4).
- Among clinics enrolled, 31% made at least one consultation call, with use varying across HRIs from 14.4% to 45.6% (Table 6).

CPAN Consultation Calls. CPAN HRI clinicians delivered 3,891 telephone consultation services to clinic providers, of which 1,778 (45.7%) of calls were assigned to a CPAN psychiatrist. Among calls assigned to a psychiatrist, the median call back time was 10.5 minutes. Specific key results are as follows:

- The number of CPAN telephone consultation services trended upward from 11 in August 2020 to 481 in August 2021 (Figure 8).
- Among all calls requiring a callback, HRIs returned 63.7% of calls within 30 minutes, across all patient race/ethnic groups. The proportion of calls returned in over 30 minutes steadily declined from October 2020 (over 40%) to August 2021 (under 5%).
- Among all CPAN calls received by HRIs, the top three reasons for calling were referral assistance (49.3%), medical management (42.7%), and seeking general resources (19.2%) (Table 13).
- 171 calls (4.6% of all calls) were documented emergencies, of which 108 (63.2%) were related to suicide, 25 (14.6%) were related to violence, 6 (3.5%) were related to physical safety, and 44 (25.7%) were documented as another emergency situation (Table 13).

Characteristics of Patients Served through CPAN Consultation Services. To describe characteristics of CPAN-based reach in terms of child and adolescent patients served, we examined consultation calls by provider-reported patient race/ethnicity, age, gender, and chief mental health concern. A limitation to assessing race/ethnicity in year 1 is that prior to March 8, 2021, providers calling CPAN were not required to report patient demographics (race and ethnicity); therefore, if a provider calling about a patient did not wish to share patient demographics, they selected “Decline” or left the fields blank. Because of the under-reporting of race/ethnicity, the comparisons that follow must be considered with caution. Ongoing evaluation will monitor equity of services delivered across race/ethnicity with access to more complete data.

Specific key results are as follows:

- 57% of CPAN consultation calls were about female patients, and overall mean patient age was 13 years (Table 9).

- Of the 892 (24%) calls missing a patient's race or ethnicity, 875 (98.1%) of calls were received before March 8, 2021.
- The racial/ethnic distribution of patients assigned to a psychiatrist was roughly equal (ranging from 36.2% to 42.8%) (Table 9).

Characteristics of Mental Health Conditions Served. Almost half of calls (46.3%) were assigned to a psychiatrist (Table 9). Overall, HRI psychiatrists perceived a quarter of calls as severe or very severe (Figure 14). Specific key results are as follows:

- The proportion of calls directly connected to a psychiatrist varied by race/ethnicity, with slightly lower proportions of consultation calls about Black patients directly connected to psychiatrists (3.8% of Black youth) than consultation calls about Hispanic patients (6.9% of Hispanics) and NHWs (4.7% of NHWs) (Table 12).
- Across all consultation calls, the top chief complaints recorded during the consultation call included anxiety/panic attacks (n=452; 21%), sad mood (n=293; 13.6%), depression (n=244; 11.3%), aggressive behaviors (n=209; 9.7%), and suicidal thoughts n=154 (7.2%) (Table 15)..
- The six most common diagnoses resulting from consultation calls from May 2020-August 31, 2021 recorded were depression (n=703, 18.1%), ADHD (n=589, 14.1%), anxiety (n=531, 13.6%), autism spectrum disorder (n=163, 4.2%), conduct disorder (n=80, 2.1%), and post-traumatic stress disorder (n=66, 1.7%) (Table 17).

TCHAT

TCHAT Network Development: School District and Campus Reach. To monitor progress in development and rollout of the TCHAT initiative across HRIs, we examined HRIs' TCHAT reach in terms of enrollment of school districts and school campuses within these districts. Examination of school campus enrollment by geography characteristics (USDA Economic Research Service Rural-Urban Continuum Codes) and social vulnerability characteristics reveals TCHAT is attaining the goal to develop a diverse network of school partners in terms of geography and social vulnerability. Specific key results are as follows:

- Among the 171 school districts reached, 1763 school campuses were enrolled (Table 20).
- 14% of enrolled campuses referred at least one student to TCHAT (246/1763). The percentage of campuses with at least one referral varied across HRIs, ranging from 0% to 32.6% (Table 20).
- The geographic distribution of school campuses enrolled in TCHAT, characterized by the TEA district type, reflects 53.4% and 37.6% of TCHAT schools located in metropolitan and non-metropolitan districts, respectively, compared with 39.0% and 41.4% of Texas school campuses, respectively. 7.4% of TCHAT enrolled schools are located in rural counties compared with 10.6% of Texas schools overall (Table 22).

- Among enrolled school campuses, 10.4% of TCHATT enrolled schools are located in areas in the highest of vulnerable counties [CDC Social Vulnerability Index (SVI) score over 0.8] compared with 17.0% of schools in Texas (Table 23).

Students Reached and Served by TCHATT. We assessed individual student reach in terms of the number of students who received a school referral for a mental health assessment. Students who completed a least one TCHATT session with an HRI mental health specialist are considered served by the TCHATT program. Note that the TCHATT external evaluation has limited data documenting encounters and referrals. TCHATT documentation for students reached in the Trayt database began on March 19, 2021; however, encounter data collection did not start until July 1, 2021. The external evaluation period for year 1 ended on August 31, 2021; thus evaluation results describing students served are preliminary. Specific key results are as follows:

- From March 19, 2021 through August 31, 2021, there were 1,585 student referrals to TCHATT. Of these referred students, 5 families declined consent to service before the referral was sent to the HRI, 409 families consented to service but are pending enrollment, 59 families could not be reached, 1 family declined consent to care once contacted by the HRI, and 1,111 students (70.1%) enrolled in TCHATT and were scheduled for service (Figure 17).
- Among all students with active referrals to HRIs for assessments (n=1520), 55.5% of students were female, mean age was 12.3 years, approximately 9.6% were Black (non-Hispanic), 39.3% Hispanic, and 25.6% were White (non-Hispanic). Importantly, 22.5% declined to provide their race and ethnicity (Table 24).

Characteristics of Mental Health Conditions Served by TCHATT: Students were referred to TCHATT for various reasons and subsequently assigned to a therapist, psychiatrist, other care team members who conducted student consultations and mental health assessments. Specific key results are as follows:

- Among all active referrals (i.e., enrolled referrals plus referrals pending enrollment) (n=1520), the six most common reasons for student referrals were depression (n=553, 36.4%), anxiety (n=524, 34.5%), attention (n=252, 16.6%), aggression (n=244, 16.1%), suicidal thoughts (n=230, 15.1%), and disruptive behaviors (n=218, 14.3%) (Table 25).
- Among students enrolled in TCHATT (n=1111), 23.0% were assigned to a therapist, 1.3% were assigned to a psychiatrist, and 72.8% to multiple team assignments (i.e., multiple providers were included in the student's care team) (Table 25).
- The percentage of enrolled referrals assigned to multiple providers varied slightly across race/ethnicity group (77.2% of Blacks, 70.3% of Hispanics, and 72.7% of Whites) (Table 26).
- The proportion of enrolled referrals assigned to a psychiatrist varied by student race/ethnicity, with a slightly higher proportion of Whites (19.4%) receiving a psychiatrist assignment compared to students of another race/ethnicity (14.2% of Black students, 10.6% of Hispanic students, and 19.4% of NHW students) (Table 2).

2b) Process and Outcome Evaluation. Key findings related to contextual factors influencing CPAN and TCHAT engagement and implementation (through external evaluation surveys of providers and school staff).

In the final Quarter, we conducted online surveys with providers and school staff. With respect to CPAN, we surveyed a diverse sample of 236 providers across 86 clinics or clinics systems to examine factors influencing implementation of CPAN at the clinic-level and engagement with the program at the provider-level, such as fidelity, satisfaction, and contextual factors, such as organizational factors (e.g., leadership and capacity), and perceived need for the program. Similar to our process mapping approach, we worked with the Consortium directors of enrolled clinics and providers to ensure that we surveyed informants from a diverse sample of clinics with respect to socio-economic status (e.g., designation or non-designation of federally qualified health center), clinic size, and geographic region.

With respect to TCHAT, we surveyed 277 school staff across 172 school campuses to examine factors influencing implementation of TCHAT at the school campus and engagement with the program at the provider-level, such as fidelity, satisfaction, and contextual factors, such as organizational factors (e.g., leadership and capacity), and perceived need for the program.

We worked to ensure that we surveyed informants from a diverse sample of school campuses with respect to socio-economic status (e.g., % of students who received free or reduced lunch), school campus size, and geographic region.

Key findings related to the external evaluation survey results will be presented for CPAN and then TCHAT.

CPAN

Quantitative analyses were completed at the clinic or clinic-system level and the individual provider level. At the clinic or clinic-system level, the quantitative results are organized as follows: descriptive characteristics of clinics or clinic systems to whom outreach was directed, enrolled in TRAYT (as of 7/8/21) and survey sample, perceptions of CPAN awareness and implementation factors, and reasons for calling or not calling CPAN. At the individual provider level, the quantitative results are organized as follows: descriptive characteristics of surveyed providers, perceptions of CPAN awareness and implementation factors, participation in CPAN activities, and reported perceived outcomes and future recommendations for CPAN. Survey respondents were also asked to provide qualitative open-ended responses to questions related to facilitators and barriers of the CPAN program.

Clinic or Clinic System-Level Quantitative Results

- Descriptive characteristics of clinics or clinic systems:
 - Surveyed clinics or clinic systems mirror the distribution of clinics or clinic systems enrolled in TRAYT (as of 7/8/21) in terms of geographic and population-level vulnerability

indicators. However, non-metro (urban) TRAYT enrolled and surveyed clinics or clinic systems are over-represented when compared to the total outreach population, and metro and non-metro (rural) TRAYT enrolled and surveyed clinics or clinic systems are under-represented when compared to the total outreach population. Social vulnerability index scores were similar across the three groups (Table 29).

- All HRIs are represented among surveyed clinics or clinic systems. Surveyed clinics are diverse in terms of type of clinic practice, clinic region, and demographics of the patient population served (Table 31).
- Perception of CPAN awareness and implementation factors:
 - The majority of surveyed clinics (66.3%) reported that at least one person from the clinic or clinic system reported making at least one CPAN call during the past 12 months (Table 33).
 - CPAN calls were generally more prevalent among private practice and hospital-based clinic systems (when compared to federally qualified health centers), suburban and urban clinics or clinic systems (when compared to rural clinics or clinic systems), and among those patients that served a majority of patients with private insurance, Medicaid or CHIP, or Medicare (compared to those where the majority were uninsured or used self-pay) (Table 20-21, Table 23).
 - Clinics or clinic systems who reported at least one call to CPAN reported more favorable CPAN motivation (i.e., degree to which the clinic or clinic system wants CPAN to happen) subcomponent scores (e.g., relative advantage, compatibility, observability priority, lower complexity) compared to clinics or clinic systems who reported no calls (Figure 24).
 - Among clinics or clinic systems who called CPAN, the highest innovation-specific capacity subcomponent scores were for clinic knowledge, skills and abilities. The lowest innovation-specific capacity subcomponent score was for clinic implementation climate (Figure 25).
- Reasons for calling and not calling CPAN:
 - The most common reasons for clinics to call CPAN was for medication assistance (80.4%) and referral assistance (78.6%) (Table 36).
 - The most common reason provided for not calling CPAN was the perception that there were not any mental health issues that could not be addressed on their own (62.1%) (Table 38).

Provider-Level Quantitative Results

- Descriptive characteristics of surveyed providers:

- The majority of providers surveyed were female (Table 39).
- More than half of the sample reported completing their professional training within the last 10 years (Table 39).
- Physicians comprised approximately two-thirds of the sample; almost 50% reported their primary role as pediatrician (Table 39).
- Perceptions of CPAN awareness and implementation factors:
- The vast majority of surveyed respondents reported being aware of CPAN (Table 40).
- Approximately 47% of surveyed respondents reported calling CPAN at least once in the last 12 months. Almost half reported not making any calls to CPAN; however, the vast majority of non-callers reported plans to call CPAN in the future (Table 40).
- Females and pediatricians were most likely to call CPAN.
- Participation in CPAN activities:
- Among providers who called CPAN on occasion or regularly, the vast majority are using CPAN for what it was intended to do in terms of obtaining consultation from a psychiatrist and referrals or resources for families. The vast majority of providers also participate in child assessment and ongoing care activities related to following the psychiatrist's recommendations and follow up with the patient's family (Figure 29).
- Reported perceived outcomes and future recommendations for CPAN:
- More than 70% of providers reported their knowledge, skills, and confidence to provide mental health care increased moderately or very much due to CPAN (Table 41).
- Over 90% of all providers reported that they would recommend CPAN to other providers and use CPAN in the next 6 months (Table 42).

Provider-Level Qualitative Results

- Most respondents agreed that access to consultation services, information, and resources was the biggest benefit to enrolling and using the CPAN services.
- CPAN has increased primary providers' confidence in treating patients with mental health needs more effectively and helped connect them with community resources that could benefit their patients when additional care was needed.
- The most frequently mentioned areas for improvement include the desire for expanded services, improved outreach and awareness of CPAN in the community, additional communication options, more training on the program, and improved connections to resources and referrals in the community.

TCHATT

Quantitative analyses were completed at the school campus level and the individual school staff level. At the campus level, the quantitative results are organized as follows: descriptive characteristics of campuses in the total Texas population (per the Texas Education Agency), enrolled in TRAYT (as of 6/8/21), and in the survey sample as well as characteristics of surveyed campuses implementing TCHATT. At the individual school staff level, the quantitative results are organized as follows: descriptive characteristics of surveyed school staff, perceptions of TCHATT implementation, participation in TCHATT activities, and reported perceived outcomes and future recommendations for TCHATT. Survey respondents were also asked to provide qualitative open-ended responses to questions related to facilitators and barriers of the TCHATT program.

Campus-Level Quantitative Results

- Descriptive characteristics of school campuses:
 - Enrolled campuses in TRAYT as of 6/8/21 over-represent metro campuses; surveyed campuses, however, mirror the percentage of TEA metro campuses. Surveyed campuses over-represent non-metro campuses when compared to the percentage of non-metro campuses enrolled in TRAYT as of 6/8/21. Rural campuses are under-represented among enrolled and surveyed campuses (Table 43).
 - When compared to all Texas campuses, there is an over-representation of campuses with 500-1000 and 1000-1500 student in the enrolled and surveyed groups and an under-representation of campuses with less than 500 students (Table 43).
 - Characteristics of surveyed campuses implementing TCHATT:
 - Among all surveyed campuses, the vast majority (almost 95%) reported implementing TCHATT at some level (early stage, inconsistent implementation, or fully and systematic implementation).
 - Approximately 60% of surveyed TCHATT implementing campuses reported that more than 1 in 4 students in their campus population had need of non-educational support such as meals, clothing, and/or counseling or behavioral therapy (Table 44).
 - Many campuses also reported the presence of other state-funded mental health services at their campuses (besides TCHATT). Over 70% of surveyed TCHATT implementing campuses reported having community mental health services at their campus and half reported the presence of a Mental Health First Aid Training program (Table 44).
 - Among campuses that reported implementing TCHATT, approximately one-third of campuses reported lower parental interest in TCHATT. Lower parental interest refers to

the school staff perception that less than 50% of parents were interested in TCHATT services (when the child was referred to TCHATT services).

- Lower parental interest in TCHATT was more often reported by school staff who perceived that less than one quarter of their student population had non-educational needs (e.g., meals, clothing, and/or counseling or behavioral therapy) (i.e., lower parental interest among schools with fewer at-risk students) and among rural campuses and campuses with less than 500 students (Figure 32).
- Campuses that reported implementing TCHATT perceive high scores related to TCHATT compatibility (how TCHATT fits in with what the school campus is doing), observability (how easy it is to see that TCHATT is producing outcomes), and campus knowledge, skills, and abilities related to using TCHATT (Figure 36).

School Staff-Level Quantitative Results

- Descriptive characteristics of surveyed school staff:
 - School staff surveyed were predominantly female and counselors (Table 46).
 - Almost 60% of survey respondents reported that they were the person who implemented TCHATT at their school campus or district (Table 46).
- TCHATT implementation among surveyed school staff:
 - Over 90% of surveyed school staff reported that their school implemented TCHATT (at an early stage, inconsistent implementation, or fully and systematic implementation).
 - Among TCHATT implementers, more than half reported being very involved with TCHATT implementation at their campus or district (Table 47).
 - Almost 80% of surveyed school staff reported attending TCHATT trainings or receiving TCHATT materials and/or resources (Table 47).
- Participation in TCHATT Activities:
 - Among school staff who reported being somewhat or very involved in TCHATT implementation at their district or school:
 - Most reported that their school sometimes or often participating in activities designed to increase awareness and support implementation of TCHATT (e.g., obtaining buy-in prior to enrolling in TCHATT, receiving TCHATT materials and information on how to refer students, school received TCHATT training) and in specific TCHATT implementation activities (e.g., students in need are referred to TCHATT, school counselor or campus liaison submits referral to TCHATT) (Figure 37).

- Approximately 25% or more reported never, rarely, or not knowing whether the school provides a translator to explain TCHATT to families who do not speak English (Figure 37).
- More than half reported never, rarely, or not knowing whether parents/guardians who refuse TCHATT services were asked if they were willing to talk to someone at the HRI or consider TCHATT in the future (Figure 37).
- Reported perceived outcomes and future recommendations for TCHATT:
 - Between approximately 36-52% of respondents indicated that because of TCHATT, students were more involved in school, had decreased behavioral incidents, Or better attendance and grades at school (Table 48).
 - Almost 70% reported that TCHATT increased school staff capacity to meet the non-educational needs of students (Table 48).
 - Approximately 20% of participants reported that they did not know whether TCHATT had impacted any outcomes (Table 48).
 - Approximately 90% of participants reported that they would recommend TCHATT to other schools and use TCHATT in the next 6 months (Table 48).

School Staff-Level Qualitative Results

- Respondents indicated that the biggest benefits of the program include accessibility of care for underserved students and that TCHATT provides a level of mental health care to students that cannot be provided by school counselors alone due to specialized needs and time constraints.
- Areas of improvement included the desire for better communication and follow-up, a more efficient system for paperwork, additional student sessions, more training on campus, marketing tools and informational material for parents, and implementation expansion to other campuses.
- Additional comments provided by TCHATT stakeholders included positive feedback about the program and its impacts on students, and reasons why implementation was lacking this past year such as a lack of buy-in and dealing with other stressors (e.g. COVID).

3) CPWE Qualitative Evaluation. Key findings of residents' experiences with CPWE psychiatry fellowships based on external evaluation in-depth interviews.

Between June 14 and June 24, 200, we interviewed 10 psychiatry residents. These residents were invited to take part in the qualitative interviews by directors of the HRIs working in partnership with the local mental health authorities (LMHAs). In total, 10 residents representing 10 different HRIs were interviewed as part of this evaluation. Two of the participating HRIs did not have current residents in the CPWE program; therefore, they could not be represented in the data collection and analysis. Key findings are presented below:

- While residents discussed challenges related to their CPWE residencies, there was an overwhelmingly positive response to the program.
- Residents discussed challenges related to meeting the needs of disadvantaged and underserved patients in their LMHAs, including lack of time and resources, disjointed services, inefficient electronic systems, and overcoming barriers to care related to psychosocial and financial stressors experienced by patients.
- Residents also highlighted positive aspects of their training, including supportive attending physicians and clinic staff, diverse patient populations and psychiatric profiles, exposure to a new system of care, and engagement in cross-cultural interactions.
- Positive experiences of the CPWE program did not necessarily change the attitudes of residents about working with underserved patients or within the public mental health system given the majority had some level of exposure to public health care with similar patient populations previously, nor did it impact long-term career decisions.
- Residents' experiences did, however, contribute to expanded knowledge and understanding of working in a systems-based environment with underserved children, adolescents and families, the need for providing flexibility in care, and preparing for cross-cultural interactions.

4) Comparison of Texas CPAN Initiative to Other States. Key findings based on a comprehensive literature review

We conducted a literature search to identify relevant peer reviewed articles to compare CPAN to existing models in other states. Peer reviewed articles and reports from established Child Psychiatry Access Programs (CPAPs) were identified and key program characteristics and common metrics between other state models and the Texas model were extracted from articles/reports and synthesized in an evidence table. Five other CPAPs were included in the review: the Massachusetts Child Psychiatry Access Project (MCPAP), New York State's Child and Adolescent Psychiatry for Primary Care (CAP-PC), Washington Partnership Access Line (PAL), Wyoming Partnership Access Line (PAL), and ACCESS Mental Health CT. Key findings are presented below:

- CPAPs vary in terms of services offered and the structure of their care teams. MCPAP and CPAN have regional teams at academic medical institutions throughout their state, while Washington and Wyoming PAL utilize a smaller, centralized team of child and adolescent psychiatrists (Table 51).
- MCPAP had the highest number of encounters compared to other CPAP programs (Table 52). Compared to MCPAP and ACCESS Mental Health CT, CPAN had a higher number of clinics and PCPs enrolled (Table 52).
- 84% of PCPs who called ACCESS Mental Health CT were connected directly to a psychiatrist compared to 28% of PCPs who called CPAN (Table 53). Calls returned within 30 minutes of the PCP's initial inquiry were slightly higher for ACCESS Mental Health CT (97%) than CPAN (92%).

- Psychiatrists were assigned to a large number of calls for both MCPAP (44.9%) and CPAN (50.5%) (Table 54). While resource coordinators were included in the care team for 53.8% of CPAN consultations, they were only included in 8.7% of MCPAP consultations.
- For all programs, calls were primarily about children ages 5-18 years (Table 55).
- For MCPAP, CAP-PC, and CPAN, referral assistance and medication-related questions were common reasons for PCPs to utilize the service (Table 56). While few CPAN calls were for diagnostic-related questions (5.1%), this was the reason recorded for a third of MCPAP calls (Table 56).
- Across all programs, attention-deficit/hyperactivity disorder, anxiety disorder, and depression were top diagnoses (Table 57).
- Providers enrolled in CAP-PC and CPAN reported improved knowledge, skills, and confidence as a result of the program (Table 58). For CAP-PC, 92.7% of surveyed providers reported an increase in their knowledge in mental health care, 89.0% reported an increase in their skills to provide mental health care, and 88.5% reported an increase in their confidence to provide mental health care. For CPAN, 73.8% of surveyed providers reported an increase in their knowledge in mental health care, 74.8% reported an increase in their skills to provide mental health care, and 71.8% reported an increase in their confidence to provide mental health care.

5) Cost Analysis of CPAN and TCHAT. Key findings based on HRI-specific costs during the program enrollment and early implementation phase.

HRI-specific costs during the program enrollment and early implementation phase were collected to establish costs of developing the CPAN and TCHAT networks. Key findings are presented below:

- In year one, we focused on developing the cost model and estimating the pre-implementation phases of CPAN and TCHAT for each HRI, prior to “going live” with the provision of services.
- The average total cost across 9 CPAN programs was \$494,627. The average total cost across 8 TCHAT programs was \$664,613. The programs demonstrated substantial differences in their allocation between spending on personnel, rent, marketing, equipment, and supplies, suggesting fundamental differences in the way the programs tackled the pre-implementation challenges associated with identifying and enrolling the CPAN and TCHAT sites.
- CPAN costs for personnel (including behavioral health specialist and other administrative staff) varied depending on the complexity of the outreach activities and the number of clinics per HRI.
- Non-personnel costs had a significant variance among TCHAT programs, which may have been driven by the initial availability of resources and the number of school districts and campuses within the region. ISDs in the rural areas may require higher costs to connect and deliver training to school personnel.

A. BACKGROUND

The high burden of mental health among Texas youth is an important public health problem. Texas has the second highest prevalence of mental illness in the United States based on six measures, comprising three measures focused on youth mental health disorders (i.e., youth with at least one major depressive episode (MDE) in the past year, youth with substance use disorders in the past year, youth with severe MDE).¹ Texas also ranks lowest in the United States for access to mental health (MH) care.² Responding to the high mental health burden in youth and need to increase access to MH services, the 86th Texas Legislature created Senate Bill 11 to fund the Texas Child Mental Health Care Consortium (TCMHCC) to increase youth access to mental health services.

TCMHCC comprises five initiatives, including the Child Psychiatry Access Network (CPAN), Texas Child Access through Telemedicine (TCHAT), and the Child Psychiatry Workforce Expansion (CPWE), which are the focus of this external evaluation. The external evaluation was requested as part of this effort and funded by the Texas Legislature.

TCMHCC leverages the expertise and capacity of the health-related institutions (HRIs) of higher education to address the urgent mental health challenges and improve the mental health care system for children and adolescents in the state of Texas. Twelve HRIs act as hub teams and provide consultation and referral services to clinics and providers enrolled in CPAN and provide mental health assessment services to youth identified in schools enrolled in TCHAT across the state of Texas.

Figure 1. CDC Framework for Program Evaluation



In this report, we report findings from the Year 1 evaluation. During this evaluation period, the external evaluation focused on evaluating three initiatives (CPAN, TCHAT, and CPWE) during their early implementation phase. During this phase, activities comprised a focus of HRI teams on planning their initiatives' rollout, enrolling clinics and school districts, providing trainings to implement the program as planned, and developing data tracking systems. There was a large focus on enrolling community clinics and schools to expand access to mental health services among children and adolescents in medically under-served communities. This comprehensive external evaluation encompasses formative evaluation, process evaluation, outcome evaluation, cost-analysis and follows the Centers for Disease Control and Prevention (CDC) Framework for Program Evaluation (Figure 1).

The external evaluation scope comprised five major components using a mixed methods approach:

- 1) Formative (qualitative assessment and workflow process mapping) evaluation through key-informant interviews and review of existing data sources to establish a baseline of current practice for each HRI, as well as a sample of clinics and districts/schools engaged in CPAN and TCHATT;
- 2) Ongoing process and outcome evaluation:
 - a. An examination of reach and services delivered (through analysis of the TCMHCC Trayt-based data management system [existing HRI data tracking system])
 - b. Contextual factors influencing CPAN and TCHATT engagement and implementation (through external evaluation surveys of providers and school staff);
- 3) Evaluation of residents' perceptions of CPWE through in-depth qualitative interviews;
- 4) Review and comparison of Texas CPAN model to other states through a comprehensive literature review; and
- 5) Cost analysis of CPAN and TCHATT using the Time-Driven Activity-Based Costing (TDABC) model and collecting pre-implementation costs associated with CPAN and TCHATT for each HRI, prior to "going live" with the provision of services.

Brief Description of External Evaluation Components

We conducted a formative assessment using qualitative methods to provide in-depth understanding of the program design and examination of program implementation processes through interviews with implementers at the HRI-, clinic- and school district-levels (**Component 1** above). The resulting program process maps facilitate understanding of program implementation steps, including identifying steps to program delivery that all sites implement, as well as identifying innovations to share. This process mapping step helps to guide process monitoring, leading to identification of areas for improvement. These process maps also provide opportunities to compare processes across organization systems to help identify and share best practices (Appendices A & B). The process mapping activities and assessments of available data guided finalization of the logic models (Appendix C). Using the final logic models as our evaluation framework and examination of the existing data systems (i.e. the Trayt database), we updated the operationalization of constructs in the finalized data metrics table (Appendix D) which guided the development of the evaluation questions. Secondary analysis of Trayt data was conducted to examine reach and services delivered for CPAN and TCHATT (**Component 2a** above). With stakeholder input, we also developed CPAN and TCHATT-specific data collection instruments and protocols to expand on the existing data (**Component 2b** above). The CPAN Provider Implementation Survey and TCHATT School Staff Implementation Survey (Appendix G) were conducted in June-July 2021 with program implementers. Data source-specific codebooks are included (Appendix H). To evaluate the CPWE initiative (**Component 3** above), we developed in-depth qualitative interview guides (Appendix I) to gain in-depth insights into the experience of the residents, including benefits and challenges of the program from the resident perspective. We also conducted a review and comparison of the Texas CPAN model to other states through a comprehensive literature review (**Component 4** above). Finally, we conducted

a cost analysis of CPAN and TCHAT (Component 5 above) (Appendix J). The evaluation process also provided an opportunity to initiate development on a manuscript to develop statistical modeling methods to evaluate CPAN reach in vulnerable populations (Appendix K). Below, we describe the processes and protocols, and results for each evaluation component. Please note, the External Evaluation team is available to meet with each HRI leadership team to discuss Year 1 results presented below.

B. FORMATIVE EVALUATION: CPAN & TCHAT

Background

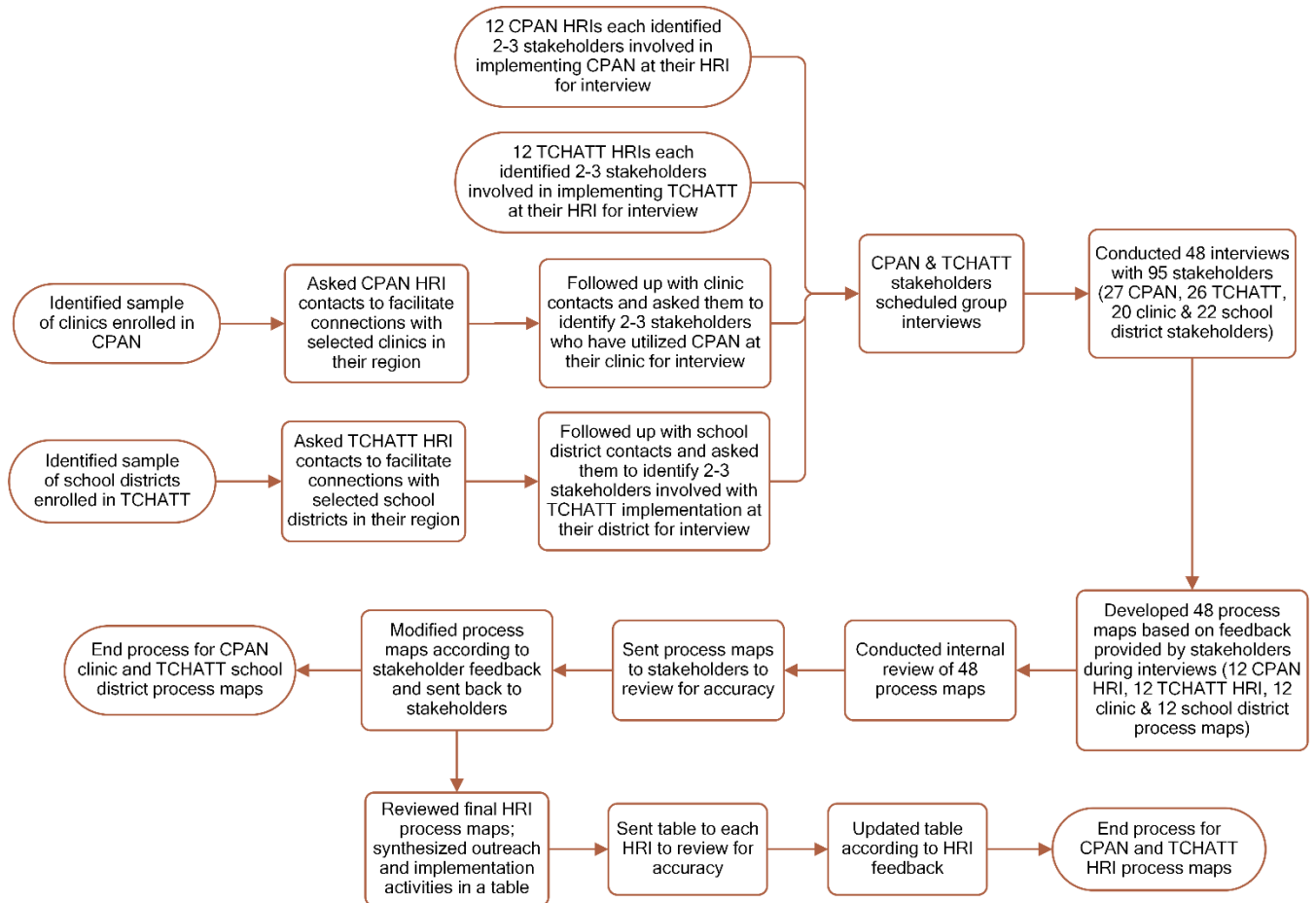
The first evaluation component focused on conducting formative work to delineate specific processes (e.g., strategies and steps) used to implement the programs across multiple levels. At the HRI level, we created process maps to depict all processes involved in implementing the CPAN and TCHAT programs – from developing and engaging their respective networks of providers and schools to delivering mental health services. The resulting process maps establish the standard of comparison across sites to understand variation of program outreach and implementation between implementation sites. We also created school-based and clinic-based process maps. These process maps depict the flow of program processes at the school and clinic level and describe planned practices for implementing these programs. Process maps also provide a baseline of the program plan to guide evaluation of implementation fidelity.

Methods

We conducted key-informant interviews with CPAN and TCHAT implementers at each HRI to develop HRI-level process maps (n=24). These process maps provide a detailed graphical representation of processes used by HRIs to enroll, engage, and deliver mental health services to primary care providers and schools enrolled in the CPAN and TCHAT programs, respectively. We also interviewed up to three key informants at each site to develop process maps for a diverse sample of participating clinics (n=12) and school districts (n=12).

Prior to the interviews, we reviewed the implementation plan developed by the Consortium and developed preliminary process maps outlining planned activities for the CPAN and TCHAT programs. The preliminary process map was sent to key informants before their scheduled interview and also used as a resource to guide discussion about different phases of program implementation (i.e., outreach, enrollment, engagement, service delivery, and results and ongoing care) during the interview. After the interviews, process maps were created by the evaluation team and returned to the key informants to verify for accuracy and completeness. Process maps were updated based on key informant feedback, and final versions were sent back to sites. The evaluation team reviewed finalized process maps and developed tables that synthesize program activities for CPAN and TCHAT HRIs. Our approach to conducting the HRI CPAN and TCHAT process maps is shown in Figure 2 below.

Figure 2. Evaluation Team Approach to Developing Process Maps



Results

HRI, Clinic & School District Process Maps

Process maps were developed for CPAN HRIs (n=12), TCHAT HRIs (n=12), a sample of CPAN clinics (n=12), and a sample of TCHAT school districts (n=12) (Appendix B). HRI process maps describe steps for connecting with, enrolling, engaging, and delivering mental health services to clinics and schools throughout Texas. Clinic and school district process maps describe processes involved with learning about the program, enrolling, and receiving program services. After engaging in iterative internal reviews with key informants and HRI leads to ensure accuracy of process maps, we reviewed process maps to identify steps commonly used, as well unique activities that may facilitate program engagement and service delivery. The comparison of processes used across sites provides an opportunity to share lessons learned to improve program reach and implementation. Analysis of process maps for similarities and differences and common steps used by HRIs is presented in Figures 3 and 4 below.

Figure 3. CPAN Table Synthesis of Key Processes/Strategies Used Across HRI Sites

		Site 1	Site 2	Site 3	Site 4	Site 5	Site 6	Site 7	Site 8	Site 9	Site 10	Site 11	Site 12
Outreach	Conducts cold calls	X	X	X	X	X	X	X	X	X	X	X	X
	Faxes/emails CPAN flyers	X	X	X	X	X	X	X	X	X	X	X	X
	Mails (or mailed in past) CPAN flyers	X	X	X	X	X	X	X	X		X	X	
	Conducts in-person visits to clinics	X	X	X	X	X		X	X	X	X	X	X
	Contracts (or contracted in past) with Meadows Mental Health Policy Institute for outreach			X	X	X			X	X	X	X	X
	Promotes CPAN through HRI Continuing Medical Education (CME) program	X		X	X	X	X	X	X	X		X	X
	Promotes CPAN through Project ECHO	X	X	X	X	X	X	X	X	X	X	X	X
	Promotes CPAN through social media	X	X	X		X	X	X	X	X			X
	Promotes CPAN through community/professional presentations	X	X	X	X	X	X	X		X	X	X	X
	Promotes CPAN through other departments/programs at HRI	X	X	X		X	X	X	X	X		X	
	Promotes CPAN to past graduates through HRI alumni program						X	X		X			
	Promotes CPAN through other organization's newsletters	X		X			X		X			X	
	Promotes CPAN to other PCPs in clinic when single primary care provider (PCP) (not entire clinic) enrolls		X	X		X	X	X	X				X
	Promotes CPAN to providers associated with TCHAT	X	X	X	X	X							X
	Promotes CPAN by engaging individuals/groups within community that have relationships with PCPs who serve children/adolescents		X	X	X	X	X	X	X		X	X	
	Maintains updated map of enrolled PCPs/clinics to identify gaps upon which to focus outreach efforts		X		X	X			X			X	
Enrollment	Meets with clinics/PCPs in-person or virtually	X	X	X	X	X	X	X	X	X	X	X	X
	Brings laptop to outreach events to enroll PCPs in-person				X						X		X
	Offers option for PCPs to enroll through CPAN website			X		X	X		X			X	
	Sends Welcome Packet to new enrollees	X	X	X	X	X	X	X	X	X		X	X
	Documents enrollment information in spreadsheet (e.g., PCP name, clinic, dates that enrollment documentation & surveys were sent out)	X	X	X	X	X		X	X		X	X	X
	Provides training on CPAN program		X	X		X	X	X	X			X	X
	Works with clinics to identify point of contacts for CPAN team		X	X	X	X	X	X	X				X
	Maintains directory of enrolled PCPs on CPAN website			X									

Engagement	Sends monthly/quarterly newsletters to enrolled PCPs	X	IP	X		X	X	X	X	X		X	X
	Sends enrolled PCPs reminders about CPAN services		X	X	X	X	X	X	X		X	X	X
	Offers CME activities to enrolled PCPs	X	IP	X	X	X	X	X	X	X	X	X	X
	Offers other education/training sessions for enrolled PCPs			X	X	X	X	X	X		X	X	
	Conducts sit-ins at clinics to talk to providers in-person and answer their questions	X		X	X					X			X
	Conducts outreach to "superusers" to thank them for their service						X	X	X	X			
	Obtains testimonials of PCPs who use CPAN regularly					X	X		X		X	X	X
	Provides "mock call" to demonstrate process of calling in		X	X			X			X			
Service Delivery	Call agent confirms PCP is in HRI's catchment area; transfers call to other hub, if not	X	X	X	X	X	X	X	X		X	X	
	If caller is not enrolled in CPAN, asks if they are willing to enroll	X	X	X	X	X	X	X	X		X	X	X
	If provider is not active and verified in Trayt, contacts provider's office after call to verify that they are a provider at that clinic	X	X	X		X		X	X		X	X	
	If call is a mental health crisis, provides PCP crisis intervention education and next steps needed to address the mental health crisis	X	X	X		X		X	X			X	X
	Call agent asks for patient's zip code, school, and insurance at beginning of call	X				X			X		X	X	
	Call agent tracks call information (caller, clinic, and reason for call) on spreadsheet		X	X			X	X	X	X	X	X	X
	Call agent does direct transfer to psychiatrist (if available)			X	X		X	X		X	X		X
	If psychiatrist is unavailable, HRI follows process flow to reach other psychiatrists at HRI (or transfer to another HRI)	X	X	X	X	X		X	X	X	X	X	X
	If PCP has called about patient before, psychiatrist has option to review notes from previous call	X	X	X		X	X	X	X	X	X	X	X
	CPAN staff maintain a referral database		X	X	X	X	X	X	X	X	X	X	X
	CPAN staff maintain a resources database		X	X	X	X		X	X	X	X	X	X
	If patient needs referral, determines if patient attends school with TCHAT; if so, recommends patient go through TCHAT program if they have not already or presenting concern is new	X	X	X	X			X		X		X	X
	CPAN staff calls provider to check on availability prior to giving referral	X		X		X	X	X	X	X		X	
	If referring to HRI's clinic, CPAN staff connects PCP directly to psychiatrist		X	X	X								X
	CPAN staff sends thank-you letter after first call	X	IP			X		X	X	X			

IP = In Process

Acronyms: PCP = Primary Care Provider; CME = Continuing Medical Education

Figure 4. TCHAT Table Synthesis of Key Processes/Strategies Used Across HRI Sites

	Site 1	Site 2*	Site 3	Site 4	Site 5	Site 6	Site 7	Site 8	Site 9	Site 10	Site 11	Site 12
Outreach	Coordinates with other HRI(s) on ISD coverage	X		X	X	X	X					
	Partners with community outreach liaison to conduct outreach		X	X	X		X				X	
	Works with Meadows to identify ISDs in need of TCHAT				X					X		
	Leverages existing ISD/school connections for outreach	X	X	X	X	X	X	X			X	X
	Works with ESC(s) to identify school districts with most need for TCHAT	X		X	X		X		X	X		
	Works with ESC(s) to recruit school districts	X	X	X	X	X	X	X	X	X		X
	Targets outreach efforts towards rural/smaller districts and Title I schools	X		X	X	X	X	X			X	
	Targets school districts based on needs of services or resource mapping			X			X		X		X	
	Conducts cold calls to district leadership	X		X	X		X	X	X		X	X
	Mails TCHAT brochures/flyers to school districts				X	X						X
	Emails brochures/flyers to school districts	X	X	X	X	X	X	X	X	X	X	X
	Sends TCHAT informational video to school districts		X				X					
	Delivers presentations to school districts in ESC region(s)	X		X	X	X	X			X		X
	Promotes TCHAT to CPAN providers	X		X	X	X		X	X	X		
	Promotes TCHAT through CME program			X	X	X						
	Promotes TCHAT through website	X		X	X	X	X	X	IP	X		X
	Promotes TCHAT through social media	X	X	X						X		X
	Spreads awareness about TCHAT through monthly newsletters to community stakeholders			X					X	X		X
	Spreads awareness about TCHAT by partnering with community-based organizations			X	X	X	X	X	X		X	
Enrollment	Meets with school district leadership in-person or virtually	X	X	X	X	X	X	X	X	X	X	X
	Conducts needs assessment with school districts to determine how TCHAT can best fit their needs		X	X		X	X	X	X		X	
	Obtains signed District Implementation Plans from school districts prior to launch			X		X			X		X	
	Sends individual welcome letters to principal, campus liaisons (CL), and technology coordinator at each campus				X		X		X			X

Enrollment	Provide school districts with resources for the TCHAT program (e.g., guidance on who to refer, list of TCHAT providers, etc.)	X		X	X	X	X	X	X	X	X	X	X
	Assigns clinician to each school district (e.g., for training, engagement, receiving referrals, etc.)			X	X							X	
	Trains school counselors/key personnel on TCHAT program	X	X	X	X	X	X	X	X	X	X	X	X
	Conducts one-on-one meetings with CLs to discuss specific processes at their school	X		X	X	X	X	X	X	X	X	X	X
	Works with school districts to identify point of contacts for TCHAT team			X	X	X	X	X	X	X	X	X	
Engagement	Sends newsletter to district leadership	X	X	X	X	X	X		X	X		X	
	Conduct CL groups to improve program experience					X							
	Conduct program review meetings with district leadership to improve program experience	X				X	X	X		X	X		X
	Provide individual consultations with school counselors		X	X	X	X	X	X		X	X	X	
	Provides TCHAT refresher trainings for key personnel	X		X	X	X	X	X	X	X	X	X	X
	Offers additional training opportunities for key personnel	X		X	X	X	X		X	X	X	X	X
	Provides CLs access to a dashboard with TCHAT and other mental health resources			X		X			IP		X		
	HRI staff go to schools once a week to provide more information on TCHAT and answer questions										X		
	Delivers TCHAT presentation to school staff	X		X	X	X	X	X	IP	X	X	X	X
	Conducts TCHAT presentations to parents and students	X		X		X	X	X	IP	X	X	X	
	Provides schools with TCHAT informational flyers to spread awareness about the program among school staff	X		X	X	X	X	X	X	X	X	X	X
	Provides schools with TCHAT informational flyers to spread awareness about the program among parents	X		X	X	X	X	X	X	X	X	X	X
	HRI staff promote TCHAT services at Back to School/Meet the Teacher events			X		X	X	X		X	X	X	
	Uses Community Health Workers (CHWs) to promote TCHAT										X		
	Provides reports to district leadership with metrics related to TCHAT implementation	X			X	X	X	X		X	X	X	
	Attends meetings with district leadership (ongoing basis)	X		X	X	X	X	X			X		
	Identifies (CLs) to facilitate the referral and scheduling process at schools	X		X	X	X	X	X	X	X		X	X

Service Delivery	CLs determine if TCHAT is the best fit for student (or if another school-based program would be better) before reaching out to family	X		X	X	X	X		X	X	X		
	School collects consent documents from family prior to submitting referral	X		X	X	X		X		X	X	X	X
	Receives referrals via web link	X	X	X	X	X	X	X	X			X	X
	Receives referrals via fax				X			X		X		X	
	Receives referrals via phone (and then Clinical Supervisor completes referral form)			X	X								
	Receives referrals via Virtual Health Network (VHN) system							X		X	X		
	EMR integrates with Trayt					X							
	HRI collects consent documents from family after receiving referral		X	X	X	X	X	X	X		X		X
	Categorizes referral forms as urgent (see student next business day) or not urgent	X		X	X	X	X	X					
	If needed, follows up with school counselor to ask questions about student (safety/risk assessment)	X		X		X	X	X	X		X	X	X
	Contacts family of referred student to provide more information about TCHAT	X	X	X	X	X	X	X	X	X	X	X	X
	Responds to emails/calls from school counselors prompting status updates	X	X	X	X	X	X	X	X	X	X	X	X
	Updates school district leadership on declines at monthly meetings	X								X	X		X
	Provides family with TCHAT welcome packet (patient version and parent version)	X						X		X			X
	Completes telephonic assessment with family to obtain intake information		X	X				X				X	
	Completes virtual intake session with family	X		X	X	X	X	X	X	X	X		X
	HRI schedules intake appointments	X	X	X	X	X	X	X	X	X	X	X	X
	School schedules intake appointments	X		X		X							
	TCHAT team sends school weekly reminders about upcoming appointments			X	X	X				X		X	
	If needed, provides case management (instead of 4 TCHAT sessions) to help student get connected with higher level of care	X		X	X	X	X					X	
	Provider assigns assessments/questionnaires for family to complete in Trayt prior to intake	X		X	X		X		X	X	X		X
	Provider assigns assessments to complete during intake session	X		X	X	X	X	X		X	X	X	X
	Offers school or home-based TCHAT sessions	X		X	X	X	X	X	X	X	X	X	X
	Offers school-based TCHAT sessions only								X				

Service Delivery	Offers home-based TCHAT sessions only	X										
	Provider may meet with patient in-person if they feel it's clinically necessary				X	X		X	X			
	Conducts entire intake session with parent (if patient is younger)	X	X	X	X		X	X	X		X	X
	Conducts entire intake session with parent (if patient is older)			X	X		X	X	X			X
	Conducts part of intake session with patient only (if patient is older)			X			X	X		X	X	X
	Conducts part of intake session with patient only (if patient is younger)			X				X	X	X	X	
	Requires parent to attend intake session only if medication evaluation					X			X			X
	HRI staff (e.g., MA, graduate student, CHW) go to schools to assist with appointments (e.g., checks in patient, obtains update from, assists with equipment, assessments, sits with patient/parent during interviews)							X		X	X	
	Provides medication management, if needed	X	X	X	X	X	X	X	X	X	X	X
	If long-term medication management is needed, refers student directly to TCHAT psychiatrist						X		X			X
	Intake conducted with therapist and psychiatrist	X		X			X		X			
	Intake conducted with therapist only	X	X		X	X	X	X	X	X	X	X
	Intake conducted with psychiatrist only						X	X	X	X		
	Clinician conducting interview develops treatment plan for patient					X	X	X	X	X	X	
	Therapist and psychiatrist develop treatment plan for patient	X		X		X	X	X	X			X
	Following intake, clinical team meets to determine treatment plan	X		X	X	X	X	X			X	X
	Assigns assessments to patient following intake	X		X		X	X	X	X	X	X	X
	Depending on availability for ongoing care, TCHAT sessions may be spread out to avoid gap in care following TCHAT	X		X		X			X	X	X	X
	Automated reminder sent to family before scheduled appointments	X		X		X	X	X			X	X
	HRI staff conducts reminder call to family or school prior to appointment			X	X	X		X		X	X	X
	Conducts entire follow-up session with parent (if patient is younger)	X		X	X		X	X	X	X	X	
	Conducts entire follow-up session with parent (if patient is older)			X	X			X	X	X	X	
	Requires parents to attend follow-up sessions only if medication is being discussed or clinician thinks parent should be present	X		X			X	X	X		X	X
	Utilizes residents/fellows for appointments			X	X	X	X				X	
	If long-term care will be needed, begins referral process after intake in order to ensure a smooth transition for student after completing TCHAT sessions	X		X		X	X	X	X	X	X	X
	Clinical team meets to discuss ongoing care recommendations	X		X	X	X	X	X			X	X

Service Delivery	Therapist and/or psychiatrist determine ongoing care recommendations for patient	X		X	X	X	X	X	X	X	X	X	X
	If ongoing care is needed, clinician provides psycho education on the importance of following through on treatment plan			X		X	X	X	X		X	X	X
	Provides family with support navigating mental health services, if needed	X	X	X	X	X	X	X	X	X	X	X	X
	Provides family with treatment summary		X	X	X	X	X	X	X		X		X
	Before discharging patient, assesses whether family needs any other assistance (e.g., social services referrals)			X		X	X	X	X		X	X	X
	Notifies school counselors when sessions are complete			X		X	X	X		X	X	X	X
	Sends report to school counselor (if family consented to sharing report)					X			X		X		X
	Follows up with family to make sure they were able to connect to referred provider for ongoing care	X		X		X	X	X	X	X		X	X

IP = In Process

CL = Campus Liaison

*HRI lead did not provide feedback on table after 3 follow-ups. Therefore, activities for HRI site have not been validate

HRI Process Mapping Results

- HRI process maps identify common practices, as well as organization-specific innovations developed to facilitate program implementation.
- Innovative strategies identified from CPAN HRI interviews include: promoting CPAN to past graduates through the HRI alumni program (outreach), bringing a laptop to CPAN outreach events to enroll PCPs in-person (enrollment), providing clinics with a “mock call” to demonstrate the process of calling into CPAN (engagement), and going beyond simply providing referrals by connecting PCPs directly with psychiatrists affiliated with the HRI (service delivery).
- Innovative strategies identified from TCHAT HRI interviews include: targeting school districts based on needs of services or resource mapping (outreach), obtaining signed District Implementation Plans from school districts prior to launch (enrollment), conducting campus liaison focus groups to improve program experience (engagement), and HRI staff going to schools to assist with TCHAT sessions (service delivery).
- The development of CPAN and TCHAT community-based networks is key to increasing access to mental health services throughout each HRI region. During this review, we identified 16 CPAN outreach strategies and 19 TCHAT outreach strategies being implemented by HRIs. This provides the opportunity to share outreach strategies across HRIs so teams can identify and consider new strategies that have been effective for other HRIs.
- Although many of the service delivery processes were consistent across HRIs, some differences were apparent.
- Some CPAN HRIs (n=5) ask for the patient’s zip code, school, and insurance at the beginning of each call in case it is later determined that a referral is needed for the patient, and a little more than half of HRIs (n=7) have the option to directly transfer PCPs to a psychiatrist at the time of the call (if they are available).
- Eight CPAN HRIs indicated that if a patient needs a referral, they determine if that patient attends a school with TCHAT, and, if so, recommends the patient goes through the TCHAT program. One HRI, in particular, has a very extensive process for this that can serve as a model for integrating CPAN and TCHAT programs (see TTUHSC Process Map in Appendix B).
- Most TCHAT HRIs (n=10) receive referrals via web link, but other options were mentioned. Four HRIs can receive referrals via fax, and two HRIs offer the option for campus liaisons to provide referrals over the phone (in which case, a TCHAT team member completes the referral form for them). In addition, one HRI is currently in the process of integrating their EMR with Trayt. Half of the HRIs (n=6) categorize referral forms as urgent (see student the next business day) or not urgent.
- Some TCHAT HRIs (n=4) provide case management (instead of four TCHAT sessions), when needed, to help connect students with a higher level of care. Most HRIs (n=10) require parents to

attend intake sessions if the patient is younger, but there was variation between and within HRIs on whether parents attend intake if the patient is older and follow-up sessions regardless of age.

- A majority of the HRIs utilize a clinical team to develop treatment plans (n=8) as well as ongoing care recommendations (n=9) for patients. In the case that ongoing care is recommended, most HRIs (n=8) provide psychoeducation to families on the importance of following through on the patient's treatment plan.
- During the HRI final review stage, several HRI leads expressed interest in learning more about processes used by other HRIs, providing insight into the usefulness of the maps as a learning tool that will help facilitate sharing of unique strategies and leveraging best practices.
- Given the geographic scope and large numbers of implementation sites, the process maps have potential to serve as a pragmatic tool that will help to identify best practices, and to leverage outreach efforts across HRIs to improve HRI-led enrollment of clinics, providers, and school districts. Comparison of process maps across organizations helps identify inconsistencies in current practices, and opportunities to identify topics for training or discussion to improve processes (e.g., potentially using the Project Echo-based sessions as a forum for program implementers to exchange lessons learned and implementation strategies).
- In addition, process maps can be a useful tool for HRIs to use internally (e.g., when onboarding new staff or to training existing staff on other program processes they are not directly involved with). One HRI lead mentioned that she uses their process map to orient her staff on the end-to-end processes involved in implementing the TCHAT program, including the school's role in submitting referrals and getting students set up for appointments.

CPAN Clinic Process Mapping Results

- There was variation in how the interviewed clinics used CPAN. Seven used it for both psychiatric consultations and obtaining referrals, four used it for psychiatric consultations only, and one used it for referrals only.
- All (n=12) clinics reported receiving brochures or other information about CPAN during the enrollment process, but only five clinics reported receiving any training from the HRI. Among the clinics that did not receive training, several (n=4) indicated that a training would have been helpful.
- Clinics mentioned that it would be helpful to receive more information upfront about when clinical staff can call in on behalf of the PCP as well as transparency about the process of calling in, including the patient information that would be collected by the call agent and/or psychiatrist.
- About half (n=7) of clinics reported receiving information from the HRI through email or monthly newsletters. Among clinics not receiving this information, a few (n=3) mentioned that they would like to receive ongoing communication and education about mental health topics from the HRI. Clinics indicated specific resources that would be helpful, including a list of types of therapies and community resources.

- All (n=12) clinics expressed a high need for mental health services in their community, and that they were grateful to CPAN as a resource.
- A couple (n=2) clinics indicated that CPAN consults could sometimes be too long. One clinic suggested that consults to be limited to 15 minutes or less.

TCHATT School District Process Mapping Results

- The decision-making process to enroll in TCHATT varied for school districts based on the size of the district. Less steps were involved for smaller districts, while larger districts had to go through a more extensive approval process.
- All school districts (n=12) reported receiving a TCHATT training from the HRI. Fewer school districts (n=5) also mentioned conducting internal trainings to notify other school personnel about the program, who to refer, and how to refer students.
- School districts reported different processes for communicating with parents about TCHATT. Three districts use a tailored approach in which other school personnel (e.g., a teacher who has a good relationship with the family) may reach out to the parents instead of the counselor. In another small school district, the counselor schedules in-person meetings with families to discuss TCHATT and obtain their written consent.
- There was variation in follow-up communication that school counselors reported from the HRI. Some (n=3) counselors mentioned that there is not much communication from the HRI after submitting referrals. They indicated that they would appreciate receiving status updates from HRIs on students going through TCHATT sessions. Conversely, several counselors (n=7) were very pleased with the level of communication they have had with the HRI. Counselors mentioned receiving brief updates between sessions and, in some cases, a final report with HRI recommendations for ongoing care. One counselor said that she has the opportunity to request a consult between herself and the provider before the student meets with the provider and that she sometimes attends follow-up sessions as well. An emphasis on communication between the HRI and school district came up in most interviews (n=10), but it was especially apparent for the smaller school districts.
- Several barriers were brought up during the interviews. A few school districts (n=5) mentioned that obtaining parental consent was their biggest barrier. Two of those districts felt that they could get better buy-in from parents if more TCHATT sessions were offered. Space was an issue for some school districts (n=3), since they only had one private room for TCHATT sessions. Two

“[The HRI representative] is always sending me updates, and she is really immediate with her responses when I contact her. She’s bilingual, so she can call the families and make direct contact with them, which really helps because our community really appreciates that kind of hands-on approach where you feel like it’s a family kind of relationship”

others mentioned that they had challenges utilizing TCHATT for younger children since telehealth appointments are not as engaging for them.

- All school districts (n=12) expressed a high need for TCHATT services and were very appreciative of the support they are receiving through the program.

"We have children with very severe mental health issues, and this program has been wonderful, just an incredible support for those children. Had [the TCHATT program] not been here, our children would not be receiving the services that TCHATT is providing"

Limitations and Next Steps

Initial process mapping interviews were conducted in March through May, 2021, so HRIs were at different levels of implementation at that time, especially for the TCHATT program. Some HRIs had only recently begun enrolling school districts, while others (especially HRIs with similar programs already in place) had more established processes. Clinics and school districts were also in different phases of implementation, depending upon when they enrolled in CPAN or TCHATT. Some of the school districts that we spoke with had not had a student begin TCHATT sessions yet, so they could only report on their implementation plan. It's likely that processes have changed (at the HRI, clinic, and school levels) since the data was initially collected. Another challenge was obtaining feedback from stakeholders following interviews. All stakeholders had the opportunity to review process maps following interviews; however, our team never received feedback from several of them (after three reminder emails). This was most challenging with clinic stakeholders, as we never received a response from four clinics. In addition, one school district and two HRIs never responded to our request for feedback. More recently, HRIs had another opportunity to review and validate their use of specific strategies when we asked them to review our HRI Synthesis Tables of Key Processes, but one TCHATT team never responded to our request (after three reminder emails). To try to account for this, our team reviewed their interview video again and read through their program reports to make sure we had as much information as possible about their strategies. Still, without a response from that TCHATT team, we cannot confirm whether the activities listed for them are accurate.

In Years 2 and 3, the external evaluation team will use process maps to guide program monitoring fidelity of implementation (comparing actual implementation with implementation as planned by HRIs), as well as facilitate sharing of outreach and implementation strategies across HRIs. We will continue to work closely with HRI teams to keep process maps updated throughout the evaluation. These maps will help guide quality improvement activities, including identifying underutilization of effective processes or existing resources to facilitate enrollment and implementation of the programs (e.g., providing program materials in Spanish to parents), and will facilitate feedback.

C. CPAN AND TCHAT DATA SOURCES

To support the external process and outcome evaluation, guided by the logic models and measures table, we designed and developed a multi-source external evaluation database, comprising: 1) existing data compiled by the Trayt-based data management system to track CPAN and TCHAT program referrals and services delivered by the HRI hubs; 2) data from External Evaluation team CPAN surveys with providers enrolled in CPAN; and 3) data from External Evaluation team TCHAT surveys with school staff at campuses enrolled in TCHAT. Our external evaluation provider- and school- targeted electronic surveys, conducted among a sample of program stakeholders, aimed to assess organizational factors and processes affecting program adoption and implementation from clinic and school stakeholder perspectives. The Constructs and Metrics Table specifies data sources for primary and secondary measures to inform the data analysis plan. The Constructs and Metrics Table, data collection instruments and protocols, and codebooks are included in Appendices C, D, E, & F. Specific results for the external evaluation surveys can found in Sections C3 and C4 of this report.

Key Terms

Metric Definitions for Tables and Figures Below:

- **HRI:** Health-related institution responsible for providing and implementing CPAN and TCHAT services. The following acronyms are used in this report to reference the health-related institutions:
 - BCM: Baylor College of Medicine
 - TAMUHSC: Texas A&M University / Baylor Scott and White
 - TTUHSC: Texas Tech University Health Science Center
 - TTUHCSEP: Texas Tech University Health Science Center at El Paso
 - UNTHSC: University of North Texas Health Science Center at Fort Worth
 - UTDell: Dell Medical School at the University of Texas at Austin
 - UTHSCH: University of Texas Health Science Center at Houston
 - UTHSCSA: University of Texas Health Science Center at San Antonio
 - UTHSCT: University of Texas Health Science Center at Tyler
 - UTMB: University of Texas Medical Branch at Galveston
 - UTRGV: University of Texas Rio Grande Valley
 - UTSW: University of Texas Southwestern Medical Center
- **Rural-Urban Continuum Code (RUCC)³:** The Rural-Urban Continuum Codes are a classification schema developed by U.S. Department of Agriculture that distinguishes metropolitan (metro) counties by the population size of their metro area, and nonmetropolitan (nonmetro) counties by degree of urbanization and adjacency to a metro area. The codes provided in this report are based on 2013 RUCC codes, the most-recent version available. Counties are classified as follows: urban (RUCC 1-3), nonmetropolitan (RUCC 4-7), and non-metropolitan rural (RUCC 8-9).

- **CDC/ATSDR Social Vulnerability Index (SVI)⁴:** Center for Disease Control (CDC)/ Agency for Toxic Substances and Disease Registry (ATSDR) Social Vulnerability Index. SVI Scores are a composite measure based on 15 U.S. census variables that represent social factors across four main domains, socioeconomic status (poverty level, employment, income, and education), household composition and disability, minority status and language, and housing type and transportation access. These domains are measured by 15 variables measured at the census tract or county level obtained from the American Community Survey conducted by the U.S. Census Bureau. SVI scores in this report are from 2018. SVI scores range from 0 (least vulnerable) to 1 (most vulnerable).
- **CPAN Clinic Outreach List:** The Texas overall list of clinics was developed from the list of Texas providers provided by COSH to HRIs. After removing provider-level information, we identified unique clinics as unique locations using latitudes and longitudes. These latitude and longitudes were obtained by running the clinic addresses associated with staff through a Google Geocode API.

CPAN-Specific Definitions for Tables and Figures Below:

- **Clinic Type:** Clinic classification in Trayt (Family Medicine, Pediatrics, Integrated, or Other).
- **Enrolled Clinic:** Any unique clinic identified in the Trayt Clinic Directory database with an “Active” or “Registered” account status and a “Signed” agreement status.
- **Enrolled Clinic Staff (Providers):** Any provider or clinic staff with an “Active” or “Active-No clinic” clinic staff account status in the Trayt Clinic Directory database.
- **CPAN Reach:** The absolute number and proportion of providers and clinics enrolled in the CPAN network.
- **CPAN Participants Served:** The absolute number and proportion of provider mental health consultation sessions completed for a pediatric patient.
- **CPAN Call/Consult:** A completed provider mental health consultation session with HRI staff for a pediatric patient.

TCHATT-Specific Definitions for Tables and Figures Below:

- **NCES:** National Center for Education Statistics.
- **TEA:** Texas Education Agency.
- **Enrolled Campus:** Any campus whose district has a memorandum of understanding (MOU) in place from the Centralized Operations Support Hub (COSH) internal team’s list of TEA campuses involved in TCHATT.
- **Student Referral:** Referral made by school TCHATT liaison to HRI.

- **Open Referral:** Student referral with associated documents in TRAYT and is active pending enrollment
- **Enrolled Referral:** A referral that has completed the consent process. The student is now an active patient with a TCHAT ID.
- **Active Referrals:** Total number of open referrals pending enrollment and enrolled referrals.
- **Decline Consent to Service:** The school TCHAT liaison contacted the student's family and the family did not consent to TCHAT services.
- **Decline Consent to Care:** The HRI contacted the student's family and the family did not consent to TCHAT care.
- **Encounter:** At least one scheduled session between an active patient and TCHAT care team. An encounter may be comprised of several "sessions" with one or more care team members that occur on the same calendar day.
- **Standard Episode of Care:** Up to five completed TCHAT encounters.
- **Extension:** At end of encounter five TCHAT care team requests extension of service to cover patient's needs.

Overview of Trayt

The section that follows provides a secondary analysis of process and outcome evaluation data compiled from Trayt. First, we provide an overview of the Trayt-based data platform for CPAN and TCHAT. Next, we provide a timeline of key dates related to data collection and acquisition for Trayt. Limitations and suggested future next steps for Trayt are also provided followed by specific results related to program reach and services delivered from CPAN and TCHAT.

The Trayt-based CPAN and TCHAT Data Platform

The Trayt platform serves as the data management system of the CPAN and TCHAT programs. Designed by Trayt.health, Trayt is a relational database, customized to document the exchange of information and facilitate implementation and coordination of the community-based mental health programs targeting Texas youth in school and community clinic settings.

Analysis of CPAN and TCHAT overall youth reached and services delivered in this report are based on TCMHCC Trayt data, as available, between May 1, 2020 and August 31, 2021.

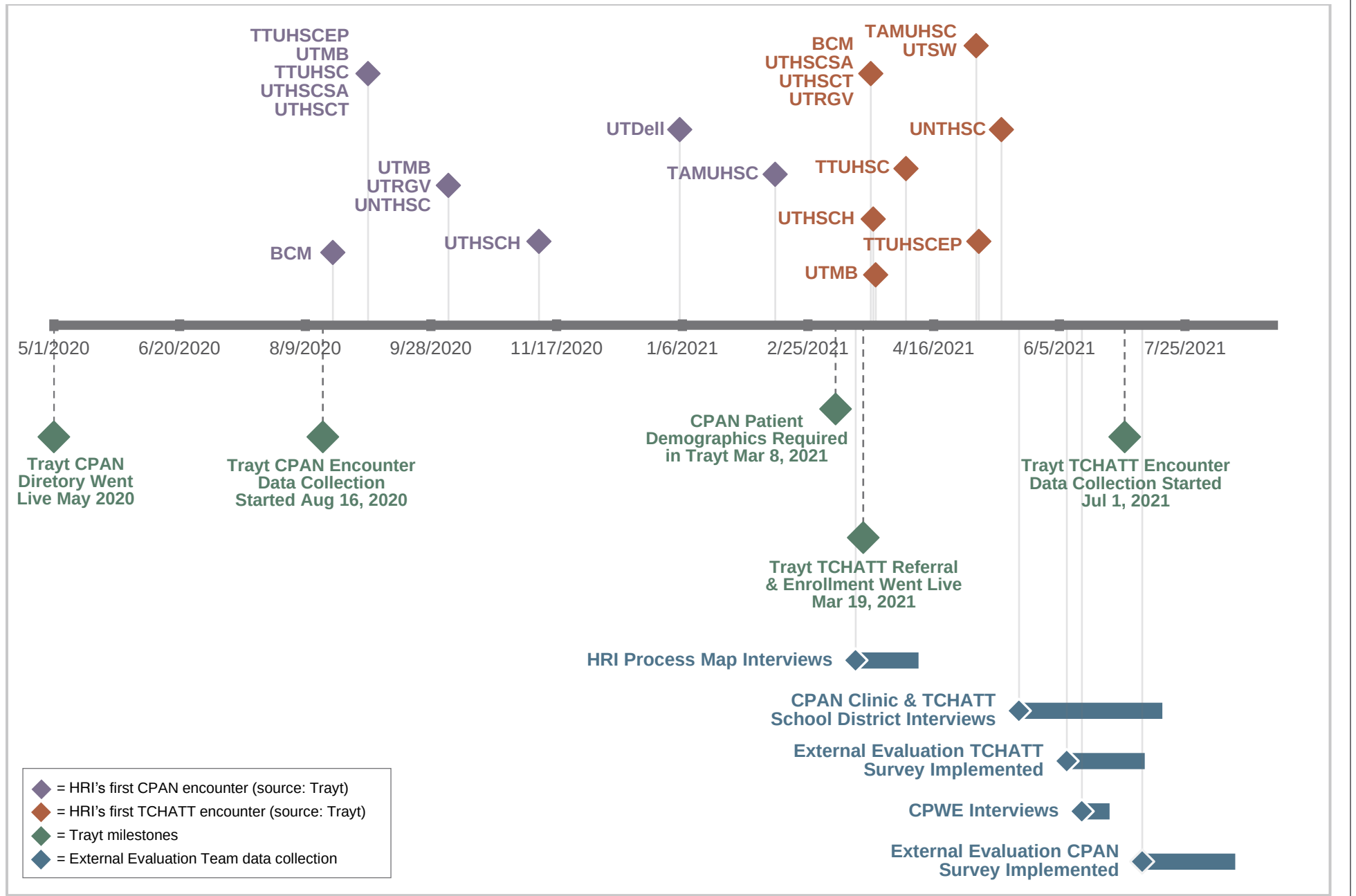
Trayt-CPAN tracks provider enrollment and consultation sessions with HRI psychiatry specialists. Trayt CPAN directory features, which track provider and clinic enrollment, went "live" in May 2020. Documentation of encounters (i.e., consultations), however, was not recorded in Trayt until August 16, 2020. Key dates related to the timing of when data collection began in Trayt (and when first consults were documented by each HRI) is provided in Figure 5 below.

Trayt-TCHATT tracks student referrals, enrollment, and TCHAT sessions with HRI therapists. Trayt referral and enrollment features went “live” on March 19, 2021. Documentation of encounters (i.e., TCHAT sessions), however, was not recorded in Trayt until July 1, 2021. Key dates related to the timing of when data collection began in Trayt (and when TCHAT sessions were first documented by each HRI) is provided in Figure 5 below.

Commentary on Trayt Database Regarding Evaluation

- Trayt design and programming have been ongoing. The External Evaluation team received the first data extraction from Trayt representing CPAN clinic and clinic staff directories in March 2021. The first CPAN encounter-level data were available to the External Evaluation team in April 2021. TCHAT-related student referral data were available to the External Evaluation team in May 2021. TCHAT data tracking services provided to students were recorded starting in July 2021 (Figure 5).
- The initial focus of the Trayt design was to facilitate implementation, with less emphasis on preparing data for analysis. Before analysis, the external evaluator reconciled data. Data cleaning steps required and completed by the External Evaluation are provided in Appendix E).

Figure 5. External Evaluation of the TCMHCC Data Acquisition Milestones and Activities



Trayt Future Steps

The Trayt data system is a complicated, evolving system. In response, a small, focused group with members from Trayt, the internal evaluation team and the external evaluation team meets regularly to discuss general technical issues and definitions to ensure all parties have the same understanding of the data. We recommend this collaborative approach continue as a priority. This group is presently meeting to discuss issues and implement solutions in several areas of emphasis, and these highlight the recommended next steps for the Trayt system:

- Documentation: There is a need for centralized documentation covering both the system and the data the system generates, including linking variable names, description, and applicability. Other documentation around the general data procedures prior or in addition to the Trayt data is also needed.
- Programming and training to promote accurate data entry: To ensure quality of data, additional data programming rules can help to minimize data entry errors (e.g., impossible dates) and to minimize missing data. Staff and user training to promote accurate data entry (e.g., to minimize duplicate records, incomplete data entry, or missing data) will also promote cleaner datasets.
- Data cleaning: Extensive data cleaning was necessary in order to conduct analyses (See Appendix E for external evaluation data cleaning protocols). Because not all data entry is amenable to programming solutions and based on the extensive data cleaning that was required, we recommend routine data cleaning checks to minimize the time needed to clean datasets at a later stage.

While a group meets regularly to discuss the items above, there is a need for a central point of contact between the teams as well as the coordinate the documentation across sources. Thus, we support the search for a dedicated Trayt data manager be added to the team to 1) develop data cleaning protocols to support accurate Trayt data entry, 2) develop and conduct Trayt database user guides for all system users to prevent data entry errors, 3) develop and conduct Trayt data entry training for all CPAN and TCHAT staff, 4) to coordinate data documentation, and 5) conduct routine data cleaning activities to maintain accurate system records.

Trayt programmers continue to update programming to meet the needs of tracking services delivered and received. Efforts are underway to develop data tracking fields in the Trayt-based system to provide additional usable data to support program monitoring, evaluation and quality improvement activities.

D. PROCESS AND OUTCOME EVALUATION: CPAN & TCHAT

D1. CPAN: REACH AND SERVICES DELIVERED

Background

The TCMHCC CPAN overarching goal is to increase primary care providers' access to consultation services to improve the care of children and adolescents with behavioral health needs. A network of child psychiatry access centers, supported by 12 HRI teams, serve as hubs for each regional network, particularly reaching vulnerable communities. Combined, these HRI hubs extend youth (under 18 years of age) access to mental health support across Texas. The program also provides pediatricians and primary care providers serving youth with psychiatry training opportunities. To evaluate the network in the early phase of CPAN implementation (i.e., first 15 months), process and outcome evaluation focuses on CPAN clinic/provider reach (to develop an extensive CPAN provider network) in terms of enrollment of health clinics and physicians serving Texas youth. We also assess CPAN delivery in terms of absolute numbers of consultation sessions, as well as type of mental health consultations provided to community providers. Quantified analysis of CPAN is based on data collected in Trayt, designed to manage clinic and provider enrollment and participation in CPAN. Based on Trayt data, below we describe and examine factors influencing reach and delivery of CPAN services.

Clinic Enrollment

CPAN REACH REFERS TO THE ABSOLUTE NUMBER AND PROPORTION OF PROVIDERS AND CLINICS ENROLLED IN THE CPAN NETWORK.

May 2020-August 2021

This section presents data on the characteristics of the clinics or clinic systems enrolled in CPAN by HRI and clinic type. Table 1 presents the distribution of clinic and primary care provider enrollment by HRI and compares it to the number of clinics targeted for enrollment on the initial outreach list obtained by COSH. Overall, the CPAN network has enrolled 1,090 clinics, representing 6,729 providers across Texas. From May 2020 to August 2021, HRIs enrolled 13.6% of targeted clinics across Texas.

Table 1. Enrolled CPAN Clinics by HRI

	Clinics Targeted for Enrollment on Outreach List ^b n (%)	Total Clinic Enrollment ^a n (%)	Total Provider Enrollment ^a n (%)
All HRIs	8024 (100%)	1090 (100%)	6729 (100%)
BCM	759 (9.5%)	106 (9.7%)	770 (11.4%)
TAMUHSC	333 (4.2%)	58 (5.3%)	402 (6.0%)
TTUHSC	518 (6.5%)	81 (7.4%)	630 (9.4%)
TTUHSCPE	244 (3.0%)	47 (4.3%)	260 (3.9%)
UNTHSC	685 (8.5%)	71 (6.5%)	465 (6.9%)
UTDeI	784 (9.8%)	163 (15.0%)	793 (11.8%)
UTHSCSA	935 (11.7%)	68 (6.2%)	385 (5.7%)
UTHSCH	108 (13.5%)	43 (3.9%)	580 (8.6%)
UTHSCT	356 (4.4%)	124 (11.4%)	620 (9.2%)
UTMB	297 (3.7%)	79 (7.2%)	425 (6.3%)
UTRGV	433 (5.4%)	24 (2.2%)	121 (1.8%)
UTSW	1599 (19.9%)	226 (20.7%)	1278 (19.0%)

(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021).

(b) Data source: List of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased from the Texas Medical Association by COSH.

Table 2 presents enrolled CPAN clinic characteristics with respect to clinic specialty type. It excludes 75 clinics with missing clinic specialty. The majority of enrolled clinics comprise pediatric clinics or clinics designated as both family and pediatric.

Table 2. Enrolled CPAN Clinics by Clinic Type and HRI, n = 1,015

	Total Clinic Enrollment ^a n (Column %)	Total Clinic Enrollment with Clinic Type Recorded n (Column %)	Pediatrics ^a n (Row %)	Family Medicine ^a n (Row %)	Integrated (Family & Pediatrics) ^a n (Row %)	Other ^b n (Row %)
All HRIs	1090 (100%)	1015 (100%)	455 (44.8%)	275 (27.1%)	234 (23.1%)	51 (5.0%)
BCM	106 (9.7%)	104 (10.2%)	88 (83.0%)	11 (10.4%)	5 (4.7%)	0 (0%)
TAMUHSC	58 (5.3%)	57 (5.6%)	6 (10.3%)	24 (41.4%)	25 (43.1%)	2 (3.4%)
TTUHSC	81 (7.4%)	81 (8.0%)	26 (32.1%)	34 (42.0%)	21 (25.9%)	0 (0%)
TTUHSCEP	47 (4.3%)	36 (3.5%)	20 (42.6%)	7 (14.9%)	4 (8.5%)	5 (10.6%)
UNTHSC	71 (6.5%)	69 (6.8%)	30 (42.3%)	33 (46.5%)	4 (5.6%)	2 (2.8%)
UTDell	163 (15.0%)	159 (15.7%)	61 (37.4%)	21 (12.9%)	70 (42.9%)	7 (4.3%)
UTHSCSA	68 (6.2%)	61 (6.0%)	36 (52.9%)	10 (14.7%)	11 (16.2%)	4 (5.9%)
UTHSCH	43 (3.9%)	19 (1.9%)	13 (30.2%)	1 (2.3%)	5 (11.6%)	0 (0%)
UTHSCT	124 (11.4%)	124 (12.2%)	30 (24.2%)	53 (42.7%)	33 (26.6%)	8 (6.5%)
UTMB	79 (7.2%)	62 (6.1%)	20 (25.3%)	8 (10.1%)	24 (30.4%)	10 (12.7%)
UTRGV	24 (2.2%)	24 (2.4%)	17 (70.8%)	3 (12.5%)	4 (16.7%)	0 (0%)
UTSW	226 (20.7%)	219 (21.6%)	108 (47.8%)	70 (31.0%)	28 (12.4%)	13 (5.8%)

(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021). Clinic Type is missing for 75 (6.9%) of enrolled clinics.

(b) No information available to describe "Other" category.

Clinics Reached by Geographic Characteristics

A priority of CPAN is to serve at-risk and underserved children and adolescents. To do this, we examined clinics reached and served by geographic location and social vulnerability at the community level. To characterize the types of clinics/providers reached by geographic characteristics, we examined the location of clinics and characteristics of the surrounding community. Table 3 and Figures 6a-b present the distribution of enrolled CPAN clinics by geographic classifications defined by county-level Rural-Urban Continuum Codes (RUCC). The RUCC coding from the USDA Economic Research Service RUCC categorizes areas by urban (codes 1-3), nonmetropolitan (codes 4-7), and non-metropolitan rural (codes 8-9).

A PRIORITY OF CPAN IS TO SERVE AT-RISK AND UNDERSERVED CHILDREN AND ADOLESCENTS.

- When compared to the geographic spread of all clinics serving Texas youth identified on the Texas Medical Association distribution list, the general trend is that there are more CPAN enrolled clinics in non-metropolitan areas (13.5%) compared with Texas clinics overall that are based on non-metro areas (3.7%).
- CPAN clinics coverage includes 1.3% enrolled clinics based in rural communities compared with 3% of clinics serving youth based in rural areas throughout Texas (see Table 3).
- Figure 6a displays the geographic distribution of clinics enrolled in CPAN across Texas. Figure 6b presents a more granular distribution of RUCC designations at the census block group (CBG) level for metropolitan areas, represented in the Dallas, Austin and Houston metropolitan area maps below. The CBG maps are intended to help demonstrate the variability of RUCC characteristics within the most densely populated urban areas.

Table 3. Enrolled CPAN Clinics by Rural-Urban Continuum Designation

	Total Enrolled Clinics ^a n (%)	Clinics on Outreach List ^b n (%)
2013 RUCC Code^c	1086 (100%)	8024 (100%)
Metro	924 (85.1%)	7484 (93.3%)
Non-metro	147 (13.5%)	297 (3.7%)
Rural	15 (1.3%)	243 (3.0%)

(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021). 4 clinics missing RUCC codes (USDA could not calculate the RUCC code).

(b) Data source: List of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased from the Texas Medical Association by COSH.

(c) 2013 Rural-Urban (RUCC) Continuum Codes, USDA Economic Research Service, U.S. Department of Agriculture. RUCC Codes 1-3 = Metro; RUCC Codes 4-7 = Nonmetro; RUCC Codes 8-9 = Nonmetro, completely rural.

Figure 6a. Enrolled CPAN Clinics^a by Rural-Urban Continuum at the County-Level

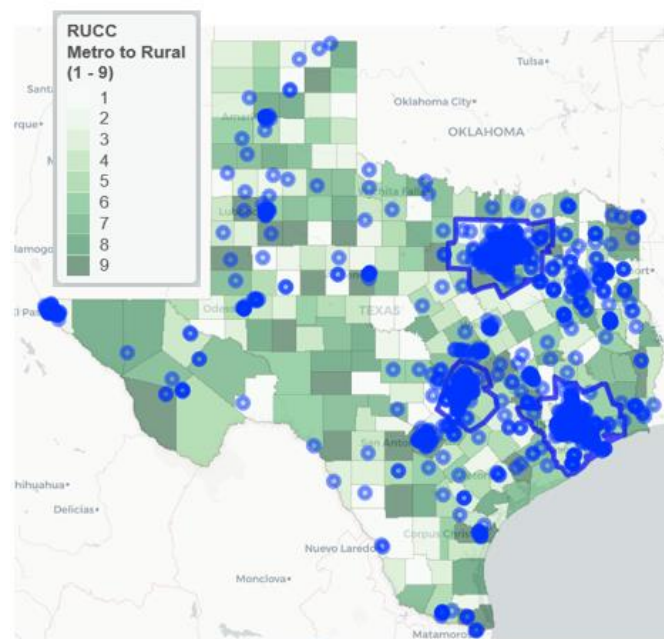
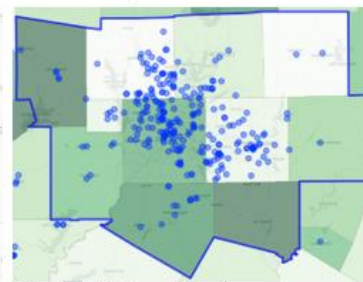
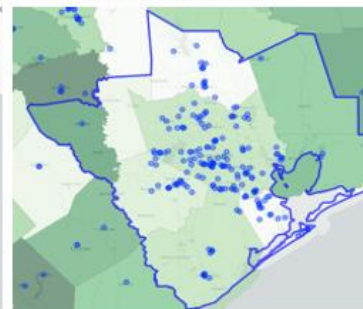


Figure 6b. Enrolled CPAN Clinics^a by Rural-Urban Continuum at the Metropolitan Area Census Block Group Level

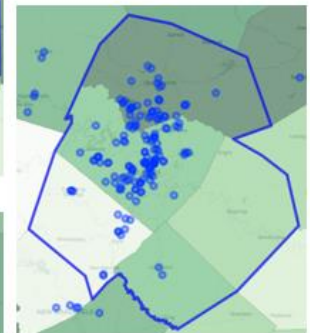
Dallas Metropolitan Area



Houston Metropolitan Area



Austin Metropolitan Area



(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021). 4 clinics missing RUCC codes.
(b) Data source: 2013 Rural-Urban (RUCC) Continuum Codes, USDA Economic Research Service, U.S. Department of Agriculture. RUCC Codes 1-3 = Metro; RUCC Codes 4-7 = Nonmetro; RUCC Codes 8-9 = Nonmetro, completely rural.

We also assessed whether enrolled CPAN clinics resided in high-priority populations with regard to community-level social vulnerability, which includes a lack of or limited access to mental health providers and/or a higher need for mental health services due to complex social, economic and household factors. Table 4 and Figures 7a-b, present the distribution of enrolled CPAN clinics by CDC/ATSDR Social Vulnerability Index (SVI) score. The SVI measure comprises 15 factors across the following domains: socioeconomic position, household composition and disability, minority status and language, and housing type and transportation (see Metric Definitions on page 32 for a detailed description of the SVI measure.) The SVI enables geographic modeling of clinics by county-level social vulnerability scores. The county-level measure provided in Table 4 likely masks variation in SVI within urban counties where SVI scores vary at the census block group (CBG) levels. The metropolitan area CVI maps provide the more granular representation of SVI scores at the CBG level for the Houston, Dallas and Austin metropolitan areas (see Figures 7a & 7b).

- 44.5% of clinics enrolled are located in areas with the highest two quintiles of vulnerable counties (SVI score over 0.6), compared with 53.9% of all clinics targeted for enrollment (see Table 4).
- Proportionally more clinics are enrolled in the lower to moderately vulnerable counties, (SVI score 0.2 - 0.6) and least vulnerable counties (SVI score < 0.2) (see Table 4). These county-level summary scores likely do not take into consideration variation of SVI scores within urban counties.

Table 4. Enrolled CPAN Clinic by County-Level Characteristics: The Social Vulnerability Index

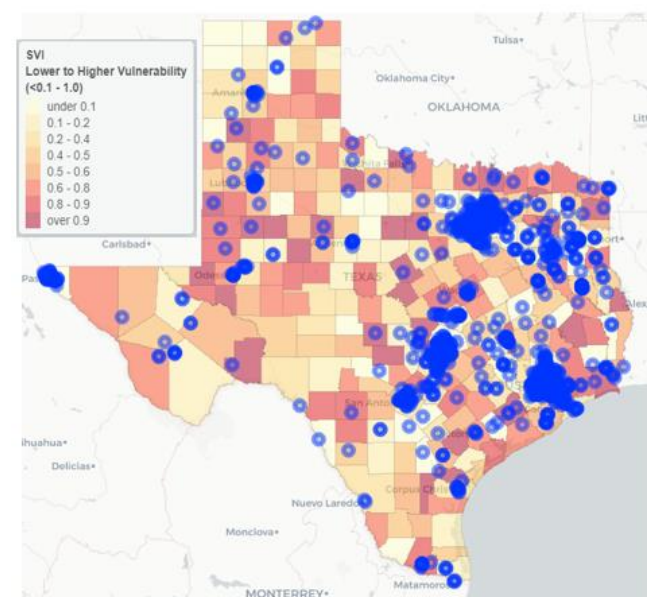
	CPAN Enrolled Clinics ^a n (%)	Clinics on Outreach List ^b n (%)
Total Clinics	1086 (100%)	8024 (100%)
SVI Scores^c		
(Lowest to Highest)		
<0.2 (least vulnerable)	304 (28.0%)	1977 (24.6%)
0.2-0.4	205 (18.9%)	1325 (16.5%)
0.4-0.6	94 (8.7%)	400 (5.0%)
0.6-0.8	377 (34.7%)	3538 (44.1%)
0.8+ (most vulnerable)	106 (9.8%)	784 (9.8%)

(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021); 4 clinics missing SVI Scores.

(b) Data source: List of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased from the Texas Medical Board by COSH.

(c) County-level social vulnerability index data from the CDC, 2018 (SVI-2018; <http://svi.cdc.gov/>).

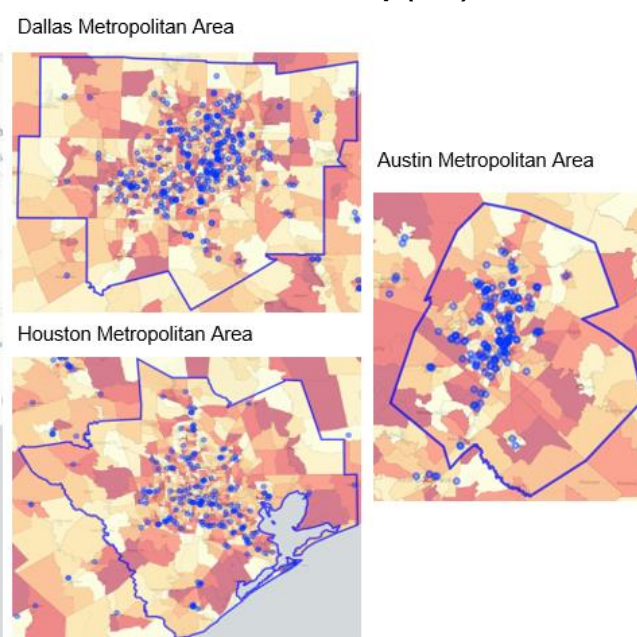
Figure 7a. Enrolled CPAN Clinics^a by Social Vulnerability Index^b at the County-Level



(a) Data source: Trayt CPAN Clinic and Clinic Staff Directory Data (May 1 2020-August 31, 2021). 4 clinics missing SVI Scores.

(b) County-level social vulnerability index data from the CDC, 2018 (SVI-2018; <http://svi.cdc.gov/>).

Figure 7b. Enrolled CPAN Clinics^a by Social Vulnerability Index^b at the Census Block Group (CBG)-Level



CPAN Delivery Outcomes

This section describes delivery of CPAN services by consultation call characteristics overall and by HRI, as well as characterizes services delivered (Tables 5-9, Figures 8-9).

Consultation Call Characteristics

- 3,891 CPAN calls were completed across all HRIs between August 16, 2020 and August 31, 2021, with a general pattern of call volume increasing overtime (Figure 8). Monthly calls by HRI fluctuated and are presented in Appendix F, Table 1 and Figure 1.
- The majority of callers were physicians (61.9%) and worked in pediatric clinics (61.9%) (Table 5).

- The same general pattern of increasing call volume over time was found for physician-initiated calls (Figure 9).

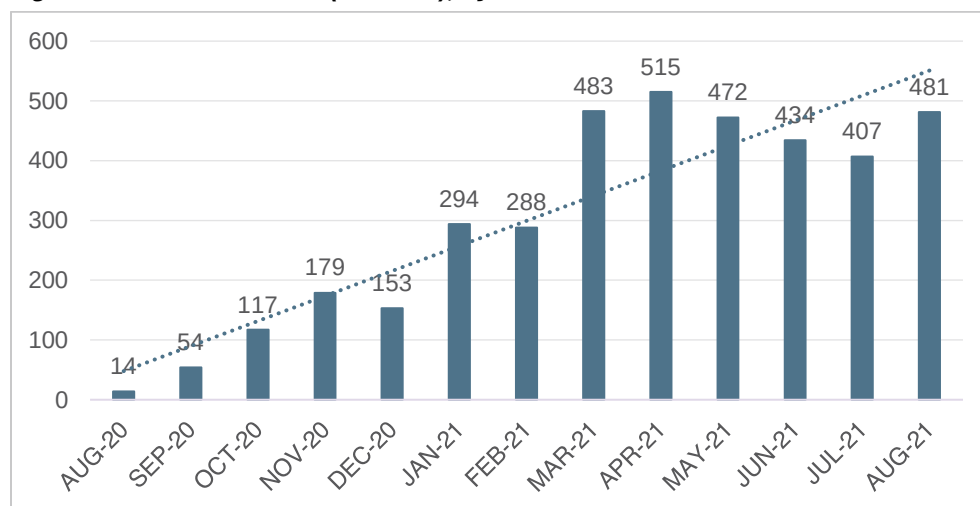
Table 5. CPAN Clinic Consultation Calls: Characteristics of Clinic and Individual Users

	Total CPAN Calls ^a n = 3891
Clinic Type	
Pediatrics	2408 (61.9%)
Integrated (Family & Pediatrics)	597 (15.3%)
Family Medicine	261 (6.7%)
Other	37 (1.0%)
Missing ^b	588 (15.1%)
Provider/Staff Role	
Physician	2409 (61.9%)
Medical Director	526 (13.5%)
Nurse Practitioner	400 (10.3%)
Referral/Nurse Coordinator	224 (5.8%)
Resident	163 (4.2%)
Physician Assistant	72 (1.9%)
Counselor	50 (1.3%)
Office Manager	20 (0.5%)
Learners- Nurse Practitioner	3 (0.1%)
Missing ^b	24 (0.6%)

(a) Data Source: CPAN Encounter-level Extract, Truist. August 16, 2020 through August 31, 2021.

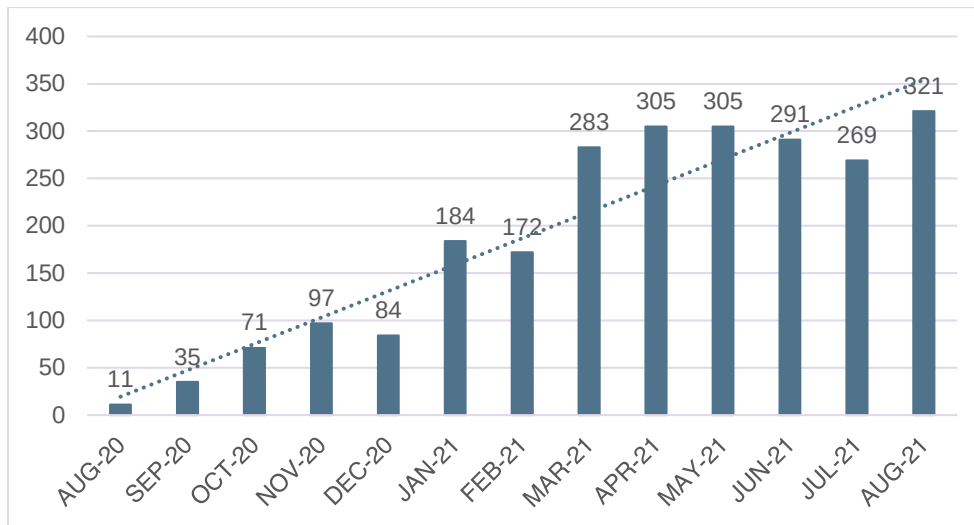
(b) Missing clinic and clinic staff enrollment statuses are attributed to encounters with a clinic that could not be verified by external team's data cleaning process

Figure 8. Total CPAN Calls^a (n = 3891), by Month



(a) Data Source: CPAN Encounter-level Extract, Truist. August 16, 2020 through August 31, 2021.

Figure 9. Total CPAN Calls Made by a Physician^a (n = 2428) by Month



(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

Table 6 provides the number of clinics with at least one consultation call with a CPAN provider. Among enrolled clinics, 339 (31.1%) clinics had at least one call.

Table 6. Enrolled CPAN Clinics by HRI, August 16, 2020 to August 31, 2021

	Total Clinics n (Column %)	Clinics with No Calls ^a n (Row %)	Clinics with At Least One Call ^a n (Row %)
HRI	1090 (100%)	751 (68.9%)	339 (31.1%)
BCM	106 (9.7%)	70 (66.0%)	36 (34.0%)
TAMUHSC	58 (5.3%)	49 (84.5%)	9 (15.5%)
TTUHSC	81 (7.4%)	44 (54.3%)	37 (45.6%)
TTUHSCPE	47 (4.3%)	29 (61.7%)	18 (38.3%)
UNTHSC	71 (6.5%)	54 (76.1%)	17 (23.9%)
UTDell	163 (15.0%)	103 (63.2%)	60 (36.8%)
UTHSCSA	68 (6.2%)	39 (57.4%)	29 (42.6%)
UTHSCH	43 (3.9%)	31 (72.1%)	12 (27.9%)
UTHSCT	124 (11.4%)	92 (74.2%)	32 (25.8%)
UTMB	79 (7.2%)	62 (78.5%)	17 (21.5%)
UTRGV	24 (2.2%)	19 (79.2%)	5 (20.8%)
UTSW	226 (20.7%)	159 (70.4%)	67 (29.6%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

Table 7 describes characteristics of HRI assistance to providers calling for consultation services. Overall, 3,891 CPAN calls were made. Key results about these calls are follow, with specific results provided in the table.

- 1204 (30.9%) calls were from-first time callers.
- The majority of CPAN physicians called for referral assistance and medication management consultations.
- The majority of calls seeking support for medication management, behavioral management, assessment, and diagnosis resulted in an assignment to a psychiatrist.

Table 7. CPAN Clinic Consultation Calls: Characteristics of HRI Call Assistance to Providers

	All CPAN Calls ^a n (Column %)	CPAN Calls Not Assigned to a Psychiatrist ^a n (Row %)	CPAN Calls Assigned to a Psychiatrist ^a n (Row %)
Total Calls	3891 (100%)	2331 (59.9%)	1778 (45.7%)
First Time PCP Consult	1204 (30.9%)	544 (45.2%)	660 (54.8%)
Call About a Specific Patient^b			
No	173 (4.4%)	116 (67.1%)	57 (32.9%)
Yes	3718 (95.6%)	1997 (53.7%)	1721 (46.3%)
Number of Reasons for Call (Mean=1.3)			
No stated reason ^c	22 (0.6%)	22 (100.0%)	0 (0.0%)
1 stated reason	2921 (75.1%)	1877 (64.3%)	1044 (35.7%)
2 stated reasons	742 (19.1%)	171 (23.0%)	571 (77.0%)
3 stated reasons	156 (4.0%)	37 (23.7%)	119 (76.3%)
4 or more stated reasons	50 (1.3%)	6 (12.0%)	44 (88.0%)
Stated Reason for Call^d			
Referral Assistance	1902 (48.9%)	1435 (75.4%)	467 (24.6%)
Medication Management	1643 (42.2%)	177 (10.8%)	1466 (89.2%)
General Resources	771 (19.8%)	601 (78.0%)	170 (22.0%)
Behavioral Management	291 (7.5%)	60 (20.6%)	231 (79.4%)
Assessment	279 (7.2%)	57 (20.4%)	222 (79.6%)
Diagnosis	199 (5.1%)	24 (12.1%)	175 (87.9%)
Emergency Situation^e			
No	3712 (95.4%)	2014 (54.3%)	1698 (45.7%)
Yes/Unsure ^f	177 (4.5%)	97 (54.8%)	80 (45.2%)
Suicide	112 (63.3%)	64 (57.1%)	48 (42.9%)
Violence	25 (14.1%)	14 (56.0%)	11 (44.0%)
Physical safety	6 (3.4%)	4 (66.7%)	2 (33.3%)
Other	46 (26.0%)	22 (47.8%)	24 (52.2%)
Recommended Consult Follow-up			
Assign to someone else	2467 (63.4%)	778 (31.5%)	1689 (68.5%)
I will continue with clinical consultation	871 (22.4%)	782 (89.8%)	89 (10.2%)
No consultation needed	553 (14.2%)	553 (100.0%)	0 (0.0%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

(b) Calls not about a specific patient can be for referrals, general resources, or to enroll in CPAN. Some calls may evolve into a consultation for a specific patient.

(c) Calls with no stated reason were made early in the program (August - September 2020). After that period, it became mandatory for PCPs to state their reason for calling.

(d) A PCP may report more than 1 reason for calling; results will not sum up to 100%.

(e) Excludes 2 calls that did not document if the call was about an emergency situation.

(f) A PCP may report more than 1 emergency situation; results will not sum up to 100%.

Table 8 provides the characteristics of CPAN call back times among calls assigned to a psychiatrist and the characteristics of HRI call assistance to providers. Figure 10 provides the characteristics of CPAN call back times by month. Key results follow, with specific results provided in the table.

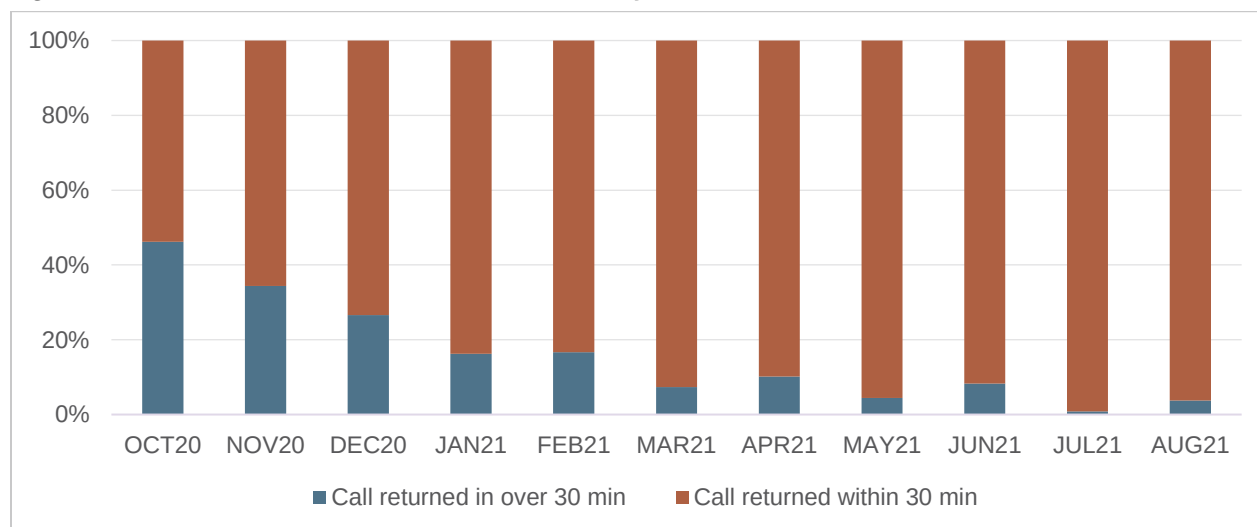
- Among calls assigned to a psychiatrist, 71.9% of calls occurred among PCPs who requested a call back time within 30 times.
- Among calls that were assigned to a CPAN psychiatrist and subject to a 30-minute call back window, 61.2% of calls were returned within 30 minutes.
- The proportion of PCP calls returned by a CPAN psychiatrist within 30-minutes of the PCP's initial inquiry has improved since the start of the program.

Table 8. Characteristics of CPAN Call Back Times Among Calls Assigned to a Psychiatrist

	CPAN Calls Assigned to a Psychiatrist ^a n = 1778
Call Response	
PCP connected directly to psychiatrist	89 (5.0%)
PCP scheduled specific call back time	341 (19.2%)
PCP requested call back within 30 min	1279 (71.9%)
Call Back Time^b	
Mean (SD) (minutes)	19.4 (47.6)
Median (Min, Max) (minutes)	10.5 (0.1, 729.2)
Call returned within 5 min	343 (26.8%)
Call returned in 5-30 min	783 (61.2%)
Call returned in over 30 min	153 (12.0%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. 69 (3.9%) calls initially assigned to a psychiatrist were missing a call back time. Calls may be missing call back information if the PCP requested to be contacted via email/text rather than phone.

(b) Call-back time calculated for 1273 (71.6%) calls that were assigned to a CPAN psychiatrist and subject to a 30-minute call back window. Excludes 6 calls that were returned by the CPAN psychiatrist in more than 1 day.

Figure 10. Characteristics of CPAN Call Back Times^a by Month

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

The following section describes delivery of CPAN services by patient characteristics (Tables 9-12, Figures 11-13).

Patient Characteristics

Prior to March 8, 2021, patient demographic fields were not required; therefore, if a provider did not wish to share this information, they selected “Decline” or left the fields blank. Most missing patient demographic fields are missing for CPAN consults that occurred prior to March 8, 2021. Of the 892 (24.0%) calls missing a patient’s race and ethnicity, 875 (98.1%) were calls made before March 8, 2021.

To understand the patient population served, we examined delivery of CPAN by patient characteristics.

In Table 9, the proportion of calls assigned to a psychiatrist is presented by patient characteristics. Among CPAN calls logged in Trayt (n=3718), 2351 (63.2%) calls recorded patients’ race and ethnicity. Due to the large proportion of “Missing” (24.0%) and “Declined” (12.8%) data for this field,

caution must be used when interpreting the population of patients reached and served by race and ethnicity. Figures 11-13 present the distribution of gender, age, and race/ethnicity of patients served by CPAN psychiatrists.

Table 9. Characteristics of Patients Served by a CPAN Psychiatrist from August 16, 2020 to August 31, 2021 (Calls, n = 3718)

	Total CPAN Calls About a Specific Patient ^a (n = 3718) n (Column %)	CPAN Calls Not Assigned to a Psychiatrist ^a (n = 1997) n (Row %)	CPAN Calls Assigned to a Psychiatrist ^a (n = 1721) n (Row %)
Gender			
Female	2109 (56.7%)	1144 (54.2%)	965 (45.8%)
Male	1578 (42.4%)	832 (52.7%)	746 (47.3%)
Other	31 (0.8%)	21 (67.7%)	10 (32.3%)
Age (years)^b			
Mean (SD)	12.9 (4.2)	12.0 (4.5)	12.4 (4.4)
Median (Min, Max)	13.1 (0.0, 64.1)	12.6 (0.0, 64.1)	13.7 (1.0, 25.8)
Age^b			
0-5	366 (9.8%)	239 (65.3%)	127 (34.7%)
6-12	1443 (38.8%)	807 (55.9%)	636 (44.1%)
13-18	1814 (48.8%)	908 (50.1%)	906 (49.9%)
19+	89 (2.4%)	39 (43.8%)	50 (56.2%)
Race and Ethnicity^c			
White, non-Hispanic	1089 (29.3%)	623 (57.2%)	466 (42.8%)
Hispanic	819 (22.0%)	499 (60.9%)	320 (39.1%)
Black, non-Hispanic	290 (7.8%)	185 (63.8%)	105 (36.2%)
Asian, non-Hispanic	91 (2.4%)	55 (60.4%)	36 (39.6%)
Other ^d , non-Hispanic	62 (1.7%)	31 (50.0%)	31 (50.0%)
Declined	475 (12.8%)	224 (47.2%)	251 (52.8%)
Missing	892 (24.0%)	380 (42.6%)	512 (57.4%)

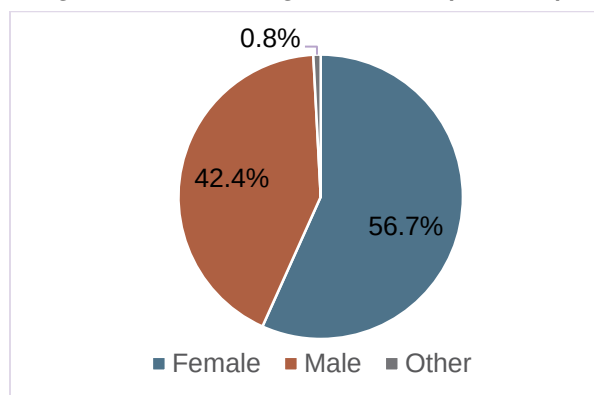
(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Includes calls that were about a specific patient.

(b) Excludes 6 (0.1%) calls about patients whose ages that were less than 0 (2 calls that were initially assigned to a psychiatrist and 5 that were not).

(c) Race and Ethnicity became required fields March 8, 2021. Missing race or ethnicity on 875 (98.1% of 892) calls made before March 8, 2021.

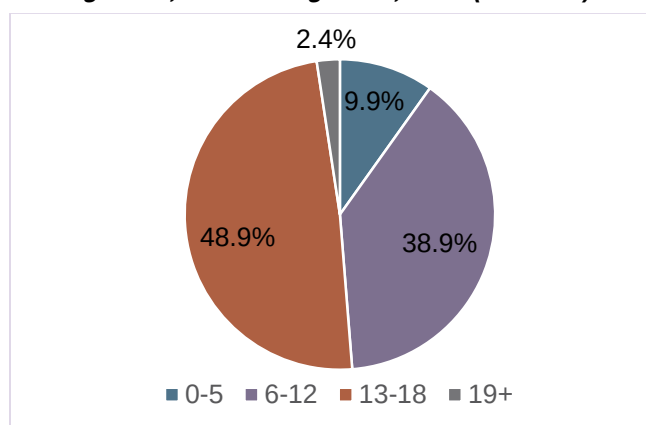
(d) Other includes Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial.

Figure 11. Gender of Patients Served by a CPAN Psychiatrist[®] from August 16, 2020 to August 31, 2021 (n = 3718)



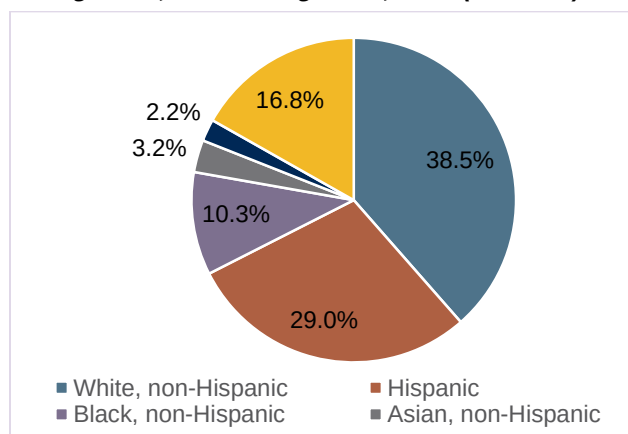
(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

Figure 12. Age of Patients Served by a CPAN Psychiatrist[®] from August 16, 2020 to August 31, 2021 (n = 3712)



(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Excludes 6 (0.2%) calls that had a negative age value.

Figure 13. Race and Ethnicity of Patients Served by a CPAN Psychiatrist[®] from August 16, 2020 to August 31, 2021 (n = 2826)^a



(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Excludes 892 (24.0%) calls missing race or ethnicity.

Table 10 describes the distribution of patient race and ethnicity for each HRI.

Table 10. CPAN Calls by Patient Race and Ethnicity, August 16, 2020 to August 31, 2021

	Total Calls About Specific Patients ^a	White, non- Hispanic	Hispanic	Black, non- Hispanic	Other ^b , non- Hispanic	Missing	Declined
	n (Column %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)
HRI	3718 (100%)	1089 (29.3%)	819 (22.0%)	290 (7.8%)	120 (3.2%)	904 (24.3%)	496 (13.3%)
BCM	306 (8.2%)	51 (16.7%)	71 (23.2%)	23 (7.5%)	2 (0.7%)	134 (43.8%)	25 (8.2%)
TAMUHSC	39 (1.0%)	7 (17.9%)	2 (5.1%)	4 (10.3%)	2 (5.1%)	2 (5.1%)	22 (56.4%)
TTUHSC	431 (11.6%)	36 (8.4%)	34 (7.9%)	8 (1.9%)	1 (0.2%)	200 (46.4%)	152 (35.3%)
TTUHSCEP	99 (2.7%)	24 (24.2%)	46 (46.5%)	3 (3.0%)	2 (2.0%)	16 (16.2%)	8 (8.1%)
UNTHSC	155 (4.2%)	52 (33.5%)	27 (17.4%)	12 (7.7%)	2 (1.3%)	48 (31.0%)	14 (9.0%)
UTDeI	702 (18.9%)	279 (39.7%)	124 (17.7%)	33 (4.7%)	39 (5.6%)	129 (18.4%)	98 (14.0%)
UTHSCH	190 (5.1%)	30 (15.8%)	54 (28.4%)	9 (4.7%)	5 (2.6%)	53 (27.9%)	39 (20.5%)
UTHSCSA	313 (8.4%)	48 (15.3%)	146 (46.6%)	15 (4.8%)	4 (1.3%)	88 (28.1%)	12 (3.8%)
UTHSCT	269 (7.2%)	121 (45.0%)	49 (18.2%)	28 (10.4%)	1 (0.4%)	54 (20.1%)	16 (5.9%)
UTMB	357 (9.6%)	152 (42.6%)	58 (16.2%)	32 (9.0%)	11 (3.1%)	92 (25.8%)	12 (3.4%)
UTRGV	27 (0.7%)	0 (0.0%)	9 (33.3%)	9 (33.3%)	0 (0.0%)	8 (29.6%)	10 (37.0%)
UTSW	830 (22.3%)	80 (9.6%)	289 (34.8%)	199 (24.0%)	123 (14.8%)	51 (6.1%)	88 (10.6%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Excludes 892 (24.0%) calls about a specific patient that were missing race or ethnicity.

(b) Other includes Asian, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial.

Tables 11 and 12 present detailed analyses of CPAN delivery of consultation services by provider assignment (e.g., call assigned to a psychiatrist) and CPAN services including response time by patient's race/ethnicity.

**Table 11. Call Response Time by HRI from August 16, 2020 to August 31, 2021
(Calls, n = 1778)**

	Total Calls Assigned to Psychiatrist and Requiring Immediate Call Back ^a	Call Returned ≤ 30 min ^a	Call Returned > 30 min ^a
	n (Column %)	n (Row %)	n (Row %)
HRI	n = 1279	n = 1126	n = 153
BCM	109 (8.5%)	96 (88.1%)	13 (11.9%)
TAMUHSC	22 (1.7%)	20 (90.9%)	2 (9.1%)
TTUHSC	279 (21.8%)	182 (65.2%)	97 (34.8%)
TTUHSCEP	5 (0.4%)	4 (80.0%)	1 (20.0%)
UNTHSC	81 (6.3%)	76 (93.8%)	5 (6.2%)
UTDeI	308 (24.1%)	298 (96.8%)	10 (3.2%)
UTHSCH	25 (2.0%)	23 (92.0%)	2 (8.0%)
UTHSCSA	136 (10.6%)	126 (92.6%)	10 (7.4%)
UTHSCT	85 (6.6%)	82 (96.5%)	3 (3.5%)
UTMB	9 (0.7%)	9 (100.0%)	0 (0.0%)
UTRGV	88 (6.9%)	81 (92.0%)	7 (8.0%)
UTSW	132 (10.3%)	129 (97.7%)	3 (2.3%)

(a) Data source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Includes all CPAN calls, regardless of whether it was about a specific patient or not.

Table 12. CPAN Call Characteristics of Specific Patients by Patient Race and Ethnicity

	All CPAN Calls About a Specific Patient ^a (n = 2826)	White, non- Hispanic (n = 1089)	Hispanic (n = 819)	Black, non- Hispanic (n = 290)	Other ^b , non- Hispanic (n = 153)	Declined (n = 475)
	n (Column %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)
Call assigned to Psychiatrist	1209 (42.8%)	466 (38.5%)	320 (26.5%)	105 (8.7%)	67 (5.5%)	251 (20.8%)
Call response time^c						
PCP connected directly to psychiatrist	73 (6.0%)	22 (30.1%)	22 (30.1%)	4 (5.5%)	5 (6.8%)	11 (15.1%)
PCP scheduled specific call back time	269 (22.2%)	96 (35.7%)	96 (35.7%)	25 (9.3%)	18 (6.7%)	73 (27.1%)
PCP requested call back within 30 min	854 (70.6%)	345 (40.4%)	228 (26.7%)	76 (8.9%)	43 (5.0%)	162 (19.0%)
Call Back Time						
Mean (SD) Time ^d	803 (66.4%)	337 (42.0%)	337 (42.0%)	72 (9.0%)	43 (5.4%)	136 (16.9%)
Median (Min, Max) ^d	51 (4.2%)	8 (15.7%)	8 (15.7%)	4 (7.8%)	0	26 (51.0%)
Call returned within 30 min	12.3 (13.7)	11.1 (8.9)	10.8 (15.1)	10.8 (8.2)	9.9 (7.8)	18.5 (20.2)
Call returned in over 30 min	8.8 (0.1, 173.5)	9.4 (0.1, 78.0)	7.1 (0.1, 173.5)	9.6 (0.6, 39.2)	8.3 (0.2, 28.0)	12.8 (0.1, 144.2)
First Time PCP Call	1523 (53.9%)	557 (51.1%)	461 (56.3%)	169 (58.3%)	85 (55.6%)	251 (52.8%)
Reason for Call^e						
Referral assistance	1523 (53.9%)	557 (51.1%)	461 (56.3%)	169 (58.3%)	85 (55.6%)	251 (52.8%)
Medication management	1137 (40.2%)	466 (42.8%)	300 (36.6%)	110 (37.9%)	52 (34.0%)	209 (44.0%)
General resources	530 (18.8%)	215 (19.7%)	167 (20.4%)	53 (18.3%)	20 (13.1%)	75 (15.8%)
Behavioral management	176 (6.2%)	61 (5.6%)	55 (6.7%)	14 (4.8%)	18 (11.8%)	28 (5.9%)
Assessment	165 (5.8%)	59 (5.4%)	46 (5.6%)	17 (5.9%)	7 (4.6%)	36 (7.6%)
Diagnosis	112 (4.0%)	43 (3.9%)	33 (4.0%)	11 (3.8%)	8 (5.2%)	17 (3.6%)
Emergency Situation^f						
No	2701 (95.6%)	1047 (38.8%)	779 (28.8%)	271 (10.0%)	148 (5.5%)	456 (16.9%)
Yes/Unsure	125 (4.4%)	42 (33.6%)	40 (32.0%)	19 (15.2%)	5 (4.0%)	19 (15.2%)
Suicide	80 (64.0%)	28 (66.7%)	26 (65.0%)	9 (47.4%)	3 (60.0%)	14 (73.7%)
Violence	13 (10.4%)	3 (7.1%)	2 (5.0%)	5 (26.3%)	0	3 (15.8%)
Physical safety	4 (3.2%)	1 (2.4%)	1 (2.5%)	2 (10.5%)	0	0
Other	35 (28.0%)	13 (37.1%)	13 (37.1%)	4 (11.4%)	2 (5.7%)	3 (8.6%)
Recommended Consult Follow-up						
No consultation needed	1775 (62.8%)	692 (39.0%)	497 (28.0%)	165 (9.3%)	91 (5.1%)	330 (18.6%)
Continue with consultation	733 (25.9%)	235 (32.1%)	247 (33.7%)	89 (12.1%)	50 (6.8%)	112 (15.3%)
Assign to someone else	318 (11.3%)	162 (50.9%)	75 (23.6%)	36 (11.3%)	12 (3.8%)	33 (10.4%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Includes calls that were about a specific patient. Excludes 892 (24.0%) calls about Specific Patients that were missing race or ethnicity. (b) Other includes Asian, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial. (c) Call response time for 1209 specific patients who were assigned to a CPAN psychiatrist. Missing call back time for 13 (1.1%) calls about specific patients that were assigned to a CPAN psychiatrist. Calls may be missing call back information if the PCP requested to be contacted via email/text rather than phone. (d) Call back time in minutes. Calculated for 851 (70.4%) calls about specific patients that were assigned to a CPAN Psychiatrist and the PCP requested call back within 30 minutes. Excludes 3 calls that were returned by the CPAN psychiatrist the day after the PCPs call. (e) A PCP may have more than 1 reason for calling. (f) Excluding 2 calls that were missing information. A PCP may report more than 1 emergency situation.

The following section describes CPAN delivery of services, including consultation outcomes (e.g., call back response time), mental health problems documented, and medications recommended (Tables 13-19, Figure 14). Key results about these services follow, with specific results provided in the tables and figure.

CPAN Delivery of Consultation Services

- Almost half of CPAN calls about a specific patient were assigned to a psychiatrist (46.3%; 1721/3718); among those, the primary focus was on medication management (89.2%), behavioral management (81.1%), and diagnosis (87.6%) (see Table 13).

Table 13. Characteristics of CPAN Calls about Specific Patients, by Psychiatrist Assignment

	Total CPAN Calls About a Specific Patient^a (n = 3718)	CPAN Calls Not Assigned to a Psychiatrist^a (n = 1997)	CPAN Calls Assigned to a Psychiatrist^a (n = 1721)
	n (Column %)	n (Row %)	n (Row %)
First Time PCP consult	1117 (30.0%)	490 (43.9%)	627 (56.1%)
Number of Reasons per Call (Mean=1.3)			
No stated reason ^d	20 (0.5%)	20 (100.0%)	0
1 stated reason	2780 (74.8%)	1774 (63.8%)	1006 (36.2%)
2 stated reasons	718 (19.3%)	161 (22.4%)	557 (77.6%)
3 stated reasons	151 (4.1%)	36 (23.8%)	115 (76.2%)
4 or more stated reasons	49 (1.3%)	6 (12.2%)	43 (87.8%)
Stated Reason for Call^e			
Referral assistance	1833 (49.3%)	1379 (75.2%)	454 (24.8%)
Medication management	1587 (42.7%)	171 (10.8%)	1416 (89.2%)
General resources	715 (19.2%)	546 (76.4%)	169 (23.6%)
Behavioral management	275 (7.4%)	52 (18.9%)	223 (81.1%)
Assessment	272 (7.3%)	56 (20.6%)	216 (79.4%)
Diagnosis	194 (5.2%)	24 (12.4%)	170 (87.6%)
Emergency Situation^f			
No	3545 (95.3%)	1902 (53.7%)	1643 (46.3%)
Yes/Unsure ^g	171 (4.6%)	93 (54.4%)	78 (45.6%)
Suicide	108 (63.2%)	62 (57.4%)	46 (42.6%)
Violence	25 (14.6%)	14 (56.0%)	11 (44.0%)
Physical safety	6 (3.5%)	4 (66.7%)	2 (33.3%)
Other	44 (25.7%)	20 (45.5%)	24 (54.5%)
Recommended Consult Follow-up			
No consultation needed	2398 (64.5%)	761 (31.7%)	1637 (68.3%)
Continue consultation	851 (22.9%)	767 (90.1%)	84 (9.9%)
Assign to someone else	469 (12.6%)	469 (100.0%)	0

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

(b) Call back time calculated for 1229 (33.1%) calls that were assigned to a CPAN psychiatrist and did not request a specific call back time. Excludes 6 calls that took more than a day to return.

(c) Call response time is only calculated for calls that are initially assigned a CPAN psychiatrist when the PCP does not request a specific call back time. 67 (3.9%) calls about a specific patient that were initially assigned to a psychiatrist were missing a call back time. Calls may be missing a call back time if the PCP requested to be contacted via email/text rather than phone.

(d) Calls with no stated reason were made early in the program (August - September 2020). After that period, it became mandatory for PCPs to state their reason for calling.

(e) A PCP may have more than 1 reason for calling.

(f) Excludes 2 calls that did not document if the call was about an emergency situation.

(g) A PCP may report more than 1 emergency situation.

- Among CPAN calls assigned to a psychiatrist, 92.5% and 90.9% received recommended changes in diagnosis and medication, respectively. Among CPAN calls not assigned to a psychiatrist, 65.2% received a referral to a behavioral health service (Table 14).

Table 14. CPAN Clinic Consultation Calls: Characteristics of HRI Call Assistance to Providers from August 16, 2020 to August 31, 2021

	Total CPAN Calls ^a (n = 3891) n (Column %)	CPAN Calls Not Assigned to Psychiatrist ^a (n = 2113) n (Row %)	CPAN Calls Assigned to Psychiatrist ^a (n = 1778) n (Row %)
Length of Time to Resolve PCP Consult (hours)^b			
Mean (SD)	9.0 (35.4)	11.1 (42.5)	7.1 (26.4)
Median [Min, Max]	0.4 (0.0, 1350)	0.5 (0.0, 1350)	0.4 (0.0, 720.3)
Number of CPAN Providers Involved in Call^c (Mean=1.6)			
1	1707 (43.9%)	610 (35.7%)	1097 (64.3%)
2	1448 (37.2%)	860 (59.4%)	588 (40.6%)
3	238 (6.1%)	145 (60.9%)	93 (39.1%)
CPAN Staff Involved in Call^d			
Resource Coordinator	2173 (55.8%)	1555 (71.6%)	618 (28.4%)
Psychiatrist	1966 (50.5%)	188 (9.6%)	1778 (90.4%)
Therapist	1178 (30.3%)	1022 (86.8%)	156 (13.2%)
Outcome of Call			
Recommended changes in diagnosis	133 (3.4%)	10 (7.5%)	123 (92.5%)
Recommended changes in medication	1146 (29.5%)	104 (9.1%)	1042 (90.9%)
Recommended changes in diagnostic testing	232 (6.0%)	42 (18.1%)	190 (81.9%)
Referral to behavioral health service	2201 (56.6%)	1435 (65.2%)	766 (34.8%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. Includes all calls, regardless of whether it was about a specific patient or not. Calls not about a specific patient can be for referrals, general resources, or to enroll in CPAN.

(b) Time elapsed from call initiation to end of consult. Calculated for 3323 (89.4%) calls that were resolved at time of data extract (August 31, 2021). Excludes 1 calls that had negative length of time value and was assigned to a Psychiatrist.

(c) A CPAN provider was not assigned to 498 (12.8%) of calls. These calls did not need a CPAN consultation.

(d) More than 1 type of CPAN staff may be involved in a call.

(e) A CPAN provider does not have to select a call outcome. Calls may have more than 1 outcome.

Table 15 lists the 20 most common diagnoses recorded in Trayt for calls received by CPAN.

THE MOST COMMON CHIEF COMPLAINTS RECORDED AS THE REASON FOR THE CPAN CONSULTATION WERE RELATED TO ANXIETY, 'SAD MOOD', DEPRESSION, AGGRESSIVE BEHAVIORS, AND SUICIDAL THOUGHTS.

Table 15. 20 Most Common Chief Complaints Recorded in Trayt for Calls Received by CPAN

Chief Complaint ^b	Total CPAN Calls ^a n (%)	Total Unique Patients ^a n (%)
Total Calls	2151 (100%)	963 (100%)
Anxiety/Panic Attacks	452 (21%)	245 (25.4%)
Sad Mood	293 (13.6%)	183 (19%)
Depression	244 (11.3%)	108 (11.2%)
Aggressive Behaviors	209 (9.7%)	99 (10.3%)
Suicidal Thoughts	154 (7.2%)	89 (9.2%)
Hyperactivity	84 (3.9%)	35 (3.6%)
Insomnia	66 (3.1%)	32 (3.3%)
Social Anxiety Anxious Worried or Nervous About Social Situations	61 (2.8%)	38 (3.9%)
ADHD	57 (2.6%)	18 (1.9%)
Poor Attention Span	53 (2.5%)	35 (3.6%)
Tantrums/meltdowns	52 (2.4%)	36 (3.7%)
Agitated Behavior	41 (1.9%)	18 (1.9%)
Irritability	39 (1.8%)	25 (2.6%)
Deliberately Self cutting	38 (1.8%)	18 (1.9%)
Restricting Food Intake Anorexia	29 (1.3%)	18 (1.9%)
Separation Anxiety	28 (1.3%)	16 (1.7%)
Anger	27 (1.3%)	16 (1.7%)
Difficulty Falling Asleep	24 (1.1%)	16 (1.7%)
Does Not Comply or Obey	24 (1.1%)	20 (2.1%)
Grief	24 (1.1%)	14 (1.5%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

(b) CPAN Calls may have more than one chief complaint.

Table 16. Number of Diagnoses Reported, August 16, 2020 to August 31, 2021

Calls with Diagnosis Reported	Total CPAN Calls ^a (n = 1784)	Unique Patients (n = 1742)
Number of Diagnosis/Diagnoses	1100 (61.7%)	1064 (61.1%)
Patients with 1 diagnosis	525 (29.4%)	520 (29.9%)
Patients with 2 diagnoses	159 (8.9%)	158 (9.1%)
Patients with 3 or more diagnoses	1100 (61.7%)	1064 (61.1%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

THE TOP 5 COMMON CPAN DIAGNOSES IN YEAR 1 INCLUDED ADHD, MAJOR DEPRESSIVE DISORDER, ANXIETY DISORDER, DEPRESSION, AND AUTISM SPECTRUM DISORDER.

Table 17. CPAN Top 20 Most Common Diagnoses, August 16, 2020 to August 31, 2021

	Total CPAN Calls n (%)
Total Diagnoses^a	3891 (100%)
Most Common Diagnoses	
Depression	703 (39.4%)
Attention Deficit/Hyperactivity Disorder	589 (33.0%)
Anxiety	531 (29.8%)
Autism Spectrum Disorder	163 (9.1%)
Conduct Disorder	80 (4.5%)
Post-Traumatic Stress Disorder	66 (3.7%)
Persistent Mood Disorder	41 (2.3%)
Bipolar Disorder	39 (2.2%)
Eating Disorder	37 (2.1%)
Obsessive Compulsive Disorder	29 (1.6%)
Phobic Anxiety	27 (1.5%)
Sleep Disorder	19 (1.1%)
Intellectual Disability	17 (1.0%)
Adjustment Disorder	15 (0.8%)
Chromosomal Abnormalities	15 (0.8%)
Mood Disorder	13 (0.7%)
Substance Use	13 (0.7%)
Psychosis	11 (0.6%)
Emotional Disorder	703 (39.4%)
Impulse Disorder	589 (33.0%)
Gender Identity Disorder	531 (29.8%)
Tic Disorder	163 (9.1%)
Grief/Bereavement	80 (4.5%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. PCPs are not required to share a diagnosis with the CPAN team. Patients may have more than 1 diagnosis.

- Medications were reported for 684 calls (Table 18). Among these, the most commonly reported medication was Fluoxetine followed by Sertraline and Zoloft (Table 19).

Table 18. Number of Medications Reported, August 16, 2020 to August 31, 2021

Calls with Medications Reported	Total CPAN Calls ^a (n = 684)	Unique Patients (n = 680)
Number of Medications		
1	457 (66.8%)	453 (66.6%)
2	153 (22.4%)	153 (22.5%)
3	51 (7.5%)	51 (7.5%)
4	17 (2.5%)	17 (2.5%)
5	6 (0.9%)	6 (0.9%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

Table 19. CPAN Top 20 Most-Common Medications

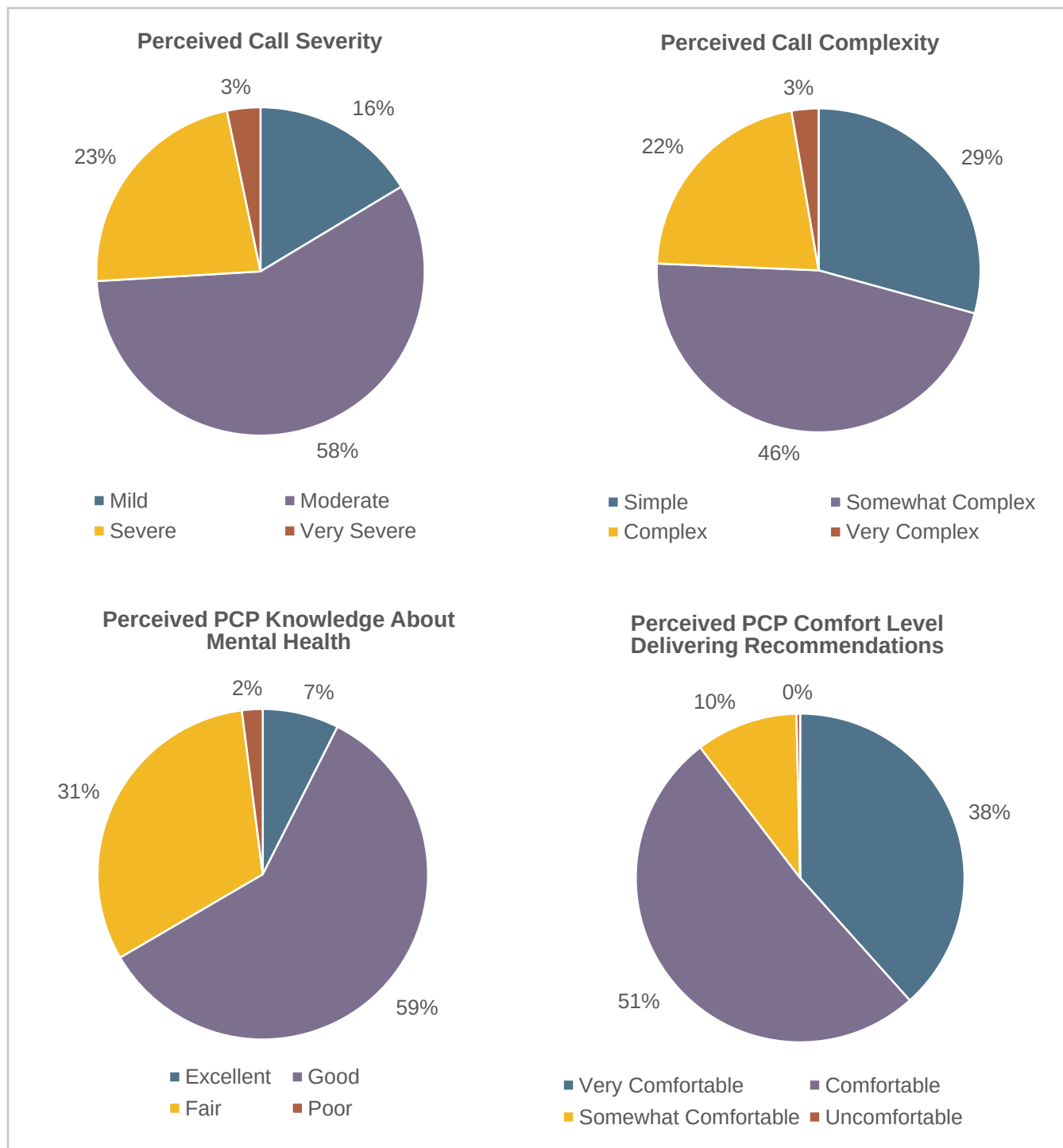
Medication	Total CPAN calls ^a (n = 684)
Fluoxetine	78 (11.4%)
Sertraline	71 (10.4%)
Zoloft	70 (10.2%)
Lexapro	68 (9.9%)
Prozac	62 (9.1%)
Clonidine	54 (7.9%)
Vyvanse	53 (7.7%)
Concerta	36 (5.3%)
Intuniv	35 (5.1%)
Adderall	33 (4.8%)
Hydroxyzine	32 (4.7%)
Trazodone	30 (4.4%)
Abilify	28 (4.1%)
Guanfacine	26 (3.8%)
Focalin	25 (3.7%)
Risperidone	19 (2.8%)
Wellbutrin	17 (2.5%)
Seroquel	16 (2.3%)
Citalopram	16 (2.3%)
Methylphenidate	15 (2.2%)
Escitalopram	13 (1.9%)

(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021. 684 Patients were taking at least 1 medication. Patients may be taking more than 1 medication.

HRI psychiatrists also documented their perceptions of psychiatric call severity and PCPs' knowledge of mental health problems among those calling for consultations.

- Overall, HRI psychiatrists perceived a quarter of calls as severe or very severe. The PCPs' general knowledge of mental health and comfort with the problem was perceived as good among 56% of the psychiatry consultant calls.

Figure 14. Psychiatrist Assessment of PCP Inquiry^a from August 16, 2020 to August 31, 2021 (PSY consultations only, n = 1859)



(a) Data Source: CPAN Encounter-level Extract, Trayt. August 16, 2020 through August 31, 2021.

D2. TCHATT: REACH AND SERVICES DELIVERED

Background

The TCMHCC TCHATT overarching goal is to increase access to child and adolescent behavioral health assessments among underserved communities by developing a network of school districts and corresponding school campuses enrolled throughout the state to connect students with mental health providers based in one of the 12 HRIs. HRI providers conduct telemedicine or telehealth assessments to help increase access to mental health services. The Trayt data management system tracks patients as they move through the referral process through the delivery of services (see Figure 16).

A PRIORITY OF TCHATT IS TO SERVE AT-RISK CHILDREN AND ADOLESCENTS.

To evaluate the network in the early phases, we conducted a process and outcome evaluation of TCHATT focusing on reach in terms of enrollment of school campuses, referrals of youth for consultations and completion of consultations. We also assessed school enrollment and delivery of youth mental health assessments using Trayt data. Results are presented for April 2020-August 2021.

School District and Campus Enrollment

TCHATT REACH REFERS TO THE ABSOLUTE NUMBER AND PROPORTION OF SCHOOL DISTRICTS AND SCHOOL CAMPUSES ENROLLED AS TCHATT NETWORK PARTNERS.

The HRI teams work through school districts to identify and enroll school campuses into TCHATT to extend the network of schools trained to implement the program and refer children and adolescents to receive TCHATT services. The 12 HRIs act as hub teams and provide support to districts and campuses enrolled in TCHATT across the state of Texas. Tables 20-22 describe school campuses enrolled by geographic reach and reach to vulnerable communities, as well as level of school engagement with TCHATT (e.g., referrals).

- Overall, HRIs enrolled 1,763 school campuses, with the number of enrolled campuses varying by HRI (Table 20). Distribution of campuses enrolled by size of the student body is presented in Table 21.
- The majority of enrolled schools did not refer students during this reporting period likely due to the late start. The initiation of TCHATT rollout varied by HRI, and HRIs began documenting TCHATT referrals on March 19, 2021. Trayt began tracking TCHATT encounters on July 1, 2021.
- Note: Students enrolled in TCHATT prior to July 1, 2021 are not included in encounter tracking due to missing data in Trayt (n = 816) (see Figure 5).

Table 20. TCHAT Student Referrals Completed by HRI

	All Enrolled Campuses ^a n (%)	No Referrals n (%)	At Least One Referral n (%)
HRI	1763 (100%)	1517 (00%)	246 (100%)
BCM	140 (7.9%)	119 (85.0%)	21 (15.0%)
TAMUHSC	83 (4.7%)	67 (80.7%)	16 (19.3%)
TTUHSC	215 (12.2%)	201 (93.5%)	14 (6.5%)
TTUHSCEP	100 (5.7%)	84 (8.4%)	16 (1.6%)
UNTHSC	149 (8.5%)	133 (89.3%)	16 (10.7%)
UTDeI	160 (9.1%)	160 (100%)	0 (0%)
UTHSCSA	236 (13.4%)	163 (69.1%)	73 (30.9%)
UTHSCH	311 (17.6%)	286 (92.0%)	25 (8.0%)
UTHSCT	68 (3.9%)	57 (83.8%)	11 (16.2%)
UTMB	89 (5.0%)	60 (67.4%)	29 (32.6%)
UTRGV	52 (2.9%)	43 (82.7%)	9 (17.3%)
UTSW	160 (9.1%)	144 (90%)	16 (10%)

(a) Data source: TCHAT Referral-level Extract, Trayt: August 31, 2021.

- As of August 31, 2021, the majority of enrolled districts had over 100 campus sites identified in their MOUs. There are a small number of outlier school districts with greater than 200 campus sites identified.

Table 21. TCHAT Campuses by HRI and Campus Size^a

	Total Enrolled Campuses n (%)	Campus Size			
		< 500 n (%)	500 - 1000 n (%)	1000 - 1500 n (%)	1500 + n (%)
HRI	1763	640	816	179	127
BCM	140 (7.9%)	23 (16.4%)	92 (65.7%)	14 (10.0%)	10 (7.1%)
TAMUHSC	83 (4.7%)	46 (55.4%)	29 (34.9%)	4 (4.8%)	4 (4.8%)
TTUHSC	215 (12.2%)	134 (62.3%)	63 (29.3%)	12 (5.6%)	6 (2.8%)
TTUHSCEP	100 (5.7%)	25 (25.0%)	55 (55.0%)	11 (11.0%)	9 (9.0%)
UNTHSC	149 (8.5%)	75 (50.3%)	60 (40.3%)	8 (5.4%)	6 (4.0%)
UTDeI	160 (9.1%)	38 (23.8%)	82 (51.3%)	21 (13.1%)	19 (11.9%)
UTHSCSA	236 (13.4%)	111 (47.0%)	96 (40.7%)	14 (5.9%)	15 (6.4%)
UTHSCH	311 (17.6%)	48 (15.4%)	171 (60.0%)	63 (20.3%)	29 (9.3%)
UTHSCT	68 (3.9%)	31 (45.6%)	30 (44.1%)	4 (5.9%)	3 (4.4%)
UTMB	89 (5.0%)	34 (40.4%)	44 (49.4%)	6 (6.7%)	5 (5.6%)
UTRGV	52 (2.9%)	23 (44.2%)	21 (40.4%)	3 (5.8%)	5 (9.6%)
UTSW	160 (9.1%)	52 (32.5%)	73 (45.6%)	19 (11.9%)	16 (10.0%)

(a) Data Sources: Texas Education Agency Campus Data, provided by COSH; TCHAT Referral-level Extract, Trayt: August 31, 2021

- The distribution of school campuses enrolled in the program reflects the general distribution of schools in TEA-defined district types (e.g., metro, non-metro, rural). Slightly more TCHAT enrolled campuses were defined as metropolitan compared to campuses statewide.
- With respect to campus census, enrolled campuses comprised slightly fewer smaller campuses but slightly more medium-size campuses compared to campuses statewide (Table 25).

Table 22. Comparison of Texas Campuses and Enrolled TCHATT Campuses by Geographic and Population-level Vulnerability Indicators

	Texas Campuses	TCHATT Enrolled Campuses ^d
TEA District Type^{a,b}	n = 9471*	n = 1760
Metro	3693 (39.0%)	939 (53.4%)
Non-Metro	3924 (41.4%)	662 (37.6%)
Rural	1007 (10.6%)	131 (7.4%)
Charter School	847 (8.9%)	28 (1.6%)
National School Lunch^{a,c}	n = 9475*	n = 1761
<50%	2896 (30.6%)	590 (33.5%)
>50%	6579 (68.5%)	1171 (66.5%)
Campus Census^a	n = 9599*	n = 1762
<500	5166 (53.8%)	640 (36.3%)
500 - 1000	3421 (35.6%)	816 (46.3%)
1000 - 1500	524 (5.5%)	179 (10.2%)
1500 +	488 (5.1%)	127 (7.2%)

(a) Data Source: Texas Education Agency 2021 AskTED directory of campuses.

(b) Data Source: Texas Education Agency District Type data; Metro: major urban, major suburban; Non-Metro: other central city, other central city suburban, independent town, non-metropolitan: fast growing, non-metropolitan: stable.

(c) Data Source: TEA 2018-2019 District Snapshot.

(d) Data Source: TCHATT Campus List as of 6/8/21. * There are 1,763 Texas school campuses enrolled in TCHATT, but sample sizes vary due to missing data.

*There are 9,599 Texas school campuses, but sample sizes vary due to missing data.

School Districts Reached, Enrolled and Actively Engaged in TCHATT

The following figures represent the districts actively enrolled in TCHATT and entering data in Trayt as of August 31, 2021. Overall, HRIs have enrolled 171 school districts, comprising 1763 enrolled campuses across Texas (Figures 15 and 16a-b). To understand the equity of enrolled schools with regard to community-level social vulnerability, the geographic distribution of Texas campuses is presented along with the distribution of TCHATT-enrolled school campuses (Table 23).

Figure 15 represents Texas district boundaries. The district borders exclude charter districts, which do not have set boundaries. A district can sign a memorandum of understanding (MOU) with an HRI to enroll in TCHATT. The MOU can cover TCHATT services to a subset of the campuses in the district, or can cover services to all campuses in the district. The markers on Figure 15 indicate the locations of school campuses enrolled under a district MOU to receive TCHATT services.

Figure 15. Active TCHAT Campuses Over Texas School District Map

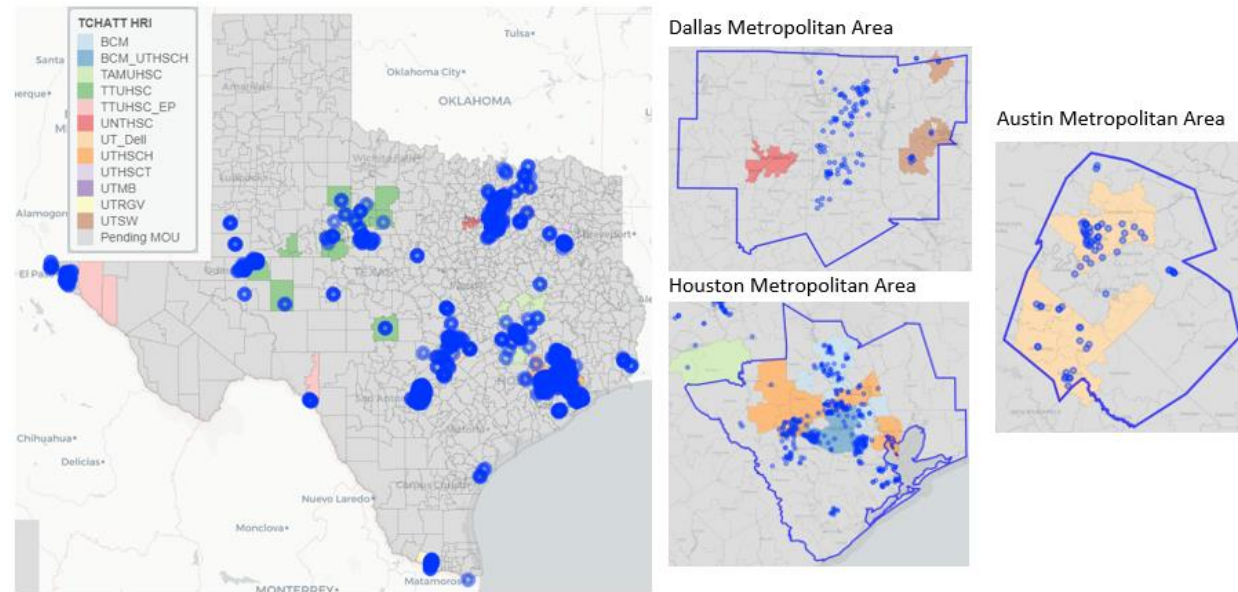


Table 26 and Figures 16a and 16b present data on enrolled TCHAT campuses classified by SVI (see Metric Definitions on page 32 for a detailed description of the SVI measure). A central aim of the TCMHCC initiatives is to reduce health disparities by delivering mental and behavioral health services to children and adolescents who would not otherwise have access to care. The county-level measure provided in Table 26 likely masks variation in SVI within urban counties where SVI scores vary at the census block group (CBG) levels. The metropolitan area SVI maps provide a more granular representation of SVI scores at the CBG-level for the Houston, Dallas, and Austin metropolitan areas (see Figures 16a and 16b). School district enrollment in TCHAT is on target regarding meeting the goal to reach students residing in areas with higher vulnerability rates as defined by the SVI. There are additional counties with high SVI scores, however, that could be targeted for TCHAT recruitment.

Table 23. Enrolled TCHAT Campuses by County-Level Characteristics: The Social Vulnerability Index

	Texas Campuses ^a (n = 9599)	TCHAT Enrolled Campuses ^c (n = 1763)
SVI Score^b		
<0.2 (least vulnerable)	1981 (20.6%)	323 (18.3%)
0.2-0.4	1725 (18.0%)	421 (23.9%)
0.4-0.6	812 (8.5%)	104 (5.9%)
0.6-0.8	3448 (35.9%)	731 (41.5%)
0.8+ (most vulnerable)	1633 (17.0%)	184 (10.4%)

(a) Data Source: Texas Education Agency 2021 AskTED directory of campuses.

(b) County-level social vulnerability index data from the CDC, 2018 (SVI-2018; <http://svi.cdc.gov/>).

(c) Data Source: TCHAT Campus List as of 6/8/21.

Figure 16a. Enrolled TCHAT Campuses^a by Social Vulnerability Index^b at the County-Level

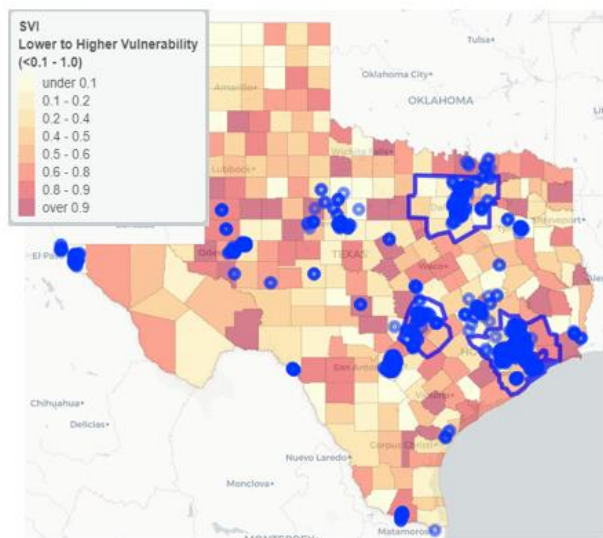


Figure 16b. Enrolled TCHAT Campuses^a by Social Vulnerability Index^b at the Census Block Group (CBG)-Level

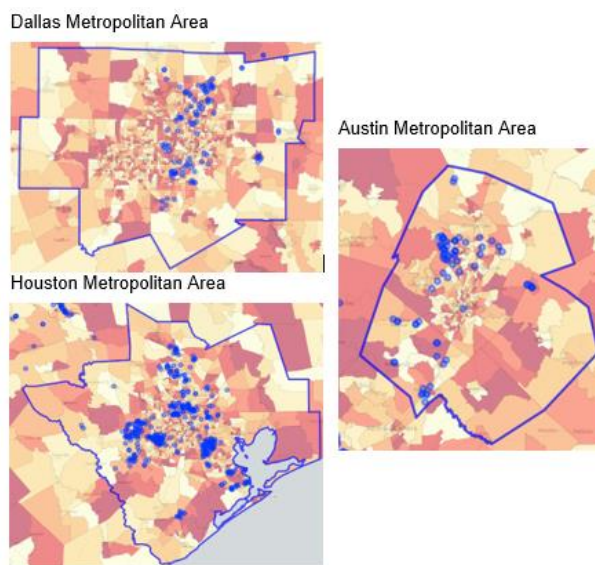
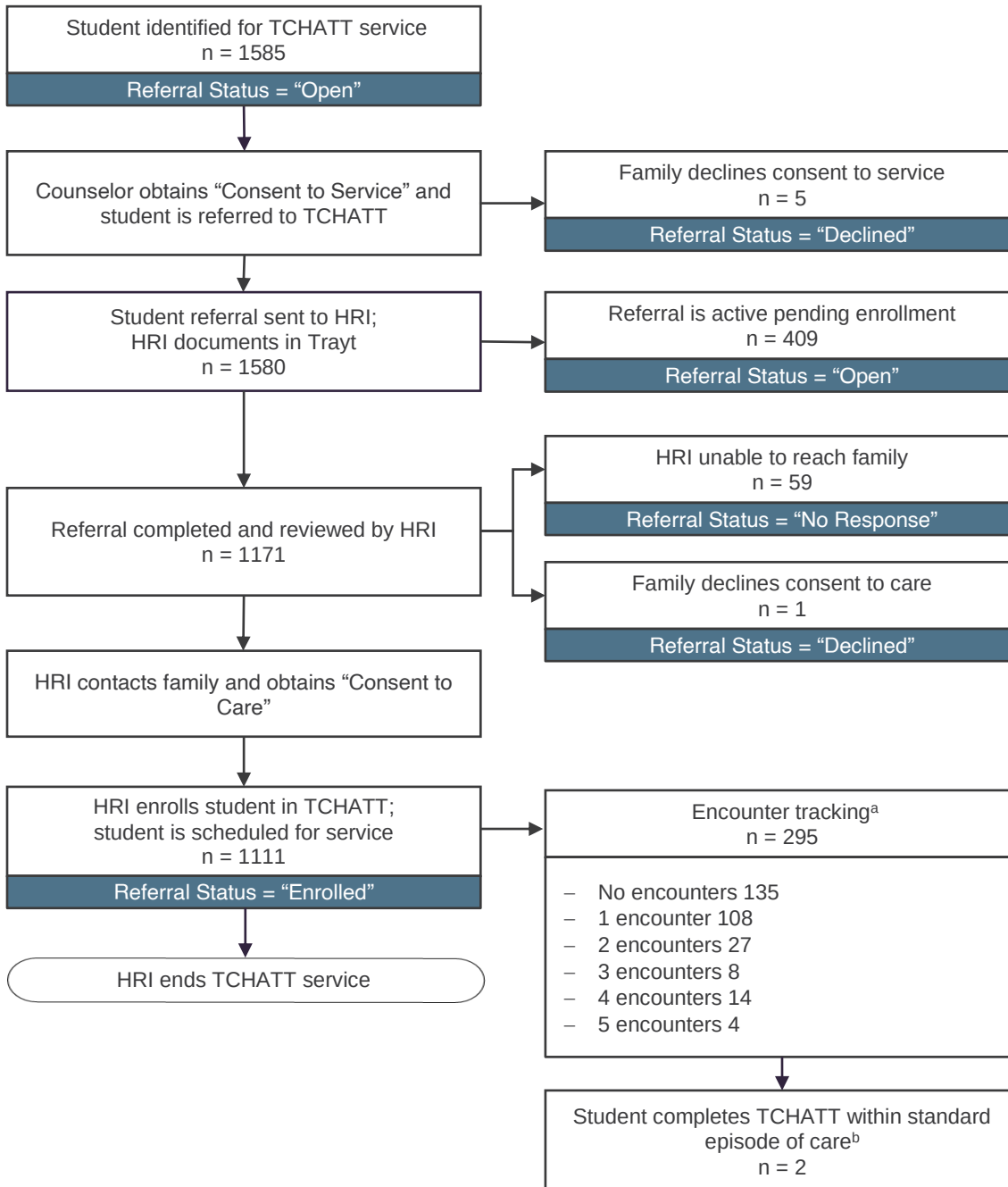


Figure 17 presents the numbers of students referred to TCHAT and the process that referrals go through to become completed services. From March 19, 2021 through August 31, 2021 there have been 1,585 student referrals to TCHAT. Of those 1,585 students referred, 1,111 (70.1%) completed the consent process and enrolled in TCHAT. Among the 1,585 students referred, 409 (25.8%) open referrals are pending enrollment due to missing consent or are incomplete for other reasons. When a student receives care through TCHAT, their care is assigned to a psychiatrist, therapist, or other provider. An enrolled student can also have a multiple team assignment, which means their care team has at least two types of mental health provider.

- From March 19, 2021 through August 31, 2021 there have been 1,585 student referrals to TCHAT. Of the 1,585 student referrals, the HRI was unable to contact the family of 59 (3.7%) students referred and for 6 (0.4%) student referrals the parents declined TCHAT services for a variety of reasons (see Figure 16 below). The result was 1,111 total students enrolled to receive services.

Figure 17. TCHATT Overall Numbers from March 1st, 2021 to August 31, 2021



(a) Includes students enrolled after July 1, 2021 when Trayt began tracking TCHATT encounters (n = 295). Note: TCHATT encounter refers to a scheduled session between an active patient and TCHATT care team. An encounter may be comprised of several "sessions" with different care team members, but it must occur on the same calendar day.

(b) TCHATT service completed at or before encounter 5.

NOTE: There were initially 1658 referrals in Trayt. Of those referrals, 15 (0.9%) were determined to be duplicates and 85 (5.0%) were created in error.

Table 24 describes the student characteristics among those referred to TCHAT.

Table 24. Student Characteristics Among Those Referred to TCHAT

	Active Referrals ^a (n = 1520)	Open Referrals ^a (n = 409)	Enrolled Referrals ^a (n = 1111)
Student Gender			
Female	843 (55.5%)	215 (52.6%)	628 (56.5%)
Male	668 (43.9%)	188 (46.0%)	480 (43.2%)
Other	5 (0.3%)	2 (0.5%)	3 (0.3%)
Missing	4 (0.3%)	4 (1.0%)	0 (0.0%)
Student Age			
Mean (SD)	12.3 (3.27)	12.1 (3.34)	12.5 (3.24)
Median [Min, Max]	13.0 [2.0, 21.0]	12.0 [2.0, 20.0]	13.0 [4.0, 21.0]
Missing	4 (0.3%)	3 (0.7%)	1 (0.1%)
Student Grade			
PreK/Kindergarten	61 (4.0%)	21 (5.1%)	40 (3.6%)
Elementary	420 (27.6%)	120 (29.3%)	300 (27.0%)
Middle School	464 (30.5%)	127 (31.1%)	337 (30.3%)
High School	461 (30.3%)	112 (27.4%)	349 (31.4%)
Other	62 (4.1%)	1 (0.2%)	61 (5.5%)
Missing	52 (3.4%)	28 (6.8%)	24 (2.2%)
Student Ethnicity			
Hispanic	692 (45.5%)	135 (33.0%)	557 (50.1%)
Non-Hispanic	594 (39.1%)	103 (25.2%)	491 (44.2%)
Decline	224 (14.7%)	165 (40.3%)	59 (5.3%)
Missing	10 (0.7%)	6 (1.5%)	4 (0.4%)
Student Race^b			
White	988 (63.8%)	198 (20.0%)	790 (80.0%)
Black	170 (11.0%)	24 (14.1%)	146 (85.9%)
Asian	27 (1.7%)	6 (22.2%)	21 (77.8%)
Multiracial	15 (1.0%)	2 (13.3%)	13 (86.7%)
AI/AN	3 (0.2%)	0 (0.0%)	3 (100.0%)
NHOPI	15 (1.0%)	2 (13.3%)	13 (86.7%)
Declined	324 (20.9%)	175 (54.0%)	149 (46.0%)
Missing	6 (0.4%)	6 (100.0%)	0 (0.0%)
Student Race and Ethnicity			
Hispanic	597 (39.3%)	125 (30.6%)	472 (42.5%)
White non-Hispanic	389 (25.6%)	74 (18.1%)	315 (28.4%)
Black non-Hispanic	146 (9.6%)	19 (4.6%)	127 (11.4%)
Asian non-Hispanic	17 (1.1%)	5 (1.2%)	12 (1.1%)
Multiracial non-Hispanic	11 (0.7%)	1 (0.2%)	10 (0.9%)
AI/AN non-Hispanic	8 (0.5%)	1 (0.2%)	7 (0.6%)
Declined	342 (22.5%)	178 (43.5%)	164 (14.8%)
Missing	10 (0.7%)	6 (1.5%)	4 (0.4%)
Any Intellectual or Cognitive Disability			
Not Impaired	787 (51.8%)	167 (40.8%)	620 (55.8%)
Impaired	683 (44.9%)	225 (55.0%)	458 (41.2%)
Unsure	42 (2.8%)	9 (2.2%)	33 (3.0%)
Missing	8 (0.5%)	8 (2.0%)	0 (0.0%)

(a) Data Source: TCHAT Referral-level Extract, Trayt (August 19, 2020 to August 31, 2021). Characteristics reported by TCHAT campus liaison. **NOTE:** Active Referrals refers to the total number of open referrals (pending enrollment) and enrolled referrals. Open Referral refers to student referrals received and documented in Trayt, but pending enrollment. Enrolled Referral refers to student referrals with completed consent. (b) TCHAT campuses liaisons may choose more than 1 identifying race. Multiracial includes non-Hispanic ethnicity and more than 1 identifying race; White, Black, Asian, Indian or Alaska Native, or Native Hawaiian or Pacific Islander. Abbreviations: AI/AN, American Indian or Alaska Native; NHOPI, Native Hawaiian or Pacific Islander.

TCHATT referrals are assigned a provider after enrollment. From March 19, 2021 to August 31, 2021, there were 1111 students enrolled in TCHATT. The majority of enrolled students had a TCHATT care team that included a therapist (Table 25). Overall, therapists were assigned to 90.7% of students enrolled in TCHATT while psychiatrists were assigned to 14.0% of students enrolled. The top five reasons for referral were depression, anxiety, attention, aggression, and suicidal thoughts.

Table 25. Characteristics of TCHATT Referrals Among Students Referred from March 19, 2021 to August 31, 2021

	Active Referrals ^a (n = 1520)	Open Referral ^a (n = 409)	Enrolled Referral ^a (n = 1111)
TCHATT Referral Reason			
Depressed	553 (36.4%)	111 (27.1%)	442 (39.8%)
Anxiety	524 (34.5%)	113 (27.6%)	411 (37.0%)
Attention	252 (16.6%)	28 (6.8%)	224 (20.2%)
Aggression	244 (16.1%)	44 (10.8%)	200 (18.0%)
Suicidal Thoughts	230 (15.1%)	48 (11.7%)	182 (16.4%)
Disruptive Behaviors	218 (14.3%)	50 (12.2%)	168 (15.1%)
Trauma	207 (13.6%)	60 (14.7%)	147 (13.2%)
Changes Sleep	134 (8.8%)	16 (3.9%)	118 (10.6%)
Self-Harm Behaviors	130 (8.6%)	28 (6.8%)	102 (9.2%)
Self-Harm Thoughts	120 (7.9%)	24 (5.9%)	96 (8.6%)
Changes Appetite	84 (5.5%)	12 (2.9%)	72 (6.5%)
Harm to Others	40 (2.6%)	9 (2.2%)	31 (2.8%)
Other	581 (38.2%)	188 (46.0%)	393 (35.4%)
Missing	8 (0.5%)	8 (2.0%)	0 (0.0%)
Care Team			
Therapist	n/a	n/a	1008 (90.7%)
Other Providers	n/a	n/a	829 (74.6%)
Psychiatrist	n/a	n/a	156 (14.0%)
Care Team			
Therapist and Other	n/a	n/a	667 (60.0%)
Therapist	n/a	n/a	256 (23.0%)
Psychiatrist, Therapist, and Other	n/a	n/a	75 (6.8%)
Psychiatrist and Other	n/a	n/a	57 (5.1%)
Other Provider	n/a	n/a	30 (2.7%)
Psychiatrist	n/a	n/a	14 (1.3%)
Psychiatrist and Therapist	n/a	n/a	10 (0.9%)
Missing	n/a	n/a	2 (0.2%)

(a) Data source: TCHATT Referral-level Extract, Trayt. August 31, 2021. NOTE: Active Referrals refers to the total number of open referrals (pending enrollment) and enrolled referrals. Open Referral refers to student referrals received and documented in Trayt, but pending enrollment. Enrolled Referral refers to student referrals with completed consent.

(b) Based on National Center for Educational Statistics (NCES) school identification.

Tables 26-27 and Figure 18 present students' assignments to TCHATT care teams by race and ethnicity. Since each student may be assigned to more than one provider, we present this data in two different ways below. Team assignment in Table 26 is mutually exclusive in order to compare race and ethnicity among students assigned to a single provider (therapist, psychiatrist, or other provider) versus a multiple-provider team. Team assignment in Table 27 and Figure 18 is not mutually exclusive in order to compare students' assignment to a psychiatrist, therapist, or other provider, regardless of whether other providers were also included in their care team.

- For all race and ethnicities, the majority of students (73%) were assigned to a care team made up of multiple clinicians (Table 28).

- The distribution of referred providers was similar by race and ethnicities (See Table 27 and Figure 18).

Table 26. TCHAT Care Team by Student Race for TCHAT Referrals from March 19, 2021 to August 31, 2021

	Enrolled Referrals	Therapist	Psychiatrist	Other Providers	Multiple Team Assignments
	n (Column %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)
Race/Ethnicity^a	1111 (100.0%)	256 (23.0%)	14 (1.3%)	30 (2.7%)	811 (73.0%)
Hispanic	552 (49.7%)	145 (26.3%)	2 (0.4%)	17 (3.1%)	388 (70.3%)
White, non-Hispanic	315 (28.4%)	70 (22.2%)	11 (3.5%)	5 (1.6%)	229 (72.7%)
Black, non-Hispanic	127 (11.4%)	28 (22.0%)	0	1 (0.8%)	98 (77.2%)
Other ^b , non-Hispanic	47 (4.2%)	6 (12.8%)	1 (2.1%)	1 (2.1%)	39 (83.0%)
Declined	58 (5.2%)	7 (12.1%)	0	6 (10.3%)	45 (77.6%)

(a) Data Source: TCHAT Referral-level Extract, Trayt. August 31, 2021. A referral is assigned a TCHAT provider once enrollment is complete (n = 1111). Each referral may be assigned to more than one provider. Race/ethnicity missing for 4 referrals.

(b) Other includes Asian, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial.

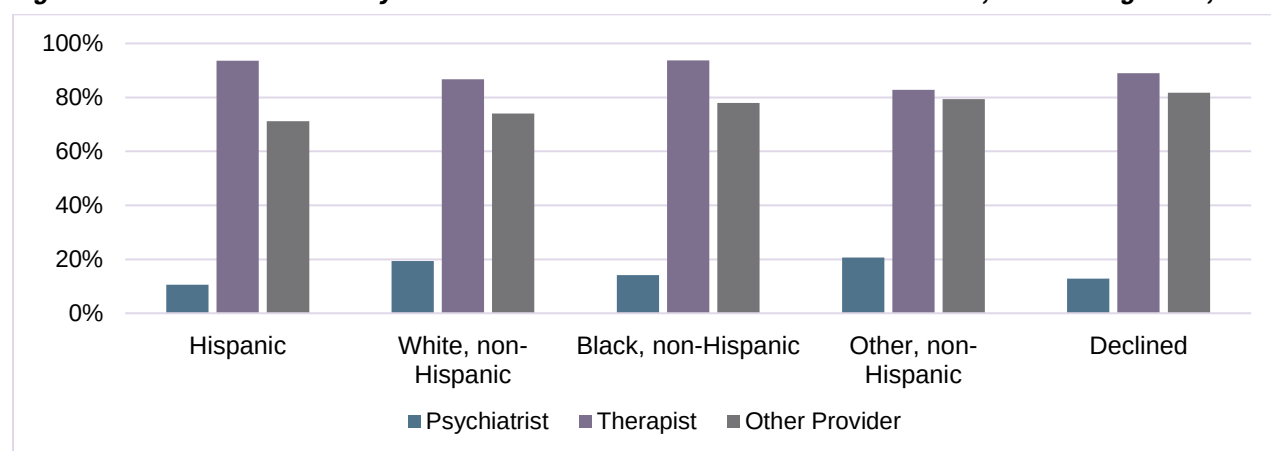
Table 27. TCHAT Care Team by Student Race for TCHAT Referrals from March 19, 2021 to August 31, 2021

	Enrolled Referrals ^a (n = 1111)	Hispanic (n = 472)	White, non-Hispanic (n = 315)	Black, non-Hispanic (n = 127)	Other ^b , non-Hispanic (n = 29)	Declined (n = 164)
	n (Column %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)	n (Row %)
Psychiatrist	156 (14.0%)	50 (10.6%)	61 (19.4%)	18 (14.2%)	6 (20.7%)	21 (12.8%)
Therapist	1008 (90.7%)	442 (93.6%)	273 (86.7%)	119 (93.7%)	24 (82.8%)	146 (89.0%)
Other Provider	829 (74.6%)	336 (71.2%)	233 (74.0%)	99 (78.0%)	23 (79.3%)	134 (81.7%)

(a) Data Source: TCHAT Referral-level Extract, Trayt. August 31, 2021. A referral is assigned a TCHAT provider once enrollment is complete. Each referral may be assigned more than one provider. 4 (0.4%) referrals were missing race/ethnicity and a provider.

(b) Other includes Asian, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial.

Figure 18. TCHAT Care Team by Student Race for TCHAT Referrals from March 19, 2021 to August 31, 2021



(a) Data Source: TCHAT Referral-level Extract, Trayt. August 31, 2021. A referral is assigned a TCHAT provider once enrollment is complete (n = 1111). Each referral may be assigned more than one provider. 4 (0.4%) referrals were missing race/ethnicity and a provider. (b) Other includes Asian, American Indian or Alaska Native, Native Hawaiian or Pacific Islander, and Multiracial.

Data Limitations

- TCHATT student referral and served data are limited to the time period in which HRIs started to enter TCHATT enrollment and referral data in the Trayt TCHATT tracking system (see Figure 5); therefore, data for May 2020-March 2020 are not included in these analyses, resulting in underreporting of TCHATT service delivery.
- The External Evaluation team had limited TCHATT session/encounter level data. While HRIs tracked referrals and recorded demographic information about students, Trayt did not track who was served (e.g., who had sessions), nor were data recorded to quantify how many sessions or extensions youth completed until July 2021.
- Trayt TCHATT session/encounter-level data is provided in per student aggregate form. This makes it difficult to know which care team providers were involved in individual sessions.

D3. CONTEXTUAL FACTORS INFLUENCING CPAN ENGAGEMENT AND IMPLEMENTATION

Background

Clinic Staff Surveys: The purpose of the clinic staff survey is to examine barriers and facilitators of implementation (i.e., calling CPAN), including organizational factors influencing implementation at the clinic and clinic-system level. Quantitative analyses were completed at the clinic or clinic-system level and the individual provider level. At the clinic or clinic-system level, the quantitative results are organized as follows: descriptive characteristics of clinics or clinic systems to whom outreach was directed, enrolled in Trayt (as of 7/8/21) and survey sample, perceptions of CPAN awareness and implementation factors, and reasons for calling or not calling CPAN. At the individual provider level, the quantitative results are organized as follows: descriptive characteristics of surveyed providers, perceptions of CPAN awareness and implementation factors, participation in CPAN activities, and reported perceived outcomes and future recommendations for CPAN. Survey respondents were also asked to provide qualitative open-ended responses to questions related to facilitators and barriers of the CPAN program. A detailed description of the survey methods is provided first, followed by quantitative results, qualitative results, and survey limitations (specific to CPAN).

Methods

In June 2021, we invited 909 CPAN providers to complete the CPAN Provider Year 1 Implementation Survey to examine factors influencing implementation at the clinic and clinic-system level. The list of providers was obtained by Trayt as of July 8, 2021; however, the list included duplicate CPAN provider information which needed to be resolved. See Appendix G for the survey protocols and instruments⁵⁻¹¹. Our goal was to survey 250 providers; after multiple rounds of recruitment, 236 providers across 86 clinics or clinic systems completed the electronic surveys. Each HRI was represented among survey participants, and the average response rate to the survey across HRIs was approximately 26%. The number of participant responses varied by clinic depending on who in the clinic agreed to participate in the survey (see Table 28). For the quantitative results, we conducted descriptive analyses comprising cross-tabulations and frequencies. For the open-ended qualitative results, we conducted content analyses of all open-ended responses. Coding categories were derived directly from the response data. Open-ended responses were coded under more than one category when necessary. For example, when two or more benefits of a program were identified in the same response. Preliminary categories and subcategories were refined throughout the analysis, with final codes organized into a hierarchical structure separately by survey question¹².

Figure 19. CPAN Provider Survey Flowchart: Recruitment & Participation

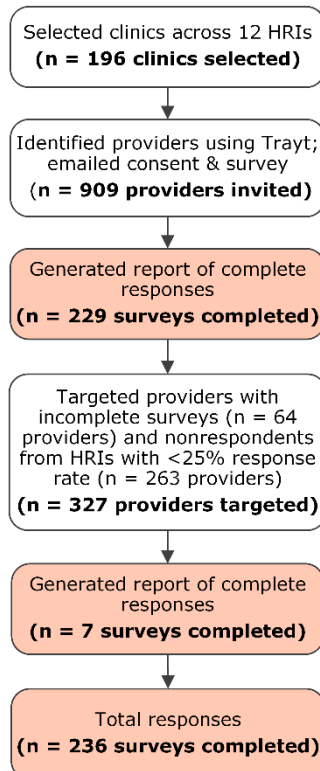


Table 28. Number of Survey Respondents per Clinic or Clinic System

	Surveyed Clinics or Clinic Systems (n = 86)
Number of Responses per Clinic	
1	45 (52.3%)
2	21 (24.4%)
3	7 (8.1%)
4	3 (3.5%)
5 or more	10 (11.8%)

Quantitative Results: Clinic or Clinic System-Level

Descriptive Characteristics of Clinics or Clinic Systems

This section (Tables 29-31) presents characteristics of the clinics or clinic systems on the CPAN outreach list obtained by COSH, enrolled in Trayt (as of 7/8/21), and/or surveyed as part of the external evaluation.

Table 29 compares geographic and population-level vulnerability indicators for clinics or clinic systems on the initial outreach list obtained by COSH, enrolled in Trayt (as of 7/8/21), and surveyed. Surveyed clinics or clinic systems mirror the distribution of clinics or clinic systems enrolled in Trayt (as of 7/8/21) in terms of geographic and population-level vulnerability indicators. However, non-metro (urban) Trayt enrolled and surveyed clinics or clinic systems are over-represented when compared to the total outreach population, and metro and non-metro (rural) Trayt enrolled and surveyed clinics or clinic systems are under-represented when compared to the total outreach population. The distribution of social vulnerability index scores was similar across the three groups.

Table 29. Comparison of Clinics or Clinic Systems on Initial Outreach List, Enrolled Clinics or Clinic Systems, and Surveyed Clinics or Clinic Systems by Geographic and Population-Level Vulnerability Indicators

	Clinics or Clinic Systems on Outreach List ^a (n = 8024)	Enrolled Clinics or Clinic Systems as of 7/8/21 (n = 656) ^b	Surveyed Clinics or Clinic Systems ^c (n = 86)
Rural-Urban Continuum Code			
Metro	7484 (93.3%)	570 (86.9%)	73 (84.9%)
Nonmetro (Urban)	297 (3.7%)	82 (12.5%)	13 (15.1%)
Nonmetro (Rural)	243 (3.0%)	4 (0.6%)	0
Social Vulnerability Index (SVI) Scores^d			
< 0.2 (Low vulnerability)	1977 (24.6%)	193 (29.4%)	20 (23.3%)
0.2 - 0.4	1325 (16.5%)	115 (17.5%)	19 (22.1%)
0.4 - 0.6	400 (5.0%)	49 (7.5%)	9 (10.5%)
0.6 - 0.8	3538 (44.1%)	229 (34.9%)	29 (33.7%)
0.8 + (High vulnerability)	784 (9.8%)	70 (10.7%)	9 (10.5%)

(a) Data source: List of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased by the Texas Medical Association by COSH. (b) Data source: Trayt CPAN data; enrolled refers to those clinics or clinic systems with a signed agreement as of 7/8/21. (c) Data source: External Evaluation CPAN Implementation Survey. (d) Data Source: CDC/ATSDR Social Vulnerability Index 2018. Note: Metro comprises: counties in metro areas of 1 million population or more; counties in metro areas of 250,000 to 1 million population; and counties in metro areas of fewer than 250,000 population. Nonmetro (Urban) comprises: urban population of 20,000 or more, adjacent to a metro area; urban population of 20,000 or more, not adjacent to a metro area; urban population of 2,500 to 19,999, adjacent to a metro area; and urban population of 2,500 to 19,999, not adjacent to a metro area. Nonmetro (Rural) comprises: completely rural or less than 2,500 urban population, adjacent to a metro area; and completely rural or less than 2,500 urban population, not adjacent to a metro area.

Table 30 presents the distribution of HRIs across clinics on the initial outreach list, enrolled in CPAN, and surveyed. There are some differences across the groups. All HRIs were represented, however, among the surveyed clinics.

Table 30. Comparison of Clinics or Clinic Systems on CPAN Outreach List, Enrolled Clinics or Clinic Systems, and Surveyed Clinics or Clinic Systems by HRI

	Clinics or Clinic Systems on Outreach List ^a (n = 8024)	Enrolled Clinics or Clinic Systems ^b (n = 656)	Surveyed Clinics or Clinic Systems ^c (n = 86)
HRI			
BCM	759 (9.5%)	50 (7.6%)	10 (11.6%)
TAMUHSC	333 (4.2%)	12 (1.8%)	6 (7.0%)
TTUHSC	518 (6.5%)	53 (8.1%)	7 (8.1%)
TTUHSCPE	244 (3.0%)	25 (3.8%)	4 (4.7%)
UNTHSC	685 (8.5%)	45 (6.9%)	7 (8.1%)
UTDeI	784 (9.8%)	114 (17.4%)	17 (19.8%)
UTHSCSA	935 (11.7%)	51 (7.8%)	3 (3.5%)
UTHSCH	1081 (13.5%)	35 (5.3%)	6 (7.0%)
UTHSCT	356 (4.4%)	78 (11.9%)	11 (12.8%)
UTMB	297 (3.78%)	37 (5.6%)	3 (3.5%)
UTRGV	433 (5.4%)	16 (2.4%)	3 (3.5%)
UTSW	1599 (19.9%)	140 (21.3%)	9 (10.5%)

(a) Data source: List of providers (adolescent medicine, family medicine, pediatrics, internal medicine, general practice) in Texas purchased by the Texas Medical Association by COSH.

(b) Data source: Trayt CPAN data; enrolled refers to those clinics or clinic systems with a signed agreement as of 7/8/2021.

(c) Data source: External Evaluation CPAN Implementation Survey.

Table 31 presents the characteristics of surveyed clinics or clinic systems with respect to the type of clinic practice, clinic region, perceptions of patient demographics and primary payment method. Characteristics are presented for the total sample of clinics or clinic systems surveyed. In the survey sample, approximately one third of clinics, each, were private practice and federally-qualified health centers, respectively. Almost half of surveyed clinics or clinic systems were from urban regions. Clinics or clinic systems surveyed reported a diverse patient population with respect to race/ethnicity and primary payment method of patients.

Table 31. Characteristics of Surveyed Clinics or Clinic Systems with Respect to Type of Clinic Practice, Clinic Region, and Perceptions of Patient Demographics and Primary Payment Method

	Clinics or Clinic Systems ^a (n = 86)
Type of Clinic Practice^b	
Private practice, including solo, group practice, or HMO	34 (39.5%)
Federally-qualified health center, including community, migrant, rural, or Indian health center	32 (37.2%)
Hospital-based clinic, including university clinic or residency teaching practice	20 (23.3%)
Clinic Region^b	
Urban	42 (49.4%)
Suburban	27 (31.8%)
Rural	16 (18.8%)
Demographics of Patient Population^{b,c}	
51% or more White, not of Hispanic origin	29 (33.7%)
51% or more Black, not of Hispanic origin	12 (14.0%)
51% or more Hispanic	42 (48.8%)
51% or more American Indian/Alaskan Native	22 (25.6%)
51% or more Asian or Pacific Islander	12 (14.0%)
Primary Payment Method of Clinic Patients^{b,c}	
51% or more Private insurance	31 (36.0%)
51% or more Medicaid or your state's Children's Health Insurance Program (CHIP)	48 (55.8%)
51% or more Uninsured/self-pay	16 (18.6%)
51% or more Medicare	23 (26.7%)

(a) Data source: External Evaluation CPAN Implementation Survey; due to missing data, n=85 for Clinic Region. Response options are not mutually exclusive with the exception of clinic region. (b) Demographic characteristics were reported by the person who reported working at their clinic the longest when there were multiple respondents per clinic. In the case of a tie, one respondent was randomly selected per clinic. There were eight clinic or clinic systems where a respondent was randomly selected. (c) "51% or more responses" reflects that the survey respondent indicated that approximately 51% of their patient population matched those demographic characteristics.

Table 32 presents the characteristics of surveyed clinics or clinic systems with respect to clinic staffing and patient load. Surveyed clinics or clinic systems reported a median number of four providers, two nurses, five medical assistants, four support staff, and one administrator. A median number five patients were seen per hour among clinics or clinic systems surveyed.

Table 32. Characteristics of Surveyed Staff at Clinics or Clinic Systems with Respect to Clinic Staffing and Patients Load (Median Scores)

Characteristics of Survey Participants and Clinics Represented in Survey	Clinics or Clinic Systems ^a	
	n	Median [Min, Max]
Clinical Providers (physicians, PAs, NPs) ^b	82	4.33 [1.00, 45.0]
Nurses ^b	72	2.00 [0, 80.0]
Medical Assistants ^b	79	5.50 [0, 45.0]
Support staff (medical records, check-in, etc.) ^b	77	4.50 [0, 45.0]
Administrators ^b	75	1.50 [0, 22.0]
Average number of patients scheduled per hour ^b	84	5.02 [0, 60.0]
Average number of patients seen per hour ^b	84	4.50 [0, 45.0]

(a) Data source: External Evaluation CPAN Implementation Survey. (b) Characteristics were reported individually, and then averaged within clinic. Counts were averaged within clinic using all non-missing responses

CPAN Awareness and Implementation Among Surveyed Clinics

We examined awareness and implementation (i.e., making calls) at the clinic or clinic-system level. The vast majority of surveyed clinics or clinic systems reported being aware of CPAN. Approximately two-thirds of surveyed clinics reported making at least one call to CPAN on occasion or regularly; one-third reported not making any calls to CPAN (Table 33).

Table 33. Awareness of and Calls to CPAN among Clinics and Clinic Systems

	Clinics or Clinic Systems ^a (n = 86)
Aware of CPAN^b	
Not Aware	3 (3.5%)
At Least One Person Aware ^c	83 (96.5%)
Implementing CPAN (past 12 months)^b	
No Calls Made ^d	29 (33.7%)
At Least One Call but Not Anymore	1 (1.2%)
At Least One Call on Occasion or Regularly	56 (65.1%)

(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Measures are collected from individuals; however, results are aggregated by clinic and reflect at least one person from the clinic or clinic system selecting the provided option.

(c) Reflects awareness as slightly true, somewhat true, or very true.

(d) No calls made and respondent either had intention or no intention to call CPAN in the future.

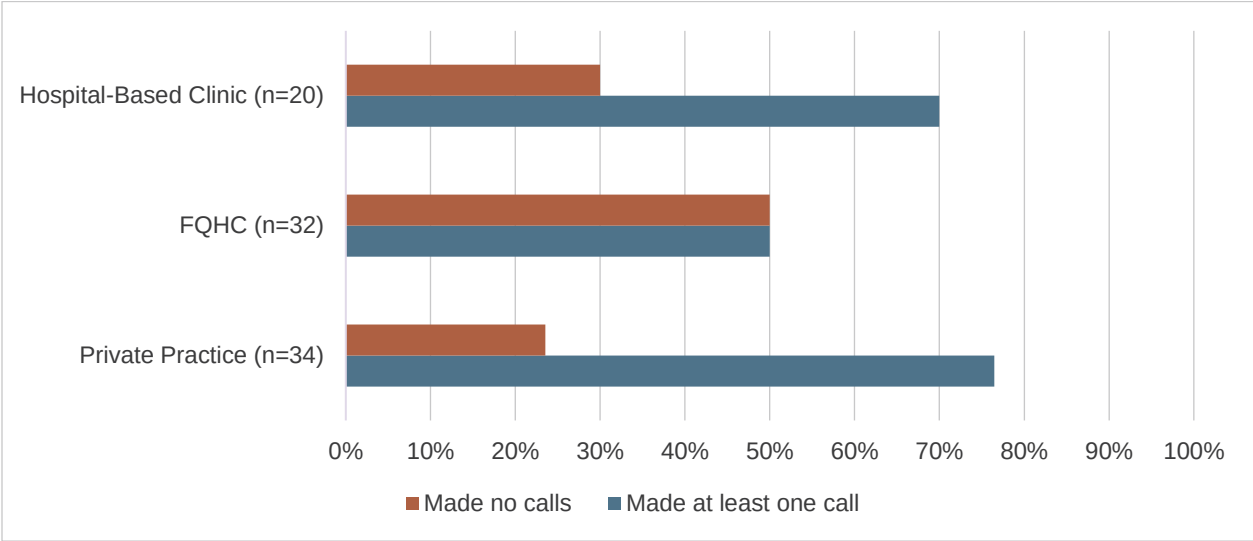
Clinic Characteristics Associated with Calling CPAN.

We also examined the characteristics of clinics or clinic systems with reports of at least one call to CPAN, or with no reported calls to CPAN. Characteristics examined included type of clinic practice, clinic region, patient population demographics and primary payment methods, clinic staffing, and patient load (Figures 20-23, Table 34). Note that all characteristics were reported by the person at the clinic or clinic system who reported working at their clinic the longest when there were multiple respondents per clinic and response options were not mutually exclusive (with exception of clinic region). Additionally, “51% or more responses” reflects that the survey respondent indicated that approximately 51% of their patient population matched those demographic characteristics.

Some differences were noted with respect to these clinic or clinic system characteristics, though it should be noted that tests of statistical significance were not conducted. For example, private practice (including solo, group practice, or HMO) and hospital-based clinics or clinic systems (including university clinic or residency teaching practice) reported making at least one call to CPAN more often than federally-qualified health centers (FQHCs, which included community, migrant, rural, or Indian health centers) (Figure 20). Further, suburban clinics were most likely to report making at least one CPAN calls, followed by urban, and then rural clinics or clinic systems (Figure 21). With respect to patient demographics of the clinic or clinic system, CPAN calls were comparable among groups, though clinics serving 51% or more Hispanic patient population were somewhat less likely to report CPAN calls (Figure 22). Clinics or clinic systems that served a majority patient population that was uninsured/self-pay were less likely to report making at least one CPAN call compared to clinics or clinic systems with other majority primary payment methods (private insurance, Medicaid or CHIP, Medicare) (Figure 23). With respect to clinic staffing and patient

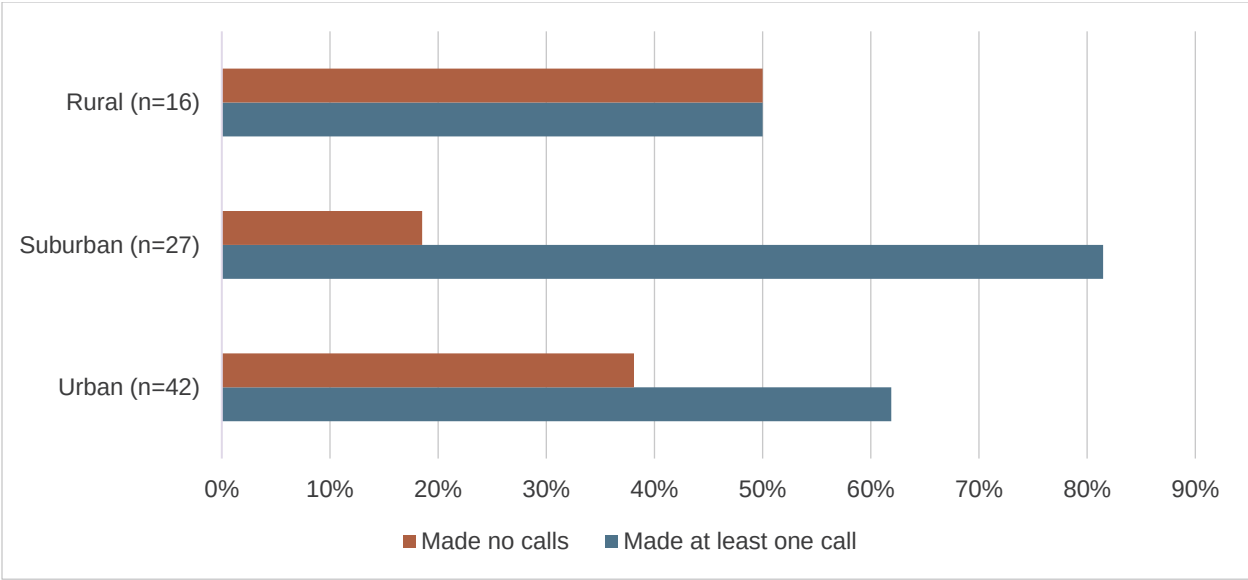
loads, there was a slightly higher median number of providers and average number of patients seen per hour reported for clinics who made at least one call versus clinics or clinic systems who made no call (Table 34).

Figure 20. Type of Clinic Practice (as Reported by Provider) and Clinic Calls to CPAN^a



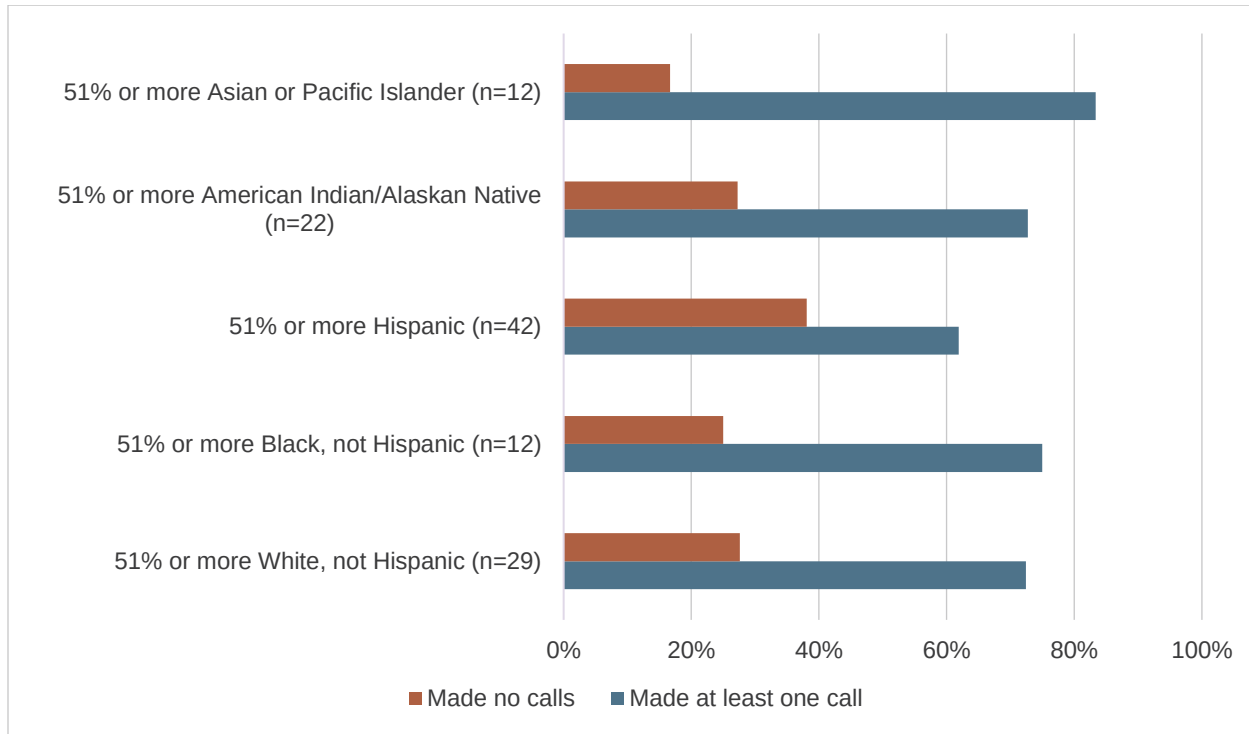
(a) Data source: External Evaluation CPAN Implementation Survey.

Figure 21. Clinic Region (as Reported by Provider) and Clinic Calls to CPAN^a



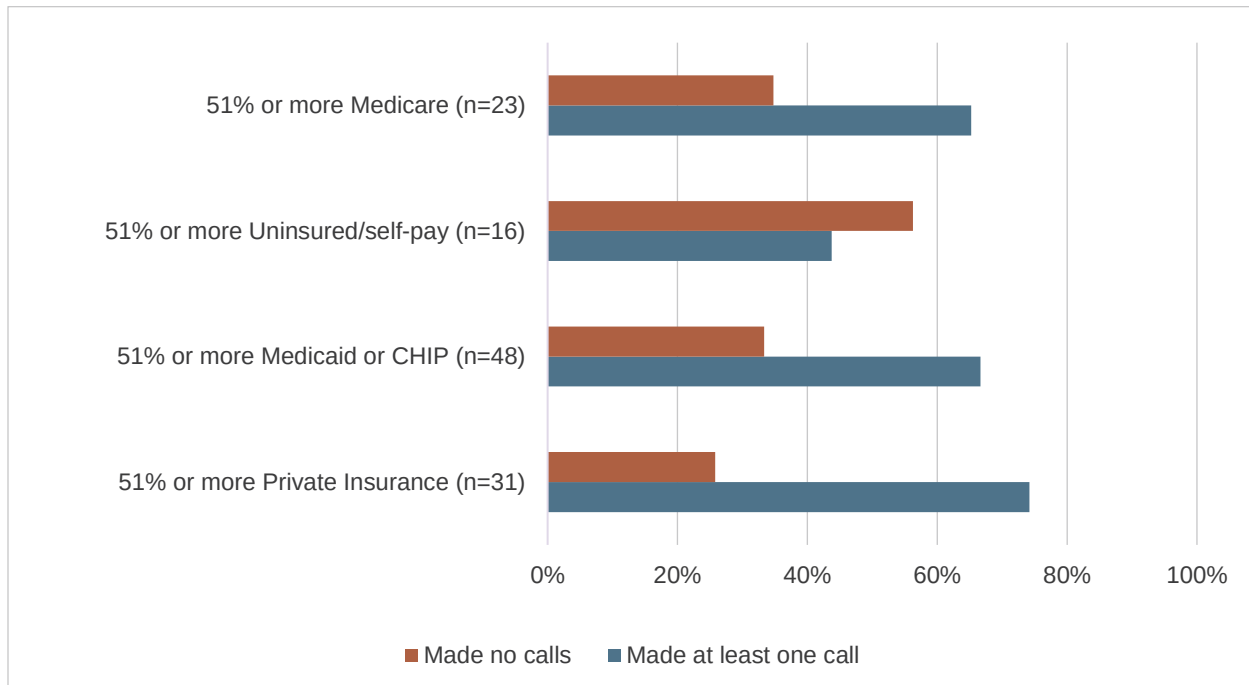
(a) Data source: External Evaluation CPAN Implementation Survey.

Figure 22. Patient Population Demographics (as Reported by Provider) and Clinic Calls to CPAN^a



(a) Data source: External Evaluation CPAN Implementation Survey. Note: Racial/Ethnic categories are not mutually exclusive.

Figure 23. Primary Payment Method of Clinic Patients (as Reported by Provider) and Clinic Calls to CPAN^a



(a) Data source: External Evaluation CPAN Implementation Survey. Note: Primary payment categories are not mutually exclusive.

Table 34. Characteristics of Surveyed Clinics or Clinic Systems, by Clinic Staffing

	Clinics or Clinic Systems that Made at Least One Call ^a		Clinics or Clinic Systems that Made No Calls ^a	
	n	Median [Min, Max]	n	Median [Min, Max]
Providers (physicians, PAs, NPs) ^b	55	4.67 [1.00, 45.0]	27	4.00 [1.00, 26.0]
Nurses ^b	47	2.00 [0, 80.0]	25	2.00 [0, 6.00]
Medical Assistants ^b	54	5.25 [0, 45.0]	25	6.00 [0, 25.0]
Support staff (medical records, check-in, etc.) ^b	52	4.50 [0, 45.0]	25	5.00 [0, 20.0]
Administrators ^b	50	1.50 [1.00, 22.0]	25	1.00 [0, 7.00]
Average number of patients scheduled per hour ^b	56	5.35 [0, 60.0]	28	5.00 [2.00, 25.0]
Average number of patients seen per hour ^b	56	5.17 [0, 45.0]	28	4.00 [1.50, 30.0]

(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Characteristics were reported individually, and then averaged within clinic. Counts were averaged within clinic using all non-missing responses.

Clinic Readiness to Implement CPAN, R=MC2: *Readiness to implement the CPAN program comprises: (1) **Motivation** (to implement CPAN); (2) **innovation-specific Capacity** (e.g., human, technical and financial support required of clinics to implement CPAN); and (3) **general Capacity** (e.g., clinic staffing or organizational leadership available, in general).*

Organizational Readiness. We also examined clinic-related factors associated with organizational readiness to implement (or call) CPAN among surveyed clinics (Figures 24 and 25). There are three major components (or factors) of organizational readiness **Readiness**, **Motivation**, specific organization **Capacity**, and general organization **Capacity**. This heuristic provides practical insights into how to understand and support organizational readiness to

implement a new program or policy throughout implementation.⁶ Table 35 provides the definitions of the different sub-components of each factor. According to the R=MC2 framework, organizations with high levels of motivation, innovation-specific capacity, and general capacity will be more likely to adopt and implement an effective program, practice, or policy. Unfortunately, general capacity questions were not included in the CPAN external evaluation survey due to length limitations.

Subcomponents of these constructs were measured on a five-point Likert scale (1 = strongly disagree – 5 = strongly agree) with lower scores indicating lower levels of readiness and higher scores indicating higher readiness, with the exception of complexity (scores range from 1-5). The clinic score was calculated in a two-step process. Individual scores were formed by averaging the responses for each scale for each individual that responded to at least 2/3 of the items for the scale. For each clinic where at least 2/3 of the eligible responders had a scale score, the clinic score was formed by averaging the individuals' scores.

Table 35. Definitions of Organizational Factors Associated with Implementation^{13,14}

Factor	Definition
Motivation	Degree to which the organization wants CPAN to happen.
Relative Advantage	If CPAN seems more useful than what the organization is currently doing.
Compatibility	Whether CPAN fits with how the organization does things.
Complexity	How complex CPAN seems.
Priority	How important CPAN is compared to other priorities.
Observability	How easy it is to see that CPAN is producing outcomes.
Innovation-Specific Capacity	What we need to implement CPAN.
Innovation-Specific Knowledge and Skills	Degree to which there is enough knowledge and skills within the organization to use CPAN.
Program Champion	If there is an important person(s) that supports CPAN.
Inter-Organizational Relationships	The connections beyond the organization (people, organizations, and other communities) to help with CPAN.
Intra-Organizational Relationships	The relationships within the organization that support the use of CPAN.
Implementation Climate	Necessary supports, processes, and resources to enable the use of CPAN.

Overall, clinics and clinic systems aware of CPAN reported favorable scores among motivation subcomponents (see Figure 24). The subcomponents with the highest scores are clinic compatibility and observability. As expected, among clinics or clinic systems with at least one call to CPAN reported, findings reveal higher motivation subcomponent scores compared to clinics or clinic systems who reported no calls.

Among clinics or clinic systems who called CPAN, the highest innovation-specific capacity subcomponent scores were for clinic knowledge, skills and abilities (see Figure 25). The lowest innovation-specific capacity subcomponent score was for clinic implementation climate.

Figure 24. Organizational Factors Associated with CPAN Implementation (Motivation-Specific Sub-Components) among all Clinics or Clinic Systems (n=83), those that Made at Least One Call (n=57) and those that Made No Calls (n=26)

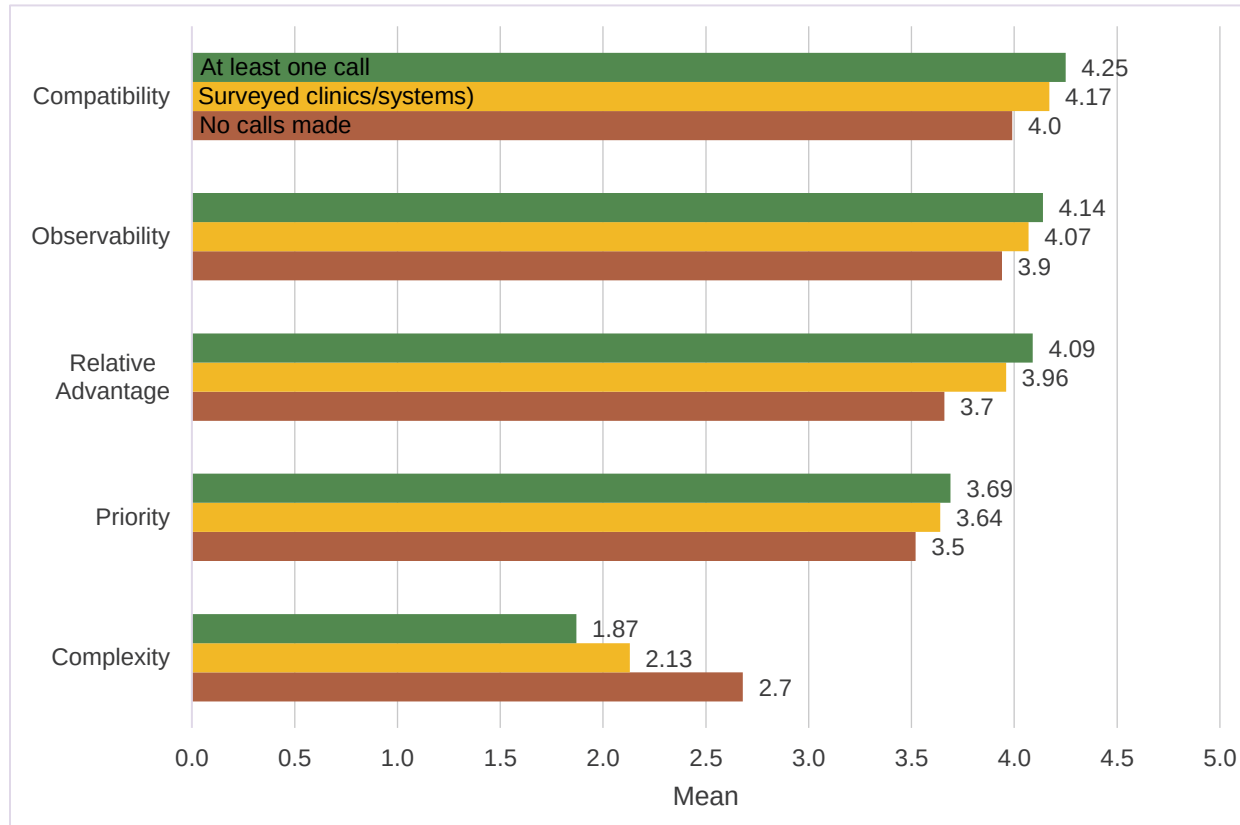
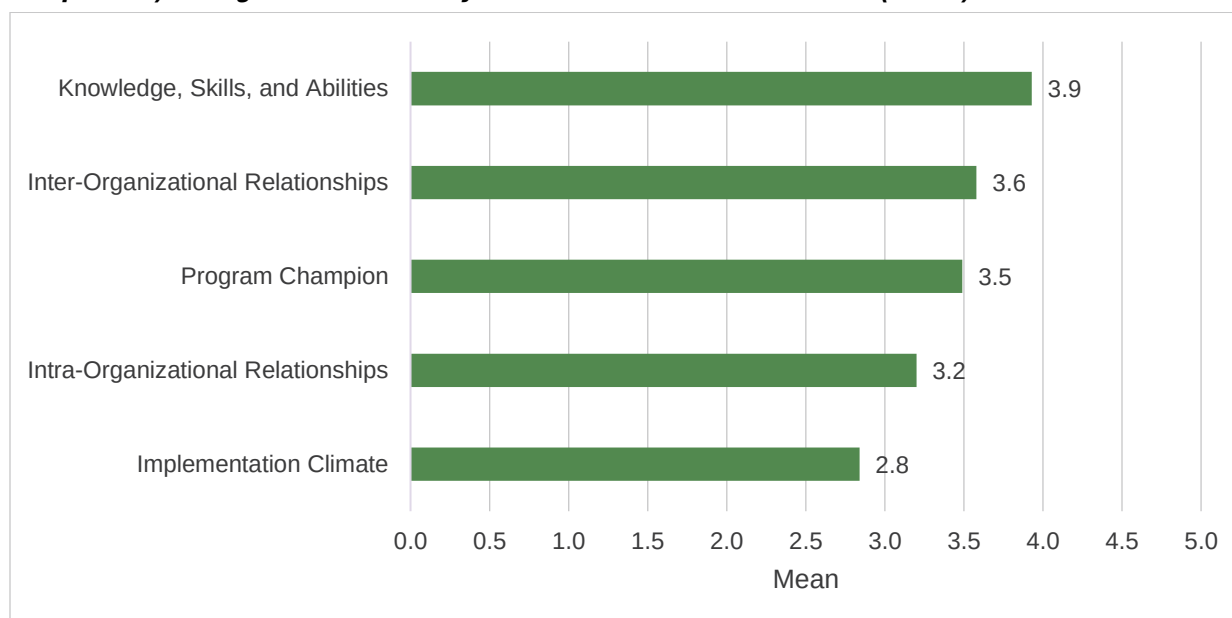


Figure 25. Organizational Factors Associated with CPAN Implementation (Innovation-Specific Sub-Components) among Clinics or Clinic Systems that Made at Least One Call (n = 57)



Reasons for Calling and Not Calling CPAN

The external evaluation survey also included questions related to the reasons why CPAN was called or not called. Further, outcomes of call were also queried. The most common reasons for CPAN calls were for medication assistance and referral assistance. General resources and behavioral management followed as the next most common reasons. Approximately one-third of clinics or clinic systems reported reasons for calling related to each of the following areas: assessment, diagnosis, advice for parents, and crisis (Table 36). Note that respondents could choose more than one option for reasons and outcomes.

Table 36. Reasons for Calls among Clinics or Clinic Systems that Reported at Least One Person Call CPAN on Occasion or Regularly

	Clinics or Clinic Systems with At Least One Call to CPAN ^a (n = 56)
Reason for Call^b	
Assessment	19 (33.9%)
Diagnosis	21 (37.5%)
Behavioral management	33 (58.9%)
Medication management	45 (80.4%)
Referral assistance	44 (78.6%)
General resources	29 (51.8%)
Advice for parents	18 (32.1%)
Second opinion (e.g., question or concern about care provided by a community mental health provider)	13 (23.2%)
School issues	4 (7.1%)
Crisis	16 (28.6%)

(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Reason for call was selected at least once by at least once person in the clinic or clinic system.

With respect to outcomes that occurred at least once as a result of a CPAN consultation among clinics that used CPAN, call outcomes reported by survey respondents are presented in Table 37. There was a roughly equal distribution of surveyed clinics or clinic systems that reported outcomes related to an adjustment of a current medication, recommendation of therapy, and referral to another mental health professional (reported by 60-70% of clinics or clinic systems). Also, commonly reported by a little more than half of surveyed clinics or clinic systems was an initiation of a new medication and continuation of PCP management.

Table 37. Outcomes that Occurred at Least Once as a Result of a CPAN Consultation among Clinics Implementing CPAN

Outcome of CPAN Consultation ^b	Clinics or Clinic Systems Calling CPAN (n = 57) ^a
Initiation of new medication	32 (56.1%)
Adjustment of current medication	36 (63.2%)
Recommendation of therapy	40 (70.2%)
Referral to a child and adolescent psychiatrist	37 (64.9%)
Referral to other mental health professional (e.g. LP, LPC, LCSW, LMFT) in the community	36 (63.2%)
Continuation of PCP management	30 (52.6%)
Other needs of patient met ^c	2 (3.5%)

(a) Data source: External Evaluation CPAN Implementation Survey; Includes clinics or clinic systems with at least one call to CPAN on occasion or regularly and one additional clinic/clinic system that reported calling CPAN in the past but not anymore.

(b) Outcome was selected at least once by at least once person in the clinic or clinic system.

(c) Referred to emergency, recommendations on CPS.

Reasons for not calling CPAN among clinics or clinic systems among non-users. The most common reason provided (by at least one person from the surveyed clinics or clinic systems) was not coming across any mental health issues that could not be addressed on their own (Table 38).

Table 38. Reasons Reported for Not Calling CPAN Among Clinics or Clinic Systems that Reported Not Ever Calling CPAN

Reasons for Not Calling ^b	Clinics or Clinic Systems not Calling CPAN ^a (n = 29)
I did not know how to call in	6 (20.7%)
I have not come across any mental health issues that I could not address on my own	18 (62.1%)
I am able to meet the needs of children with mental health issues using existing resources	7 (24.1%)
Other ^c	8 (27.6%)

(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Reason was selected at least once by at least one person in the clinic or clinic system. Respondents can choose more than one option so results are not mutually exclusive.

(c) Other reasons: Do not see large number of pediatric patients, work after hours when CPAN is not available, have consulting psychiatrist for clinic, prefers psychiatrist to work with patient, accustomed to using local resources, lack of time, not sure if enrolled.

Quantitative Results: Provider-Level

Descriptive Characteristics of Surveyed Providers

In addition to providing results at the clinic or clinic system-level, we also provide results at the individual provider-level. Table 39 presents the characteristics of surveyed providers with respect to their demographic characteristics. The majority of providers surveyed were female. Further, half (52%) of the sample was White and approximately 17% Hispanic. More than half of the sample reported completing their professional training within the last 10 years. Physicians comprised approximately two-thirds of the sample; almost 50% reported their primary role as pediatrician.

Table 39. Characteristics of Survey Providers

	Total Providers ^a
Provider Gender	n = 235
Male	62 (26.4%)
Female	172 (73.2%)
Other	1 (0.4%)
Provider Race/Ethnicity^b	n = 230
White, Non-Hispanic	121 (52.6%)
Black, Non-Hispanic	12 (5.2%)
Hispanic	39 (17.0%)
American Indian/Alaska Native	1 (0.4%)
Other	57 (24.8%)
Year Provider Completed Professional Training	n = 218
Before 1980	2 (0.9%)
1980 – 1990	10 (4.6%)
1990 – 2000	25 (11.5%)
2000 – 2010	45 (20.6%)
2010 – 2020	99 (45.4%)
2020 or still in training	37 (17.0%)
Provider Primary Role^c	n = 236
Physician Assistant	5 (2.1%)
Nurse Practitioner	41 (17.4%)
Pediatrician	110 (46.6%)
Family Physician	42 (17.8%)
Other Physician besides Pediatrician or Family Physician	7 (3.0%)
Medical Director	8 (3.4%)
Resident	38 (16.1%)
Other ^d	2 (0.8%)
Years Worked at this clinic	n = 232
Median [Min, Max]	3.50 [0, 35.0]
Hours Worked at this clinic per week	n = 230
Median [Min, Max]	40.0 [1.00, 60.0]

(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Other comprises mixed race, Indian, or prefers not to answer.

(c) Respondents could choose more than one option; thus, the responses are not mutually exclusive.

(d) Other position refers to clinic nurse, director, behavioral health coordinator, psychologist, medical assistant, or general pediatrics.

CPAN Awareness and Implementation Among Surveyed Providers

Table 40 presents the degree of awareness and calls made to CPAN from the perspective of individual survey respondents. The majority (72%) of surveyed respondents reported being aware of CPAN. Approximately 47% of surveyed respondents reported calling CPAN at least once in the last 12 months. Almost half reported not making any calls to CPAN; however, 49% of non-callers reported plans to call CPAN in the future.

Table 40. Awareness and Implementation of CPAN Among Individual Survey Providers

	Total Providers ^a (n = 236)
CPAN Awareness (n = 236)	
Not at all true	18 (7.6%)
Slightly true	22 (9.3%)
Somewhat true	26 (11.0%)
Very true	170 (72.0%)
CPAN Implementation^b (n = 218)	
No, and I have no plans to do so	8 (3.7%)
No, but I plan to call CPAN in the future	107 (49.1%)
Yes, I called CPAN on occasion	70 (32.1%)
Yes, I called CPAN regularly	32 (14.7%)
Yes, but I do not call CPAN anymore	1 (0.5%)

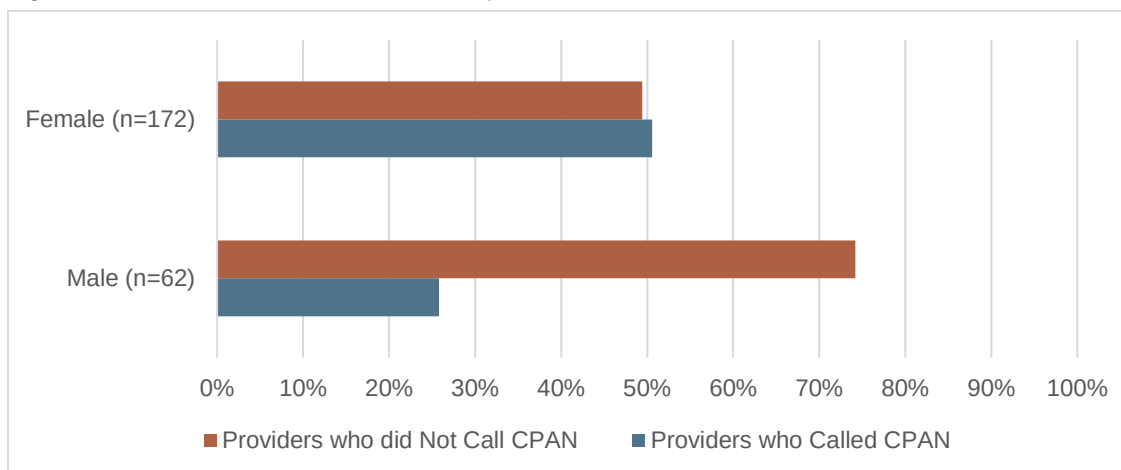
(a) Data source: External Evaluation CPAN Implementation Survey.

(b) Implementation status assessed among individuals who reported a slightly, somewhat, or very true level of CPAN awareness; n=18 missing.

We also examined the characteristics of providers that reported at least one call to CPAN and did not report any calls to CPAN. Characteristics examined included gender, year provider completed professional training, provider primary role, years worked at this clinic, and hours worked at this clinic per week (Figures 26-28).

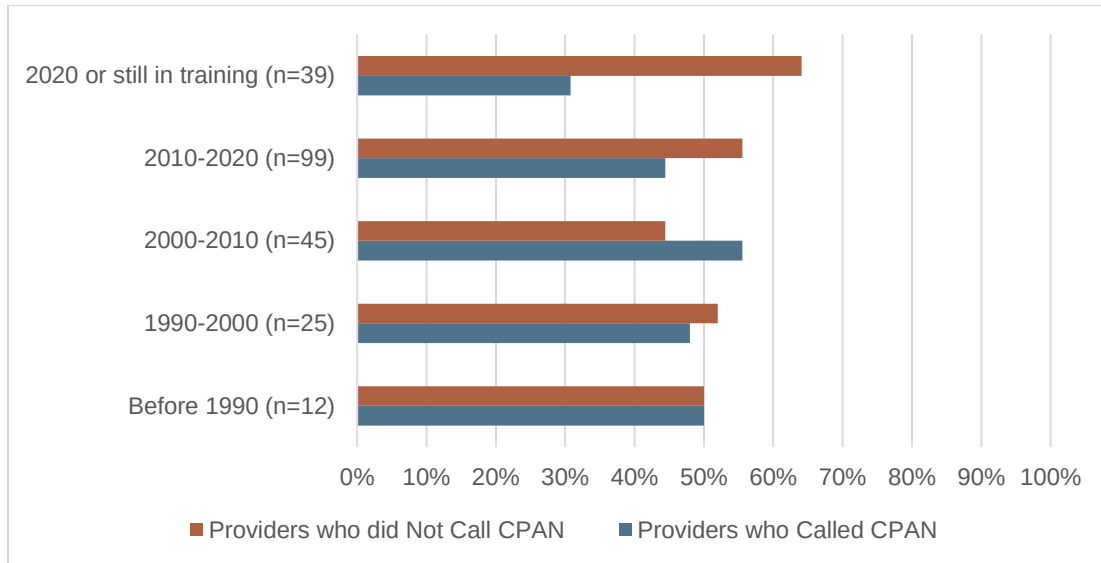
Some differences were noted with respect to these provider characteristics, though it should be noted that tests of statistical significance were not conducted. For example, female providers were more likely to make at least one call to CPAN when compared to male providers (Figure 26). Year completed professional training was somewhat comparable across providers who reported calling and not calling CPAN; providers trained in 2020 or later were least likely to report calling CPAN (Figure 27). Pediatricians were most likely to call CPAN compared to other reported provider roles (Figure 28).

Figure 26. Provider Gender, Race/Ethnicity and CPAN Calls^a



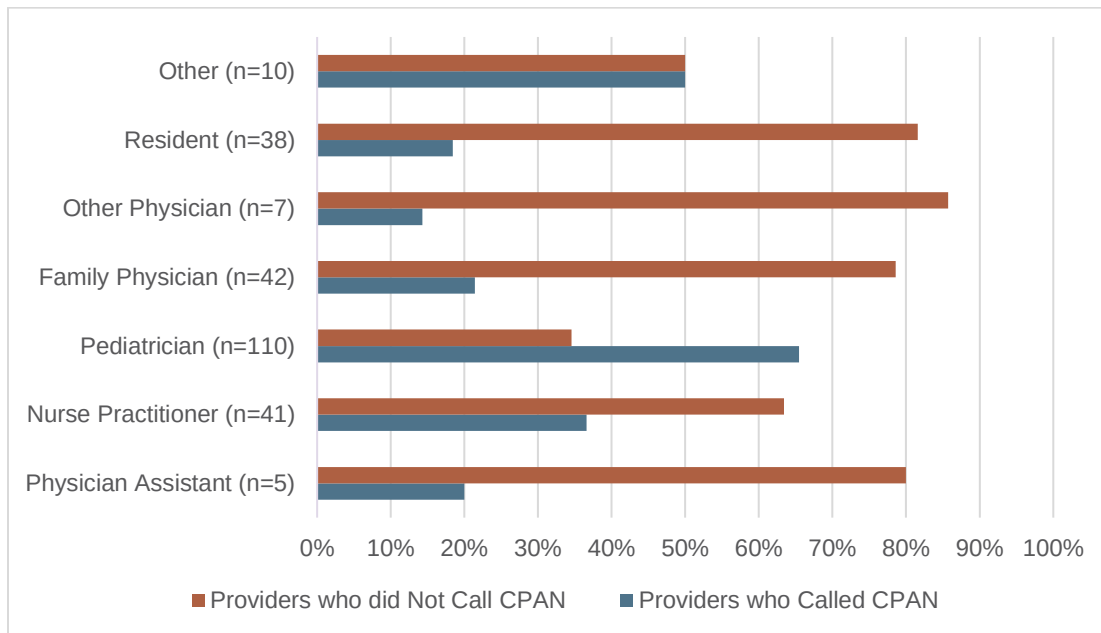
(a) Data source: External Evaluation CPAN Implementation Survey.

Figure 27. Year Provider Completed Professional Training and CPAN Calls^a



(a) Data source: External Evaluation CPAN Implementation Survey.

Figure 28. Provider Primary Role and CPAN Calls^a



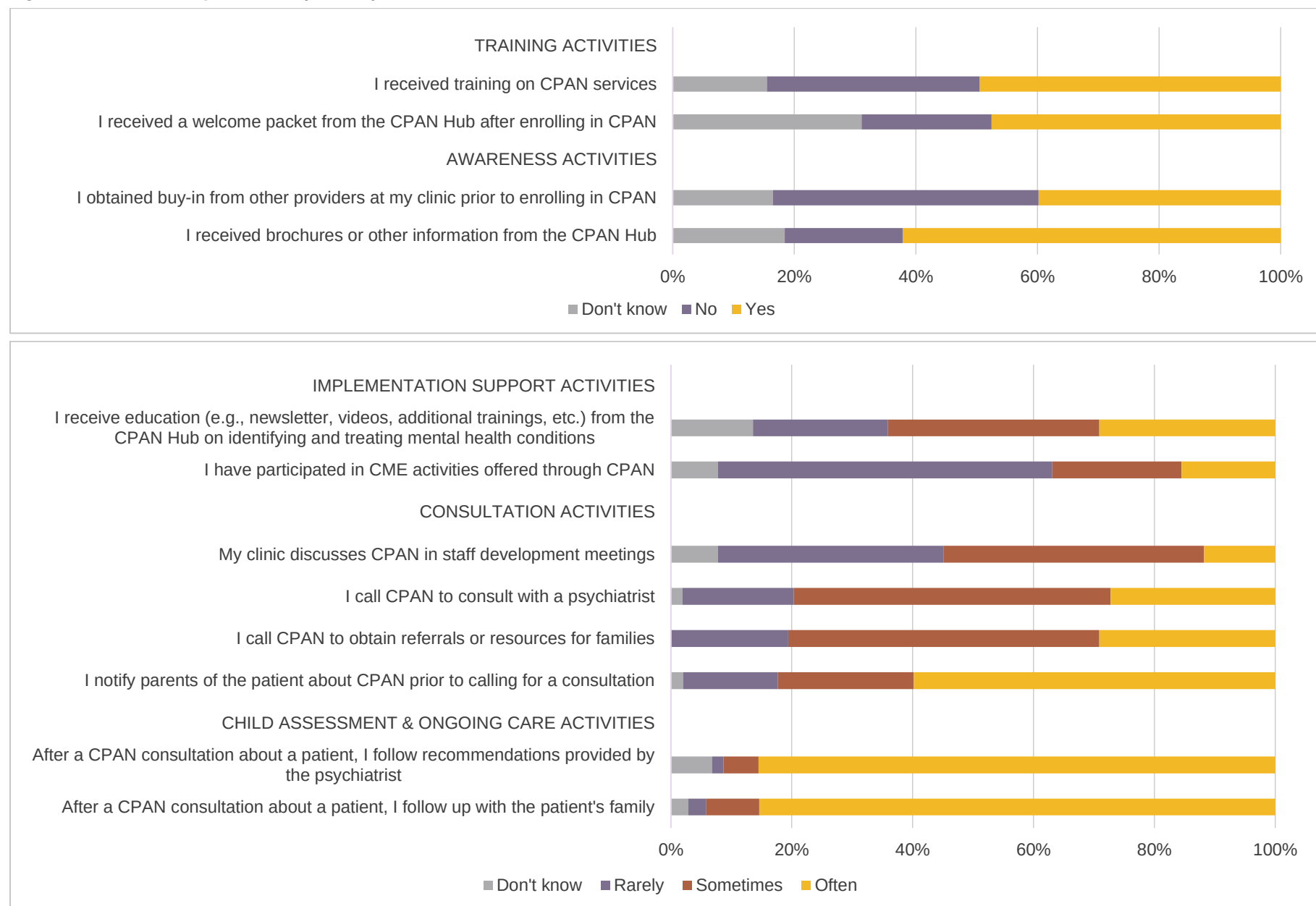
(a) Data source: External Evaluation CPAN Implementation Survey.

Participation in CPAN Activities

Among providers who reported calling CPAN at least one time, we also queried respondents' participation in various activities that comprise CPAN. These questions were designed to assess implementation fidelity to the CPAN program steps described in the process maps. Activities were divided into Awareness, Training, Consultation, and Child Assessment and Ongoing Care activities; survey items were developed based on the CPAN process maps developed with CPAN stakeholders.

The majority of providers reported receiving brochures or other information from the CPAN hub. Approximately 40-50% reported obtaining buy-in from other providers at the clinic before enrolling in CPAN, and receiving a welcome packet and CPAN training. Approximately one-third of surveyed providers did not know if they received a welcome packet. The vast majority of providers reported sometimes or often calling CPAN to consult with a psychiatrist and to obtain referrals or resources for families. Vast majority also participate in child assessment and ongoing care activities related to following the psychiatrist's recommendations and follow up with the patient's family (Figure 29).

Figure 29. CPAN Activity Checklist (n = 103)



Reported Perceived Outcomes and Future Recommendations for CPAN

More than 70% of providers reported their knowledge, skills, and confidence to provide mental health care increased moderately or very much due to CPAN (Table 41).

Table 41. Survey Providers' Perceived Outcomes of CPAN

	Providers who Called CPAN (n = 103) ^a
My knowledge in mental health care increased.	
Not at all	3 (2.9%)
Slightly	24 (23.3%)
Moderately	58 (56.3%)
Very much	18 (17.5%)
My skill to provide mental health care increased.	
Not at all	4 (3.9%)
Slightly	22 (21.4%)
Moderately	51 (49.5%)
Very much	26 (25.2%)
My confidence to provide mental health care increased.	
Not at all	4 (3.9%)
Slightly	25 (24.3%)
Moderately	41 (39.8%)
Very much	33 (32.0%)

(a) Data source: External Evaluation CPAN Implementation Survey. Includes providers who called CPAN occasionally or regularly, and also includes providers who called CPAN in the past but not anymore.

Almost all providers reported that they agree or strongly agree with recommending CPAN to other providers (Table 42). A similar percentage reported an intention to continue using CPAN in the next 6 months.

Table 42. Survey Providers' Recommendations and Future Use of CPAN

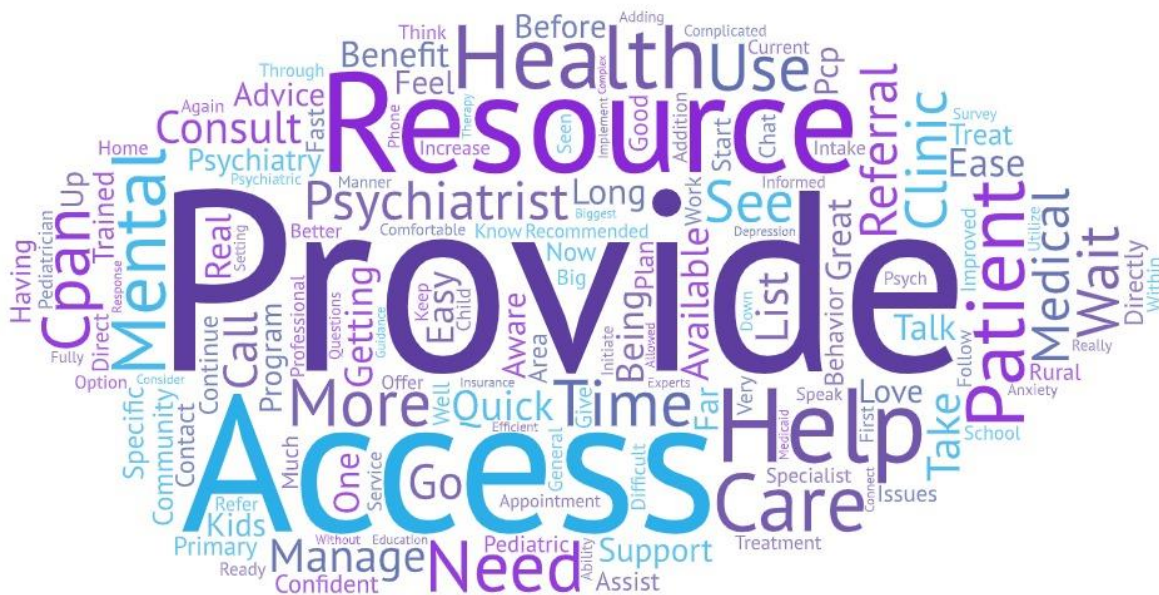
	Respondents Implementing CPAN (n = 103) ^a
I would recommend the CPAN program to other providers.	
Strongly Disagree	1 (1.0%)
Disagree	0 (0%)
Neither Agree nor Disagree	4 (3.9%)
Agree	37 (35.9%)
Strongly Agree	61 (59.2%)
I intend to continue using the CPAN program in the next 6 months.	
Strongly Disagree	0 (0%)
Disagree	0 (0%)
Neither Agree nor Disagree	4 (3.9%)
Agree	36 (35.0%)
Strongly Agree	61 (59.2%)

(a) Data source: External Evaluation CPAN Implementation Survey. Includes providers who called CPAN occasionally or regularly, and also includes providers who called CPAN in the past but not anymore.

Qualitative Results: Analysis of Open-Ended Provider Responses

The findings in this section discuss CPAN survey respondents' perceptions of the benefits of the program, as well as areas for improvement. Figure 30 visualizes the content discussed across both of these open-ended questions. The size of words depict the frequency in which they were mentioned (highest frequency words larger; lower frequency words smaller).

Figure 30. Visual Content Analysis of CPAN Qualitative Survey Data



Benefits of the CPAN Program

Overall, 94 CPAN providers provided responses to open-ended questions about the greatest benefits of the CPAN program. Out of the 94 respondents, 78 (83% of total respondents) indicated that **accessibility was the greatest benefit** of the CPAN program. Respondents specified that accessibility of consultation services, information, and resources of the CPAN program helped them to better address the pediatric mental health needs of their patients. They found that immediate access to mental health professionals, especially of psychiatrists, is beneficial to serving their patients as wait times for direct mental health care services can be long and resources limited. A few providers indicated that the accessibility of mental health professionals was specifically beneficial to serving rural populations and getting them connected to resources. Providers appreciated quick consultations with psychiatrists to get the immediate needs of their patients met, whether it was medication management or referrals.

“Easy, fast and direct access to a psychiatrist for recommendations on medication, care and referrals.”

“Quick easy access to knowledgeable physicians and resources for so much unmet need in the community, allowing me to take better care of patients in the medical home.”

“A simple but huge benefit: CPAN opens access for our rural clinic to pediatric psychiatry when we quite frankly had little to none before.”

“Increasing access to mental health experts for primary care providers and providing support/decision making assistance to benefit patients.”

“The biggest benefit is in supporting providers, mostly primary care providers, in taking care of our patients with mental health illnesses when they are unable to get that care elsewhere due to lack of resources, long wait times, etc.”

Another benefit that respondents (n=10) mentioned was their **increased confidence in treating their pediatric patients with mental health needs without a referral**. Specifically, providers indicated that they felt more comfortable prescribing and managing the medication needs of patients with psychiatric conditions.

“CPAN has allowed me to consult with a psychiatrist about more complex mental health patients so that I can initiate medications that I do not routinely start. I am used to using first line SSRIs for straight forward anxiety and depression, but CPAN has helped me take care of my patients in my clinic when they need escalation of care - adding additional medications, adding antipsychotics, etc. It has given me the confidence to start medications I otherwise would not have.”

“Helping me feel more comfortable prescribing medications for depression and anxiety that I was never trained to do but there is such a need now.”

Some respondents (n=8) specifically noted that **community referrals for patients** was another benefit of the CPAN program. While accessibility of mental health professionals to providers helped to avoid unnecessary referrals that could be addressed in the medical home, several respondents did indicate that referrals to community resources was an asset of the program.

“It is very hard to find available providers and referrals to specific providers are helpful.”

“Community referral sources.”

Overall, most respondents agreed that access to consultation services, information, and resources was the biggest benefit to enrolling and using the CPAN services. Additionally, CPAN has increased primary providers’ confidence in treating patients with mental health needs more effectively and helped connect them with community resources that could benefit their patients when additional care was needed. One respondent indicated that they had not seen a benefit of the program so far, and one respondent had not yet used the service.

Improvements to the CPAN Program

Overall, 75 CPAN providers provided open-ended responses asking about improvements to the CPAN program. CPAN providers varied in their responses to areas for program improvement. The most frequently mentioned areas for improvement include the desire for **expanded services** (n=17), **improved outreach and awareness of CPAN in the community** (n=13), **additional communication**

options (n=10), more training on the program (n=6), and improved connections to resources and referrals in the community (n=6). Together, these identified areas made up 69% of total responses.

Respondents believe that the CPAN program could be improved by offering more comprehensive services to primary care providers. Some of the suggestions for added services include taking outpatient appointments from the primary care providers that call in, establishing telehealth services, providing more specialized support for unique cases and those in urgent care settings, expanding education programs, providing summaries and keeping records of conversations, and providing access to the same mental health professional for follow-up.

“Consider establishing telemed mental health providers to rural areas outside of the MHMR umbrella. Consider providing this service through schools and/or PCP clinics.”

“Having better access to a CPAN provider with specific patients. I would like to be able to contact a CPAN provider directly about ongoing management of a patient.”

“Record of conversation to be placed in chart. Follow by same person for continuity.”

“It should include other disciplines that are also difficult to access such as Developmental-Behavioral Pediatrics.”

“Ultimately, if CPAN took over the care of some of our more complex mental health patients, that would be a big help...Would love if CPAN team can help advocate for coverage of therapies such as [Applied Behavior Analysis] (which is not covered by Medicaid currently).”

Respondents felt that CPAN could improve their community outreach and general awareness of the program. Outreach and awareness were discussed both in terms of primary care providers' own clinics and community institutions at large. They indicated that providers within their own clinics were not always aware of CPAN services and having more of a presence in clinics could be beneficial to enrollment in the program. It would also help enrolled providers understand the resources available to them better. Similarly, the program could benefit from increasing outreach and awareness in the larger community in order to enroll more providers and inform other institutions about the role CPAN is playing in mental health care. This latter part is particularly useful when making community referrals.

“Increased awareness. Many in our clinic aren't aware of it.”

“Outreach to existing counseling/BHC staff in place at clinics to discuss roles and areas of support; how they can also use CPAN.”

“Taking this survey, I now realize that CPAN provides many resources other than just consult with psychiatrist. I have taken some of the CME, but it would be helpful to be aware of some of the other resources they provide.”

The desire to have more effective and efficient means of communication was identified as an area of improvement. Particularly, respondents were interested in alternative ways to communicate with the

CPAN hub other than a phone call. Suggestions included the development of an app, web-based communications and intake forms, and creating a more efficient interface.

“App on phone with chat function with provider; one can go back and check chat log as well.”

“By creating clinic system champions to motivate CPAN usage. By creating an internet intake form as an alternative to phone intake.”

“I would love a chat feature via the web for short answer questions.”

Providers would like to see more direct training on the CPAN program upon enrollment. There was a lack of clarity for some on the steps to take once enrolled and how to best utilize the program.

“Some of our mid-level providers would like some training, and sometimes it's hard for me to look through the emails to find the CPAN contact number and get printed copies. Do you have a web page? Where we can get the information?”

“More clarity on how to utilize the program in a step-wise manner.”

Finally, providers would like to see improved connections to community resources and less complicated referrals. Some respondents indicated that resource lists obtained through CPAN have been outdated and community providers on a recommended list are not always able or willing to see their patients.

“Resource referrals are tricky and don't always materialize.”

“PLEASE update the list of providers. In the past, when I called, the list provided was all outdated providers who do not accept patients.”

“Sometimes the referral list we get is not up to date - providers no longer accepting patients or insurance - this is tough, but really important to keep as current as possible.”

Out of all respondents, 14 (19% of total respondents) noted that they had no recommendations for improvement. This was generally due to great experiences with the CPAN program or limited utilization at the time of the survey.

In summary, the recommendations for improvement to CPAN were varied. However, areas most identified include expansion of services, improved outreach and awareness in the community, more efficient communication methods, formal training on how to use CPAN services, and improved connections to community resources and referrals.

External Evaluation CPAN Survey Limitations

Sampling for the external surveys prioritized ensuring that a diversity of segments was given the opportunity to respond, rather than focusing on rigorous, statistically representative estimates. This, combined with the voluntary nature of participation, will limit the conclusions that can be drawn from the

results. Care should be taken when generalizing to groups that are substantially different from the respondents. Additionally, the sample was drawn from the initial list of providers included in Trayt as of July 8, 2021 and thus may not represent providers that used CPAN after this time. Further, the list of all clinics in Texas reflects only those provided on a list (and designated as adolescent medicine, family medicine, pediatrics, internal medicine, general practice) purchased by the Texas Medical Board and obtained by COSH to use in outreach purposes. It is not known, whether all clinics on this list were actually invited to participate in CPAN. Finally, none of the surveyed clinics were from nonmetro (rural) areas; however, there are proportionally a very small number of nonmetro (rural) clinics in Texas and few enrolled in CPAN at the time of the survey. We will ensure that future survey administration include representation of clinics in rural areas.

D4. CONTEXTUAL FACTORS INFLUENCING TCHATT ENGAGEMENT AND IMPLEMENTATION

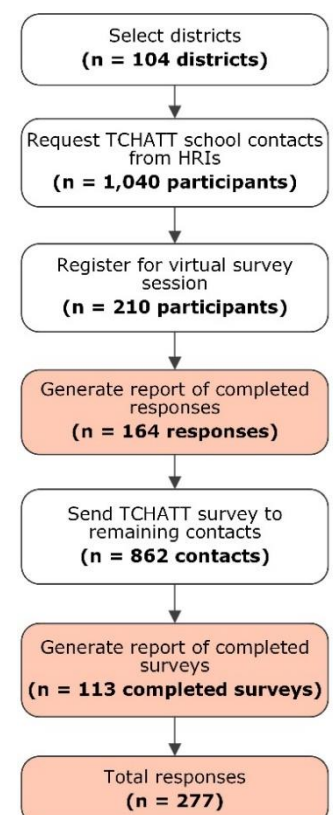
Background

The purpose of this school staff survey is to examine barriers and facilitators of implementation, including organizational factors influencing implementation at the school campus level. Quantitative analyses were completed at the school campus level and the individual school staff level. At the campus level, the quantitative results are organized as follows: descriptive characteristics of campuses in the total Texas population (per the Texas Education Agency), enrolled in Trayt (as of 6/8/21), and in the survey sample as well as characteristics of surveyed campuses implementing TCHATT. At the individual school staff level, the quantitative results are organized as follows: descriptive characteristics of surveyed school staff, perceptions of TCHATT implementation, participation in TCHATT activities, and reported perceived outcomes and future recommendations for TCHATT. Survey respondents were also asked to provide qualitative open-ended responses to questions related to facilitators and barriers of the TCHATT program. A detailed description of the survey methods is provided first, followed quantitative results, qualitative results, and survey limitations (specific to TCHATT).

Methods

We identified a diverse sample of school districts across all 12 HRIs, and within districts selected a diverse sample of schools. We then developed a distribution list of program implementers at participating schools (Figure 31). In July 2021, we invited 1,040 school staff to complete the TCHATT School Staff Year 1 Implementation Survey to examine factors influencing implementation at the school level. Our target number of participants for this survey was 250 participants; 277 ultimately participated across 172 school campuses. See Appendix G for the TCHATT survey protocols and instruments⁵⁻⁷. For the quantitative results, we conducted descriptive analyses comprising cross-tabs and frequencies. For the open-ended qualitative results, we conducted content analyses of all open-ended responses. Coding categories were derived directly from the response data. Open-ended responses were coded under more than one category when necessary. For example, when two or more benefits of a program were identified in the same response. Preliminary categories and subcategories were refined throughout the analysis, with final codes organized into a hierarchical structure separately by survey question¹².

Figure 31. TCHATT School Staff Survey Flowchart: Recruitment & Participation



Quantitative Results: Campus Level

Descriptive Characteristics of School Campuses

This section comprises one table that presents a comparison of three groups: all Texas campuses per the Texas Education Agency (TEA), all Texas campuses enrolled in TCHATT as of 6/8/21, and all surveyed campuses (see Table 43 below). Across the three groups, the table provides a description of school characteristics in regards to indicators of vulnerability, including TEA district type, National School Lunch Program eligibility, and campus census.

There is a lack of comparability across the three groups with respect to TEA district type. Enrolled campuses in Trayt as of 6/8/21 over-represent metro campuses; surveyed campuses, however, mirror the percentage of TEA metro campuses. Surveyed campuses over-represent non-metro campuses when compared to the percentage of non-metro campuses enrolled in Trayt as of 6/8/21. Rural campuses are under-represented among enrolled and surveyed campuses. The three groups, however, were comparable in terms of National School Lunch designation. School census was somewhat comparable between enrolled and surveyed campuses, with slightly more very large (1500+) campuses surveyed. When compared to all Texas campuses, there is an over-representation of campuses with 500-1000 and 1000-1500 student in the enrolled and surveyed groups and an under-representation of campuses with less than 500 students.

Table 43. Comparison of Texas Campuses, Enrolled TCHATT Campuses, and Surveyed Campuses by Geographic and Population-level Vulnerability Indicators

	Texas Campuses	Enrolled Campuses as of 6/8/21 ^d	Surveyed Campuses ^{d,e}
TEA District Type^{a,b}	n = 9471*	n = 1493	n = 170
Metro	3693 (39.0%)	870 (58.3%)	68 (40%)
Non-Metro	3924 (41.4%)	520 (34.8%)	90 (52.9%)
Rural	1007 (10.6%)	84 (5.4%)	10 (5.9%)
Charter School	847 (8.9%)	19 (1.3%)	2 (1.2%)
National School Lunch^{a,c}	n = 9475*	n = 1493	n = 170
<50%	2896 (30.6%)	512 (34.3%)	45 (26.2%)
>50%	6579 (68.5%)	981 (65.7%)	125 (72.7%)
Campus Census^a	n = 9599	n = 1494	n = 172
<500	5166 (53.8 %)	509 (34.1%)	42 (24.4%)
500 - 1000	3421 (35.6%)	730 (48.8%)	82 (47.7%)
1000 -1500	524 (5.5%)	149 (10.0%)	21 (12.2%)
1500 +	488 (5.1%)	106 (7.1%)	27 (15.7%)

(a) Data Source: Texas Education Agency 2021 AskTED directory of campuses.

(b) Data Source: Texas Education Agency District Type data; Metro: major urban, major suburban; Non-Metro: other central city, other central city suburban, independent town, non-metropolitan: fast growing, non-metropolitan: stable.

(c) Data Source: TEA 2018-2019 District Snapshot.

(d) Data Source: TCHATT Campus List as of 6/8/21.

(e) Data Source: External Evaluation TCHATT School Staff Implementation Survey

* There are 9,599 Texas school districts, but sample sizes vary due to missing data.

Characteristics of Campuses Implementing TCHATT

Among all surveyed campuses, the vast majority (almost 95%) reported implementing TCHATT at some level (early stage, inconsistent implementation, or fully and systematic implementation). The next set of tables and figures present the characteristics of campuses that implemented TCHATT.

Characteristics examined include perceptions of campus-level student needs, district decision-making structure, presence of other state-funded mental health services, and presence of other school/district MOU to provide mental health services to students (besides TCHATT) (Table 44). Approximately 60% of TCHATT campuses reported that more than 1 in 4 students in their campus population had need of non-educational support such as meals, clothing, and/or counseling or behavioral therapy. The vast majority of campuses reported that they spend 50% or less of their time addressing non-educational needs such as behavioral problems, hunger, sleep deprivation, and/or adequate need of school supplies or clothing at their campus. Almost three-quarters of campuses reported that their school district had centralized decision-making structure. Many campuses also reported the presence of other state-funded mental health services at their campuses (besides TCHATT). For example, over 70% of campuses reported having community mental health services at their campus and half reported the presence of a Mental Health First Aid Training program. Approximately 40% of campuses reported having another school/district MOU to provide mental health services to students (besides TCHATT).

Table 44. Characteristics of School Campuses Reporting TCHATT Implementation: Demographics, Student Needs, Decision-Making Structure, Other Mental Health Services as Reported by School Staff

	Implementing TCHATT ^a
% student population has need of non-educational supports (e.g., meals, clothing, and/or counseling or behavioral therapy)^b	n = 163
Less than 5%	2 (1.2%)
6 - 15%	25 (15.3%)
16 - 25%	32 (19.6%)
26 - 50%	49 (30.1%)
Greater than 50%	51 (31.3%)
Don't know	4 (2.5%)
% time school staff spends addressing non-educational needs (e.g., behavioral problems, hunger, sleep deprivation and/or need of adequate school supplies or clothing)^b	n = 161
Less than 5%	27 (16.8%)
6 - 15%	61 (37.9%)
16 - 25%	41 (25.5%)
26 - 50%	30 (18.6%)
Greater than 50%	2 (1.2%)
District Decision-Making Structure^b	n = 162
Centralized	117 (72.2%)
Decentralized	36 (22.2%)
Don't know	9 (5.6%)
Presence of Other State-Funded Mental Health Services^{b,c}	n = 163
Community mental health services	118 (72.4%)
Communities in Schools of Texas	61 (37.4%)
Community mental health grants	20 (12.3%)
Safe School allotments	23 (14.1%)
Mental Health First Aid Training program	84 (51.5%)
Non-physician mental health professional in education service center	19 (11.7%)
Don't know	11 (6.7%)
None of the above	7 (4.3%)
Presence of School/District MOU to Provide Mental Health Services to Students (Besides TCHATT)^b	n = 162
Yes	67 (41.4%)
No	40 (24.7%)
Don't Know	55 (34.0%)

(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey. Measures are collected from individuals; however, results are aggregated by school campus and reflect that at least one person from the school campus indicated that their school was implementing TCHATT (at early stage, inconsistent implementation, or fully and systematic implementation).

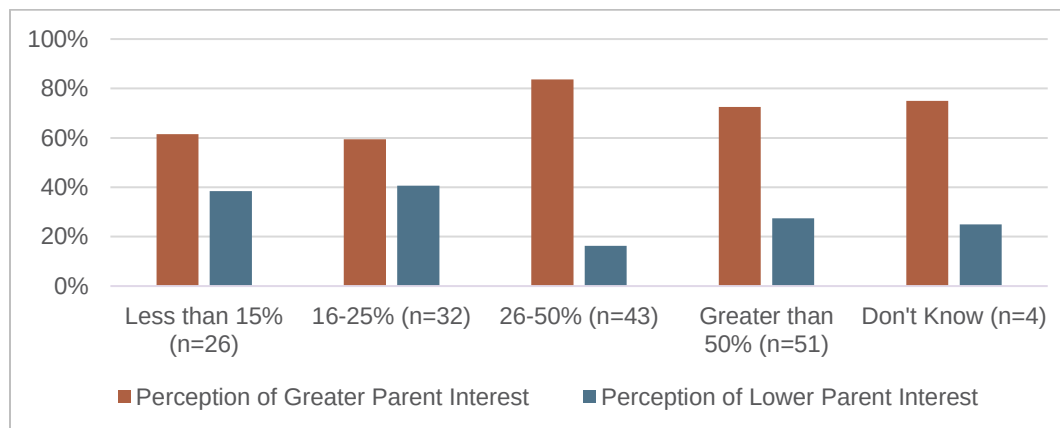
(b) Characteristics reported by the person from the school campus who has been in their primary role at the school for the longest time. Three campuses had a tie for having the most experienced person in their primary role, and these in cases, one person's response was randomly selected.

(c) More than one state-funded mental health service could be chosen; therefore, responses are not mutually exclusive.

We also examined school campus perceptions of parental interest in TCHATT (if their child was referred for TCHATT services). As reported by the person at the school campus who coordinates TCHATT at the school, greater parent interest refers to the perception that greater than 50% of parents interested in TCHATT; lower parent interest refers to the perception that less than 50% of parents interested in TCHATT. Among campuses that reported implementing TCHATT, approximately one-third of campuses reported lower parental interest in TCHATT.

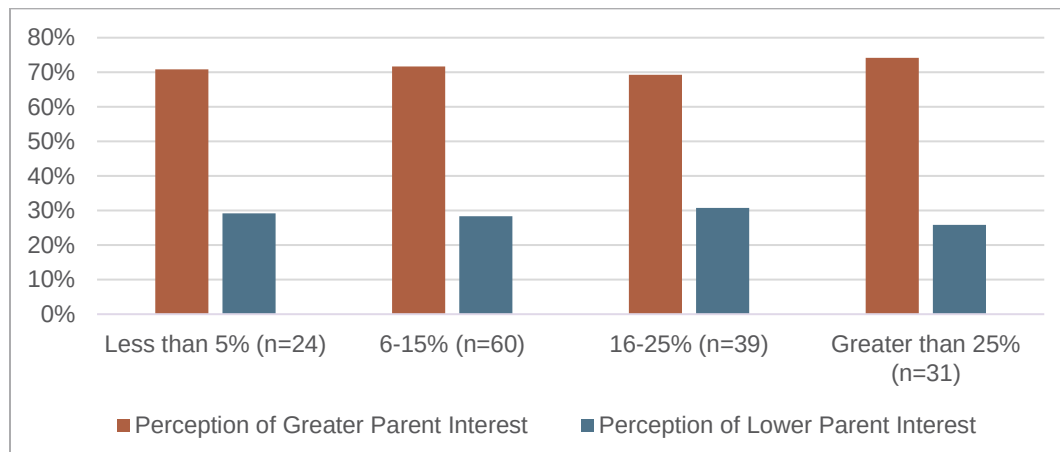
The next set of figures describes the characteristics of campuses with greater versus lower parental interest in TCHATT. Characteristics examined include school staff perception of the percentage of the student population with non-educational needs (e.g., meals, clothing, and/or counseling or behavioral therapy), school staff time addressing non-educational needs (e.g., behavioral problems, hunger, sleep deprivation, and/or need of adequate school supplies or clothing), school district type (per TEA), school lunch designation (per TEA), census (per TEA), and perception of decision-making structure. School staff who perceived that more than one quarter of their student population had non-educational needs were generally more likely to report perceiving greater parental interest in TCHATT compared to school staff who perceived that less than one quarter had non-educational needs (Figure 32). The time school staff, however, spend addressing non-educational needs was not differential by parent interest (Figure 33). Rural campuses reported lower parental interest in TCHATT compared to metro and non-metro campuses. Parental interest in TCHATT did not generally vary by free/reduced lunch school status (Figure 34). With respect to school size, greater parental interest is more likely among campuses with 500 students or more (Figure 35).

Figure 32. TCHATT Parent Interest and Student Population Need of Non-Educational Supports (as Perceived by School Staff)^a



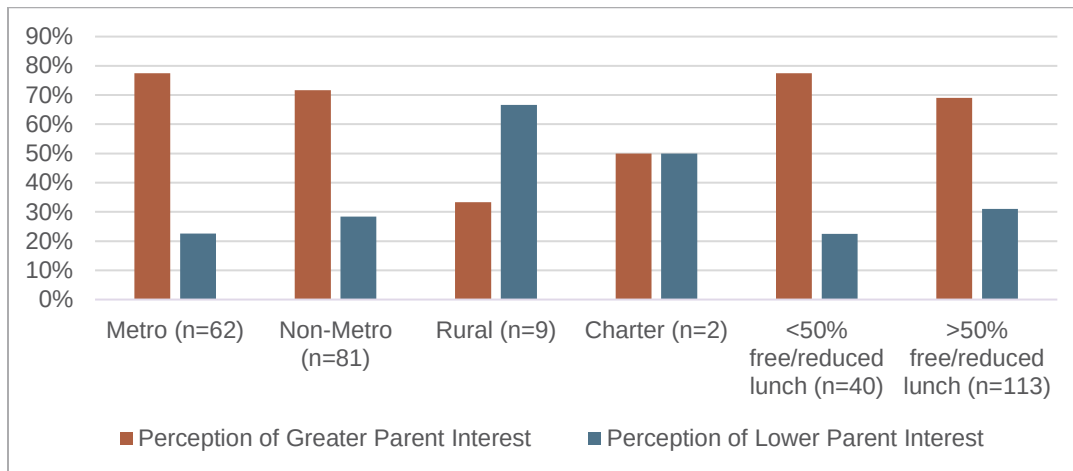
(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey.

Figure 33. TCHATT Parent Interest and Time School Staff Spend Addressing Non-Educational Needs (as Perceived by School Staff)^a



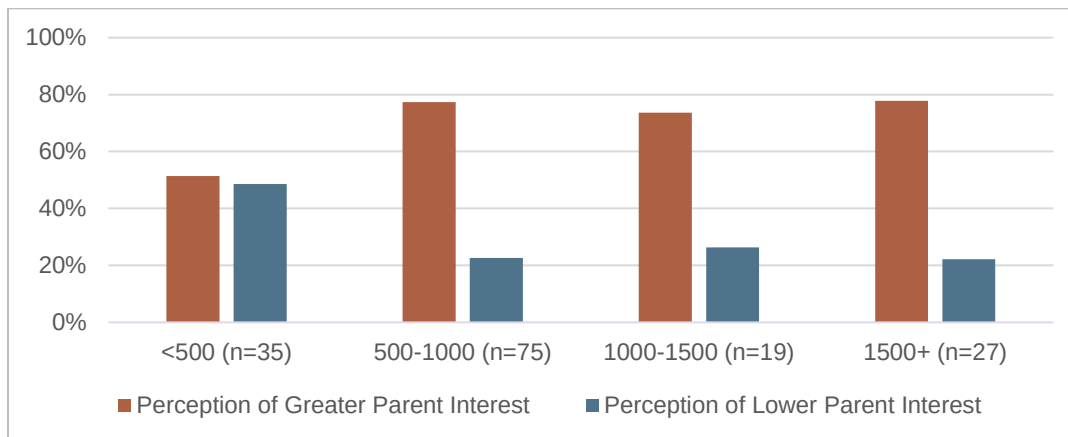
(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey.

Figure 34. School District Type, National School Lunch Designation, and Perceived TCHATT Parent Interest^a



(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey.

Figure 35. School Campus Census, Perception of Decision-Making Structure, and Perceived TCHATT Parent Interest^a



(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey.

We also examined factors associated with readiness to implement TCHATT among all surveyed campuses and campuses with some level of TCHATT awareness and implementation. are three major components (or factors) of program readiness derived from the R=MC2 framework in the TCHATT school staff implementation survey⁵⁻⁸: (1) motivation, (2) innovation-specific capacity, and (3) general capacity. Motivation is the degree to which the organization wants the innovation to happen and was asked and was assessed among campuses indicating awareness and implementation of TCHATT (n=169). Innovation-specific capacity is what is needed to implement the innovation and was assessed among campuses indicating awareness, implementation, and involvement with TCHATT (n=156). General capacity is the overall functioning of the organization and was assessed among all surveyed campuses (n=172). Table 45 provides the definitions of the different sub-components of each factor. According to the R=MC2 framework, organizations with high levels of motivation, innovation-specific capacity, and general capacity will be more likely to adopt and implement an effective program, practice, or policy.

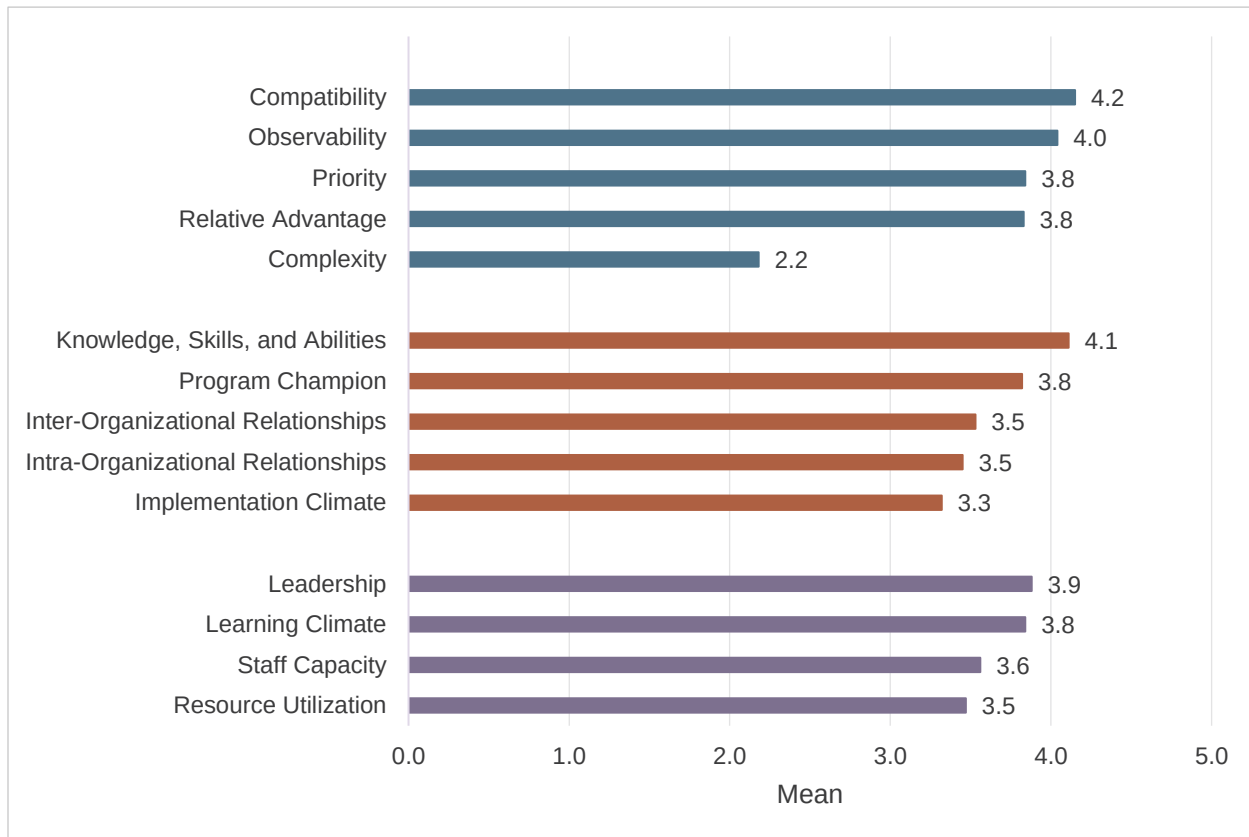
Subcomponents were measured on a five-point Likert scale (1 = strongly disagree – 5 = strongly agree) with lower scores indicating lower levels of readiness and higher scores indicating higher readiness, with the exception of complexity. The campus score was calculated in a two-step process. Individual scores were formed by averaging the responses for each scale for each individual that responded to at least 2/3 of the items for the scale. For each clinic where at least 2/3 of the eligible responders had a scale score, the campus score was formed by averaging the individuals' scores.

Table 45. Definitions of Organizational Factors Associated with Implementation^{13,14}

Factor	Definition
Motivation	Degree to which the organization wants TCHATT to happen.
Relative Advantage	If TCHATT seems more useful than what the organization is currently doing.
Compatibility	Whether TCHATT fits with how the organization does things.
Complexity	How complex TCHATT seems.
Priority	How important TCHATT is compared to other priorities.
Observability	How easy it is to see that TCHATT is producing outcomes.
Innovation-Specific Capacity	What we need to implement TCHATT.
Innovation-Specific Knowledge and Skills	Degree to which there is enough knowledge and skills within the organization to use TCHATT.
Program Champion	If there is an important person(s) that supports TCHATT.
Inter-Organizational Relationships	The connections beyond the organization (people, organizations, and other communities) to help with TCHATT.
Intra-Organizational Relationships	The relationships within the organization that support the use of TCHATT.
Implementation Climate	Necessary supports, processes, and resources to enable the use of TCHATT.
General Capacity	The overall functioning of the organization.
Leadership	The effectiveness of organizational leaders at multiple levels.
Learning Climate	The feeling of being a part of the organization.
Staff Capacity	How experienced and skillful people who work with the organization in general.
Resource Utilization	Ability to acquire and allocate resources including time, money, effort, and technology.

Overall, surveyed school campuses aware of TCHATT reported favorable scores among general capacity constructs. The constructs with the highest scores are campus learning climate and campus leadership. Among surveyed campuses that were aware of and implementing TCHATT, favorable scores among motivation and innovation-specific capacity were also observed. The constructs with the highest scores are compatibility, observability, and campus knowledge, skills, and abilities.

Figure 36. Organizational Factors Associated with TCHAT Implementation^a



(a) Data Source: External Evaluation TCHAT School Staff Implementation Survey.

Quantitative Results: School Staff-Level

Descriptive Characteristics of Surveyed School Staff

Table 46 presents the demographic characteristics of TCHAT survey respondents. Almost 90% of respondents were female. Almost 50% of respondents were non-Hispanic white, 18% were Black, and almost one-third were Hispanic. The majority reported having a master's degree or higher. Approximately 70% were counselors. Almost 60% of survey respondents reported that they were the person who implemented TCHAT at their school campus or district.

Table 46. Characteristics of Individual Survey Participants

	Total School Staff ^a
Gender	n = 275
Male	29 (10.5%)
Female	245 (89.1%)
Neither Male nor Female	1 (0.4%)
Race/Ethnicity	n = 276
White, not of Hispanic origin	127 (46.0%)
Black, not of Hispanic origin	50 (18.1%)
Hispanic	83 (30.1%)
Other	16 (5.8%)
Primary Role	n = 267
Principal/Assistant Principal/School Administrator	43 (16.1%)
Counselor	185 (69.3%)
Social worker	20 (7.5%)
School psychologist	4 (1.5%)
Nurse	1 (0.4%)
Teacher	3 (1.1%)
Other	11 (4.1%)
Highest Education	n = 274
Associate's degree	3 (1.1%)
Bachelor of Arts/Bachelor of Science	9 (3.3%)
Master of Arts/Master of Science	133 (48.5%)
Master's degree plus 15 or more additional course hours	106 (38.7%)
EdD/PhD	20 (7.3%)
Other professional degree	2 (0.7%)
Are you the person who coordinates TCHATT at your school or school district?	n = 274
Yes	153 (55.8%)
No	113 (41.2%)
Don't know	8 (2.9%)

(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey. Includes school staff who reported their school was implementing TCHATT (at early stage, inconsistent implementation, or fully and systematic implementation).

TCHATT Implementation among Surveyed School Staff

Over 90% of surveyed school staff reported that their school implemented TCHATT (at an early stage, inconsistent implementation, or fully and systematic implementation). Among these TCHATT implementers, more than half reported being very involved with TCHATT implementation at their campus or district. Over one-third reported being somewhat involved. The majority of survey respondents reported implementing TCHATT less than 12 months. Most participants also reported attending TCHATT trainings or receiving TCHATT materials and/or resources.

Table 47. Individual Survey Participant Involvement in TCHATT and TCHATT Trainings

	School Staff ^a
How involved are you with the implementation of TCHATT at your district or school?	n = 253
Not at all involved	15 (5.4%)
Somewhat involved	99 (35.7%)
Very involved	139 (50.2%)
Months Implemented TCHATT	n = 244
Less than 6 months	65 (24.3%)
6 - 12 months	166 (61.9%)
More than 12 months	13 (4.9%)
Attended TCHATT trainings or received TCHATT materials and/or resources	n = 247
Yes	219 (79.1%)
No	23 (8.3%)
Don't know	5 (1.8%)

(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey. Involvement and months implemented assessed among school staff who reported that their campus was implementing TCHATT. Training attendance or receipt of resources assessed among school staff who reported being aware and implementing TCHATT or planning to implement in the future and at least somewhat involved in implementing. Sample sizes vary due to missing data.

Participation in TCHATT Activities

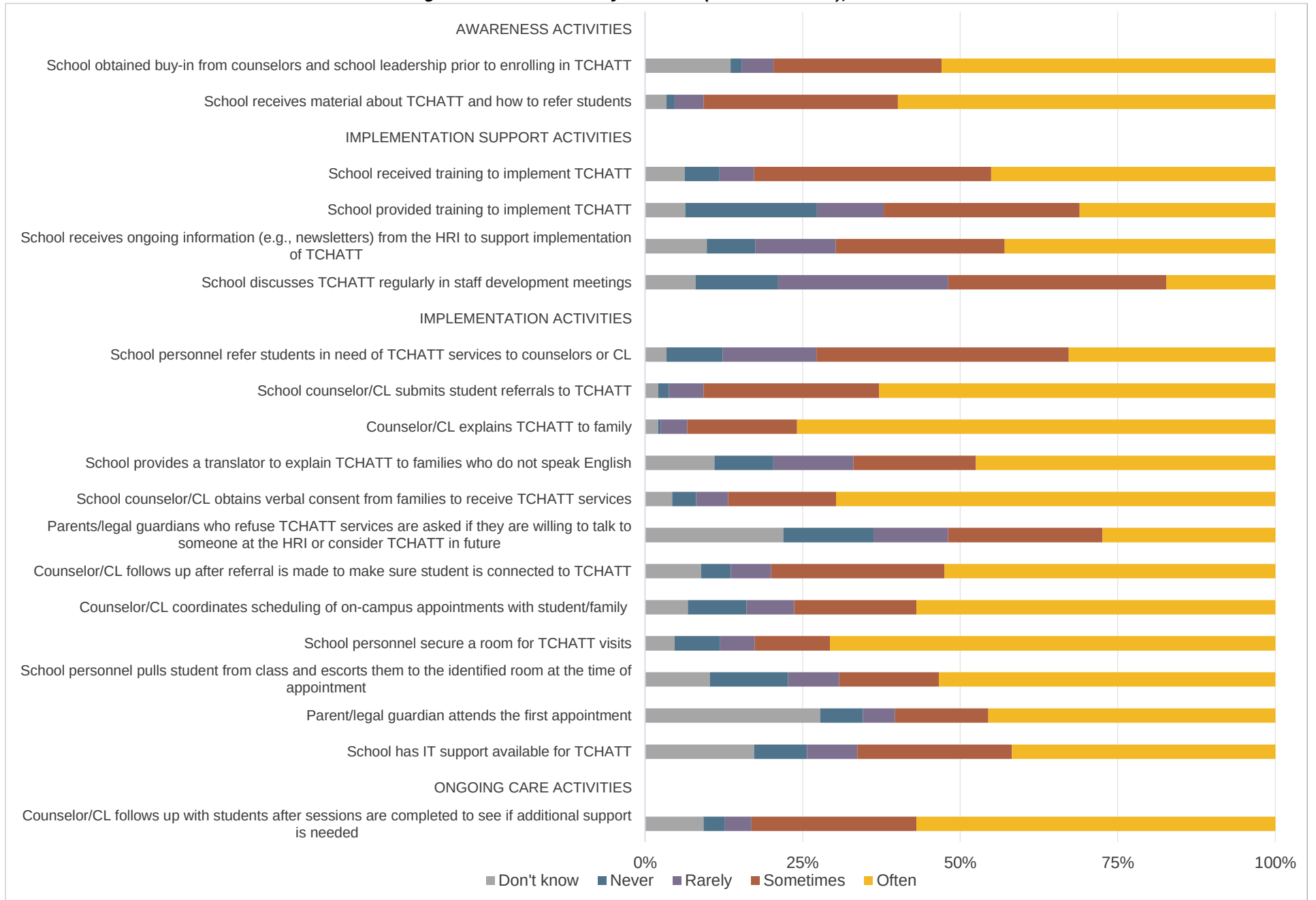
Among school staff who reported being somewhat or very involved in TCHATT implementation at their district or school, we also queried respondents' participation in various activities that comprise the TCHATT program in schools. These questions were designed to assess implementation fidelity to the TCHATT program steps described in the process maps. Activities were divided into Awareness, Implementation, and Ongoing Care activities; survey items were developed based on the TCHATT process maps developed with TCHATT stakeholders.

Approximately 80% or more of survey respondents reported that their school sometimes or often participated in activities designed to increase awareness and support implementation of TCHATT (e.g., obtaining buy-in prior to enrolling in TCHATT, receiving TCHATT materials and information on how to refer students, school received TCHATT training). More than one-third of participants reported never, rarely or not knowing whether their school provided training to implement TCHATT or whether their school receives ongoing information from the HRI to support implementation of TCHATT. Less than 50% of participants reported sometimes or often discussing TCHATT regularly in staff development meetings.

With respect to TCHATT implementation activities, approximately 75-80% or more of survey respondents reported that students in need are referred to TCHATT, the school counselor or campus liaison (CL) submits student referral to TCHATT, explains TCHATT to families and obtains verbal consent, follows up with the HRI or family after the referral, and coordinates scheduling of on-campus appointments with the student/family and TCHATT.

Approximately 25% or more of participants reported never, rarely, or not knowing whether the school provides a translator to explain TCHATT to families who do not speak English. Almost 50% of survey respondents reported never, rarely, or not knowing whether parents/guardians who refuse TCHATT services were asked if they were willing to talk to someone at the HRI or consider TCHATT in the future. Approximately one-third of survey participants reported not knowing whether the parent/guardian attends the first TCHATT appointment. Finally, more than 80% of participants sometimes or often reported that the counselor or CL follows up with students after sessions are completed to see if additional support is needed.

Figure 37. TCHAT Activity Checklist (Individual-Level), n=238



Perceived Reported Outcomes and Future Recommendations for TCHATT

Between approximately 36-52% of respondents indicated that because of TCHATT, students were more involved in school, had decreased behavioral incidents, and better attendance and grades at school (Table 48). Almost 70% reported that TCHATT increased school staff capacity to meet the non-educational needs of students. Approximately 20% of participants reported that they did not know whether TCHATT had impacted any outcomes.

Table 48. Individual Survey Participants' Perceived Outcomes of TCHATT

	Respondents Involved in TCHATT (n = 238)^{a,b}
These students are more involved in school.	
Strongly Agree	12 (5.1%)
Agree	85 (36.3%)
Neither Agree nor Disagree	76 (32.5%)
Disagree	16 (6.8%)
Strongly Disagree	0 (0.0%)
Don't know	45 (19.2%)
These students had a decrease in behavioral incidents.	
Strongly Agree	10 (4.2%)
Agree	114 (48.3%)
Neither Agree nor Disagree	61 (25.8%)
Disagree	8 (3.4%)
Strongly Disagree	0 (0.0%)
Don't know	43 (18.2%)
These students had better attendance at school.	
Strongly Agree	10 (4.2%)
Agree	85 (36.0%)
Neither Agree nor Disagree	90 (38.1%)
Disagree	5 (2.1%)
Strongly Disagree	0 (0.0%)
Don't know	46 (19.5%)
These students had better grades at school.	
Strongly Agree	7 (3.0%)
Agree	79 (33.5%)
Neither Agree nor Disagree	88 (37.3%)
Disagree	10 (4.2%)
Strongly Disagree	0 (0.0%)
Don't know	52 (22.0%)
TCHATT increased school staff capacity to meet the non-educational needs of students.	
Strongly Agree	61 (25.8%)
Agree	104 (44.1%)
Neither Agree nor Disagree	63 (26.7%)
Disagree	8 (3.4%)
Strongly Disagree	0 (0.0%)

(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey. Involvement refers to somewhat or very involved.

(b) Missing values range from n = 2 to n = 4.

Approximately 90% of respondents reported that they agree or strongly agree with recommending TCHATT to other schools (Table 49). A similar percentage reported an intention to continue using TCHATT in the next 6 months.

Table 49. Participants' Recommendations and Future Use of TCHAT

	Respondents Involved in TCHATT (n = 238) ^{a,b}
I would recommend the TCHATT program to other schools.	
Strongly Agree	104 (44.4%)
Agree	108 (46.2%)
Neither Agree nor Disagree	20 (8.5%)
Disagree	1 (0.4%)
Strongly Disagree	1 (0.4%)
My school intends to continue using the TCHATT program in the next 6 months.	
Strongly Agree	102 (43.4%)
Agree	117 (49.8%)
Neither Agree nor Disagree	15 (6.4%)
Disagree	0 (0.0%)
Strongly Disagree	1 (0.4%)

(a) Data Source: External Evaluation TCHATT School Staff Implementation Survey. Involvement refers to somewhat or very involved.

(b) Missing values range from $n = 3$ to $n = 4$.

Qualitative Results: Analysis of Open-Ended School Staff Responses

The findings in this section discuss TCHATT survey respondents' perceptions of the benefits of the program, areas for improvement, and additional comments about the activities conducted as part of the program. Figure 38 visualizes the content discussed across the three open-ended questions in the survey.

Figure 38. Visual Content Analysis of TCHATT Qualitative Survey Data



Overall, 197 TCHAT stakeholders provided open-ended responses asking about the greatest benefits of having the TCHAT program available in their schools. Out of the 197 respondents, 153 (78% of total respondents) indicated that **accessibility of care for underserved students in need was the greatest benefit** of the TCHAT program. Respondents indicated that TCHAT provides immediate and flexible

mental health services to vulnerable children who may not have received the same level of care without the program. The program is a convenient external resource that can support school staff and parents in getting children the mental health care that they need when alternative resources are extremely limited. Respondents indicated that their students tend to come from underserved and underinsured communities, making the cost-free services of TCHATT valuable. Since the visits are virtual and conducted while children are in school, it also removes the barrier of transportation for parents.

“The biggest benefit of TCHATT is accessibility. They really try to work around your schedule and are always there when you call. Another important benefit is it is free. Many of the students on my campus do not have insurance and come from low income homes. They are more likely to get on board with mental health services because of this. Also, transportation is an issue for our families so TCHATT removes that hurdle for us as well.”

“The convenience of location, cost, future costs if prescriptions are needed, confidentiality in a secure room off the high school campus but still in a district building, timeframe of 6 sessions.”

“TCHATT has been a blessing to our less fortunate families who are in need of mental health services. Being able to provide this service to our students has contributed tremendously with regards to better attendance, grades and discipline.”

“One of the major benefits of this program is that students can receive their services while in school. This way, students will be more likely to attend their sessions because counselors make sure they are ready for their appointments.”

“The opportunity for students to get services without having to travel into the city, the services can be provided virtually, in the comfort of a designated area, without having to travel, and pay for fuel costs, and risk not keeping an appointment in person due to time constraints, automotive issues, not having transportation, fuel costs, etc.”

Another benefit that respondents (n=29) mentioned was that TCHATT **provides a level of mental health care that cannot be provided by school counselors alone**. Respondents discussed how school counselors may not have the level of expertise some students require and often have time constraints caring for large student populations. TCHATT provides school counselors with additional support to serve their students' mental health needs more effectively and provides students and families with a trusted outside provider that will help address mental health needs directly and through referrals. TCHATT provides feedback to both parents and school counselors as permitted, creating a collaborative environment to help children get their needs met.

“This provides a resource outside of the school setting for students to obtain access to trained mental health professionals. School counselors are assigned many other tasks outside of 'counseling'.”

“We are able to support those students who need the additional mental health support that we cannot efficiently provide in a school setting.”

“We have a behavioral health program but cannot prescribe meds as needed. Our program also limits us to mostly meeting with students, and there are some really deep needs to involve families, which TCHATT does.”

“Support for those students that need it consistently. With one counselor for almost 700 kids, it is very difficult to meet the needs of all kids on our own.”

Overall, the majority of respondents indicated that accessibility of mental health care services for underserved students in need was the biggest benefit to having the TCHATT program available in their schools. Additionally, another highly mentioned benefit was that TCHATT provides mental health services that are beyond the expertise and time availability of school counselors. Eight respondents indicated that the program has not yet been fully implemented in their schools; therefore, they could not speak to benefits. Three respondents did not identify specific benefits of the program.

Improvements to the TCHATT Program

Overall, 173 stakeholders provided open-ended responses asking about improvements to the TCHATT program. TCHATT stakeholders varied in their responses to areas for program improvement. The most frequently mentioned areas for improvement include the desire for **better communication and follow-up** (n=38), **a more efficient system for paperwork** (n=26), **additional student sessions** (n=17), **more training on campus** (n=15), **marketing tools and informational material for parents** (n=11), and **implementation expansion** (n=7). Together, these identified areas made up 66% of total responses.

Respondents believe that the TCHATT program could be improved by providing better communication and follow-up regarding students. Specifically, respondents indicated that they would like to receive more communication after student sessions and be informed about the plan for follow-up care after all sessions are completed. Some respondents felt that they were more of a referral source than partner in care. They expressed a desire to help students and families follow-up with appropriate referrals after their TCHATT sessions, or check in to make sure the treatment plan was being followed, but a lack of communication did not always allow them to do so. Parents, too, did not always receive follow-up communication from TCHATT after their child's sessions were over. Respondents indicated that there was not always a way for school counselors to track who was being serviced, and communication from TCHATT regarding student visits would be beneficial in this regard. Further, some stakeholders noted that better communication about logistics and changes to protocols would be helpful.

“1. Better communication after a session/intake. I do not consistently receive a report after the intake with the decisions that are being made. 2. Better communication about continued care after the sessions. What the family is deciding to do. 3. Allowing a time for adults to talk before brining students into the session.”

“Better communication - often just felt like I was a referral source and not a partner.”

“I feel like there could be better communication with the school as to whether or not more info is needed. Or if there is an issue with the student starting. Even if it was a parent refusal. I wish we heard back every time. Ex. Parent refusal of services or student beginning program etc.”

"I would like to be communicated with about my students after every session to be aware of how I can support my students in the school setting. It would help me to be more in tune and connected with my students' needs. This was initially part of the TCHAT program, but then went away."

"I would like to have more feedback when there is a delay in service due to family not being available or consent forms not completed. I'm very hands on so to learn of a delay due to technicalities or parent response hold up progress for the youth. So definitely more feedback. I would also like to know when a final session has been made with a youth and if there is a discharge plan ex: referee out for additional services or if student is ok and services ended."

"Continued communication via email or newsletter to keep school counselors and social workers informed of processes and updates."

Respondents indicated that they would like to see a more efficient and streamlined paperwork system that works better for them and the families they refer. Paperwork was described as lengthy; often confusing and overwhelming to parents. Parents do not always have access to internet, email, or printers, which hinders the consent process further. Accessibility of forms has been an issue for families. Paperwork is generally a barrier to care for students. The referral process for school staff is burdensome and outdated, and respondents indicated that TCHAT should consider modernizing their current system.

"Easier consent intake for parents (Spanish speaking especially) as this is usually the biggest roadblock. A few parents did not have emails which made the consent intake harder and at times hindered the next steps if they did not know how to use the technology. The students all know how to use technology at school, it was always the parent component that affected the process."

"I think if there is a way to condense the paperwork. I send home the paperwork and it looks like A LOT because there are so many pages, but it's not really that much information. The families that are needing services are generally having issues in the whole family unit (parents are overwhelmed in the situation) and the paperwork can be overwhelming. Could some of it be filled out in the first appointment?"

"The registration packet is pretty lengthy, and our low-income families don't have a way to print the PDF packet out. I think we could add access to the TCHAT service if the registration packet was available in an online format."

"Provide the consent forms to the School Counselors so we can help get parent signatures on forms. There were multiple students at my campus that strongly needed the service that did not get it for that reason, when I could've personally obtained consent from the parent upon student arrival or dismissal."

"Submitting the paperwork can be a bit challenging. The fax number is busy and I haven't had the time to look into how to submit the paperwork electronically."

"The referral process could be more streamlined so we can do it all online vs. paper."

While respondents were grateful for the TCHAT sessions their students received, several expressed a desire for more sessions. Respondents suggested increasing the number of sessions to six to ensure

students were stable and additional follow-up care was in place. Sometimes there can be a long wait period for children to receive follow-up care after their TCHAT sessions are over, resulting in a gap of care.

“I think if they can extend the four session to 6 or more, it will be great. Sometimes they make referral for long term therapy, but unfortunately, it takes months for the parents to make appointment with the therapist.”

“I would love to see opportunity for more sessions per client. My training recommends brief therapy as 6 sessions.”

“It would be great if more sessions could be offered to students. Four sessions are good but not enough to make sure that a student is stable and has acquired the resources/ skills needed to cope with their stressors.”

Respondents expressed a desire to receive more training, especially as it relates to implementation of the TCHAT program. In-person trainings on campus were preferred by many respondents. Inclusion of all school stakeholders who would be implementing the program should be part of the trainings, rather than using a train-the-trainer model according to some respondents. A few respondents were interested in other types of training opportunities such as techniques and supports that could be shared with school counselors and informational sessions for parents.

“More training for staff members with specific examples of situations to use the program. Parents ask questions and more information/ experience is needed to describe this resource to make them feel more confident in proceeding with a referral.”

“Make sure that the person who is training give a clear flow chart of how the process works. All people who are using it need to be in the training instead of a train the trainer.”

“More school-wide training and possibly parent training as well in order to increase the number of students that we are able to reach.”

“Continuous training for implementation and identifying candidates.”

“Perhaps having the therapists share more techniques and supports that they use with the school counselors, e.g. sand trays.”

Respondents indicated that it would be useful for TCHAT to provide marketing tools and informational materials for parents. They believe that they can better explain the program's benefits and get buy-in from parents if they had better tools to do so. Suggestions include brochures, flyers, FAQs, testimonials, and videos.

“I wish we had more informational papers to hand out (brochures, explanations) to our parents. I think we would have more participation if the information was widely available.”

“Informational flyers and FAQ to be able to post on school website, in the office, give to families, etc.”

“More marketing materials for parents. More expansive breakdown of why it's beneficial. Counterpoints to deal with stigma. Or breakdown of process once referral is complete. Perhaps short videos we could share too.”

Respondents would like to see TCHATT expanded to serve a wider population of students. They indicated that it would be great to implement the program across other campuses and grade levels within their districts.

“Expand to other campuses in our district.”

“Make more accessible for a younger audience.”

“Provide to all grade levels.”

Other suggestions for improvement were identified by respondents, but were less widespread. They include things like improving timeliness of therapists arriving to telehealth sessions, considering in-person visits, and considering ways to make logistics less burdensome on school staff.

Out of all respondents, 31 (18% of total respondents) noted that they had no recommendations for improvement. This was generally due to great experiences with the TCHATT program or limited utilization at the time of the survey.

In summary, the recommendations for improvement to TCHATT were varied. However, areas most identified include the need for better communication and follow-up, a more efficient system for paperwork, additional student sessions, more training on campus, marketing tools and informational material for parents, and expanding implementation to more campuses.

Additional Comments Related to the TCHATT Program

Overall, 94 stakeholders provided open-ended responses asking for additional comments related to the activities conducted as part of TCHATT. Out of the 94 respondents, 25 (27% of total respondents) provided **positive remarks regarding the program in terms of support offered to students and school staff.**

“TCHATT has been very supportive. The processes in place made it very easy to complete referrals and schedule intake assessments. Any questions were handled promptly. As the campus liaison, I found all interactions with TCHATT were handled professionally and in a timely manner.”

“TCHATT is amazing and just what we need. Our students have had so much stress from two floods, losing their schools, COVID, etc. TCHATT is helping augment our already strong behavioral health program.”

“This resource has been greatly beneficial in the support of our students' mental health over the past two school years. It allows us to meet their needs while still attending to other students issues.”

“This experience has been wonderful. I am better able to address the growing needs of all of my students as well as learning more in the process.”

While some of the comments provided were repetitions of previous open-ended responses related to benefits and areas for improvement, there were some noteworthy comments regarding a lack of implementation this past year. Respondents indicated that they **did not utilize TCHAT services at all or on a very limited basis this past year** (n=16) for a variety of reasons. Some indicated that the program is new to them and they are still waiting to implement in their schools. Others mentioned that buy-in from school staff and parents has been low due to the amount of paperwork involved and feeling overwhelmed with addressing other needs and priorities (e.g., COVID-related policies and procedures). Some respondents indicated that they only worked with virtual students this past year which impacted implementation on campus, and a few noted that they utilize other external mental health services for their students other than TCHAT.

“Our district is in the beginning stages so we have referred very few students. School attendance in general has been a problem this year at our campus due to Covid-19 precautions so our low referral number to TCHAT is due to low enrollment numbers. Likewise, our campus has referred less than 3 students to TCHAT, as we also have our own mental health clinic in the district with therapists and psychiatrists also providing telehealth services. Out of the three students that were referred to TCHAT, parents have not opted in to actually participate.”

“I referred students, and nothing ever happened. None of our students received TCHAT services. There was not much buy-in this year with our teachers, they were overwhelmed by everything else. They didn't give any time or thought to referring students. I will try again next year.”

“No students received TCHAT services this school year. I mentioned it to parents and school counselors but when presented with the initial paperwork to complete, interest was lost.”

“TCHAT services have not been physically provided at my campus. We have always provided other local counseling agencies (district approved) a place to counsel our students and they are generally pulled out of an elective class rather than a core class (counselor given student schedule). Also, counselor, parent and child are present at initial session.”

“Due to pandemic and virtual learning we did have much in person activity at the school itself.”

“This is our first year with the program and my first year as a counselor.”

In summary, when asked for additional comments about the TCHAT program, respondents provided positive feedback about their experiences generally and also discussed reasons why implementation was lacking this past year. There were a few comments specific to Spanish-speaking parents and the intake process. While some respondents indicated that information was not translated into Spanish for parents by TCHAT, others indicated that translated documents were too high-level for parents to understand. This hindered the referral process. Other comments reiterated the benefits and areas of improvement already described previously such as cumbersome paperwork, a desire for more communication from TCHAT providers, and a request for more student sessions, among others.

External Evaluation TCHATT Survey Limitations

Sampling for the external surveys prioritized ensuring that a diversity of segments was given the opportunity to respond, rather than focusing on rigorous, statistically representative estimates. This, combined with the voluntary nature of participation, will limit the conclusions that can be drawn from the results. Care should be taken when generalizing to groups that are substantially different from the respondents. Further, the sample was drawn from the initial list of providers included in Trayt as of June 8, 2021 and thus may not represent school staff that used TCHATT after this time.

E. RESIDENTS' PERCEPTIONS OF CPWE

Background

The overarching goal of CPWE is to develop child and adolescent psychiatry training opportunities for Texas residents at participating local mental health authorities (LMHA) with the objective of expanding the capacity of community mental health providers and inspiring residents to serve medically underserved communities through the public mental health system after residency. As part of a first year external evaluation of the TCMHCC's initiatives, we conducted in-depth interviews with selected residents of the CPWE program to learn about their experiences with the program and understand the extent to which training has increased the capacity of future mental health providers. In this section, we briefly discuss the methods used as part of this evaluation effort, highlight key findings from in-depth interviews conducted with CPWE residents across HRIs, and offer recommendations for future implementation.

Methods

Residents were invited to take part in the interviews by directors of the HRIs working in partnership with the LMHAs. In total, 10 residents representing 10 different HRIs were interviewed as part of this evaluation. Two of the participating HRIs did not have current residents in the CPWE program; therefore, they could not be represented in the data collection and analysis. All 10 interviews were conducted via Zoom between June 14 and June 24, 2021 (see Figure 5).

A thematic analysis was conducted to identify patterns and themes within the qualitative interview data collected. This iterative process included transcribing interview audio, reading through the transcripts for deeper understanding, and analyzing and interpreting the data using both deductive and inductive coding processes.

Results

Figure 39 provides a visual representation of the content discussed across all 10 CPWE interviews, with the size of words depicting the frequency in which they were mentioned (highest frequency words larger; lower frequency words smaller). Table 50 provides an overview of the themes and subthemes as they pertain to the evaluation questions, discussed in more detail in the section that follows.

Figure 39. Visual Representation of CPWE Interview Content



Table 50. Evaluation Questions Linked to Thematic Analysis

What are CPWE residents' attitudes toward the public mental health system? - Residents expressed positive attitudes toward the public mental health system, including their local mental health authorities. - Residents believe that open access to care and comprehensive services offered at their LMHAs are beneficial to the community. - Training and working within a LMHA provided a collaborative inter-professional environment that was beneficial to residents' learning and growth. - Residents highlighted limitations of working in the public mental health system such as a lack of time and resources, disjointed services, and inefficient electronic systems.
What are CPWE residents' attitudes toward patients of the public mental health system? - Residents appreciated the opportunity to work with diverse patient populations at their LMHAs. - Residents described patients of the public mental health system as disadvantaged and underserved, with unique challenges that differ from patients of private institutions. - Working with disadvantaged and underserved patients has enhanced residents' empathy, advocacy, and flexibility in care.
What are CPWE residents' attitudes on whether they would work in the public mental health system after residency? The majority of residents were still undecided about where they will work post-residency despite their positive training experiences, but are considering public mental health as an option.
What is the impact of the CPWE training program in public mental health on preparing residents for cross-cultural interactions? Experiential learning at the LMHAs helped prepare residents for cross-cultural interactions and culturally responsive mental health care.
How has the training program changed resident attitudes towards patients and of practicing in a public mental health system? The CPWE program did not necessarily change resident attitudes toward patients and the public mental health system, but was seen as an integral part of their overall training.

Overarching Themes

RESIDENTS EXPRESSED POSITIVE ATTITUDES TOWARD THE PUBLIC MENTAL HEALTH SYSTEM, INCLUDING THE LOCAL MENTAL HEALTH AUTHORITIES WHERE THEY WORKED.

Understanding CPWE residents' attitudes toward the public mental health system is a good indicator of whether they will pursue a future career working in that setting. A major goal of the CPWE program is to increase the capacity of community mental health providers serving public mental health patients and inspire a new generation of physicians to take on that role. During the interviews, residents generally expressed positive attitudes toward the public mental health system, including the LMHAs where they were currently training. While many residents indicated that prior experiences working in public mental health settings contributed to their positive attitudes, the majority also indicated that their experiences working at their current LMHAs enhanced their understanding of the public mental health system and contributed to their positive perspectives. Some residents indicated that they had prior experiences working with their current LMHAs during their medical training in some capacity (e.g., primary care, inpatient care, etc.), or that they were fellows within other departments of public mental health working with different patient populations. Their prior experiences contributed to their favorability of working in public mental health and equipped them for challenges faced in their current residencies. Nevertheless, their current training contributed to their perceived value of the public mental health system overall.

- *"I actually had exposure to the [LMHA] before because in inpatient we work with them closely. But, I didn't know what the child department or the child's side looked like, and this was great."*
- *"This is my last year of residency training. I'm a fifth year trainee and my years three and four were dedicated to children and adolescents. I did a fellowship in child adolescence. My background might be a little bit different than other residents because I love working with this population and that's my passion...and I really appreciate the opportunity I got in fellowship that helped me understand the needs of adolescents in a more diverse setting. I feel I was well equipped to deal with the challenges that comes with this rotation, serving adolescents."*
- *"So for me, my residency and the way it's structured, every single year we work with our LMHA. And every single year it got a little bit more complex. So to have this during my fourth year, it just fit in pretty naturally. Every single year, I added on either a new clinic or a new department that I worked. It just felt like a natural progression of my training."*

RESIDENTS BELIEVE THAT OPEN ACCESS TO CARE AND COMPREHENSIVE SERVICES OFFERED AT THEIR LMHAs ARE BENEFICIAL TO THE COMMUNITIES SERVED.

There was a shared sentiment among residents that the services provided to community members through their LMHAs were accessible, comprehensive, and collaborative. All patients, regardless of their socioeconomic circumstances, are able to receive access to care. Further, residents explained that patients are able to receive a conglomerate of specialized outpatient services through their LMHAs including psychiatric care, case management, counseling, and more. Residents felt that the services offered through their LMHAs are synergetic and contribute positively to the lives of patients served, particularly high-need and underserved individuals. Some indicated that this collaborative service environment allows them to better meet the diverse needs of their patients.

- *“The quality of experience is very comprehensive. We have great administrative support and it's a very collaborative effort. We have counselors over there and we have caseworkers, we have nursing staff. So, it's a collaborative teamwork experience that I appreciate a lot. In addition, the patients are also provided treatments in terms of medication. So, it's a great opportunity for me to serve patients who are underserved, who don't have insurance, and who cannot pay for their medication... Overall, I rate the quality of the experience high in terms of clinical care.”*
- *“I think the people you work with is something very unique to LMHAs. The nurses that work there, the case managers, the case workers, the techs. They're all directly working with these patients.”*
- *“And it's nice to see how families react to what we can offer, which is an all-inclusive service. They have therapy, skills training, coping skills training, all at that one site. So to provide that service to people in the community is great.”*

TRAINING AND WORKING WITHIN A LMHA PROVIDED A COLLABORATIVE INTER-PROFESSIONAL ENVIRONMENT THAT WAS BENEFICIAL TO RESIDENTS' LEARNING AND GROWTH.

Not only did residents believe that public mental health clinics were beneficial to the patients they serve, but also to the residents themselves. Residents indicated that their CPWE residencies offered valuable learning experiences with regard to the community mental health model and meeting the unique needs of their patients within this system. Further, the support received from attending physicians and support staff helped residents navigate the public mental health system and provide a higher level of care to their patients. Residents expressed gratitude for their experiences working at their LMHAs, including the opportunity to work within a collaborative inter-professional environment and with diverse populations of patients. There was a feeling of positive impact on the community that residents felt from working at their LMHAs. They felt like they were making a difference in the lives of their patients and in the communities they served.

“We have the entire team working towards the patient's benefit and addressing the patient's agenda and helping them get their medication, helping them get their psychosocial stressors taken care of. Caseworkers are helping with their life challenges. The counseling is there. So I really appreciated the team environment that [LMHA] offered me. And I think that's a great inter-professional collaboration to experience.”

- *“This is a unique experience. It's the only experience of its kind that I'm getting in community psychiatry. And it helps me understand the needs - because it's different than inpatient, it's different than outpatient experiences that's provided by the institution. Because the needs of the patients are different, the rules are different, the requirements are different. So it helps me understand the concept of community psychiatry, which is the future of psychiatry essentially. So that was something that I learned from this rotation.”*
- *“I would say the level of interdisciplinary work at the LMHA is far superior to other clinics that I've worked at. So weekly meetings with case managers, weekly meetings with therapists, with nursing staff. And so having the interdisciplinary connection that you have there, I thought that was a unique aspect at both [LMHA] and [LMHA]. At our academic clinics, we don't really have that.”*
- *“Having all the support staff at the [LMHA], like the case coordinators, the therapists, the skills trainers, because we have bi-weekly meetings with them as a group as well. And so getting their feedback on how patients are doing, and discussing it as a team helped us. It was helpful, practicing working in a multi-disciplinary group, and also just getting feedback on how things were going on a day-to-day basis with them.”*

In summary, residents generally felt that the public mental health system provided accessible and integrated care for underserved and underinsured children and families. Further, working at LMHAs provided many growth and learning opportunities. While the majority of residents indicated that they were exposed to LMHAs through prior rotations, there was still much to learn from their CPWE experience. Residents particularly enjoyed the interdisciplinary team work atmosphere at their LMHAs, where they were able to work together with other care providers (e.g., case managers, therapists, nurses, etc.) to meet the needs of patients. Residents felt that they were making a positive impact in the lives of their patients and community. Overall, their attitudes toward the public mental health system were positive. Nevertheless, residents did experience challenges working at their LMHAs, which are discussed in the next section.

RESIDENTS HIGHLIGHTED LIMITATIONS OF WORKING IN THE PUBLIC MENTAL HEALTH SYSTEM SUCH AS A LACK OF TIME AND RESOURCES, DISJOINTED SERVICES, AND INEFFICIENT ELECTRONIC SYSTEMS.

While residents highly regard the public mental health system, they indicated that there were limiting factors based on their experiences in residency. **A lack of time and resources** were among the most commonly identified challenges of working within the public mental health system. Due to the high volume of patients, time spent seeing each patient tends to be limited and wait times for appointments can be long. Residents perceived this as a challenge in terms of being able to give patients the level of attention

“[A challenge is] trying to find and utilize other community resources that we don't have to for patients that have a more secure socioeconomic background...I think it's difficult. I've had a lot of difficulty finding some of those services for my patients. You have to understand that you're not going to be able to, unfortunately, provide the same level of care for all patients, because unfortunately, care requires financial resources a lot of the time.”

that they would like. A lack of time was also linked to a lack of resources at times. For example, one resident indicated that there is high turnover among psychiatrists at their LMHA. Some residents discussed the time constraints of public mental health staff generally which impacted patient referrals and wait times for appointments. Another indicated that the medication supply to treat certain mental health

conditions was not always readily available. Patients' socioeconomic status also affected the way residents were able to treat them. For instance, if a patient did not have the financial means to pay for a preferred treatment, cheaper, more accessible alternatives would need to be explored. Disparities in care of private versus public patients were highlighted in this regard. Residents often found themselves having to think outside the box and tap into alternative resources to meet the needs of their patients.

- *“I came from a setting where I had a little bit more flexibility in how long I could be with a patient. I knew with this one, I had to be more aware of the time because my schedule was full.”*
- *“The [LMHA] does have a stock of sample medications... but that changes monthly. We never know what it's going to be. The medications can run out at any time. It's not as problematic for some of the medications, like say, antidepressants. Really any SSRI is about equal to another. But when you're talking about treating schizophrenia or other serious mental illness like bipolar disorder, it can be very problematic because I have no way of knowing if I'm going to be able to continue a patient on this mood stabilizer for the next three months.”*
- *“I think it's difficult for them to hire and retain psychiatrists. I know that at our facility, there's quite a turnover among psychiatrists.”*

- *“Pretty bare bones clinics and offices and things like that.”*

While residents had favorable attitudes toward the comprehensive, specialized outpatient services offered to patients, there was some indication that the **services were disjointed or not as highly accessible** when compared to private institutional care. Residents did not always feel that they were aware of the additional services available to patients or how they could access them – both internal to the LMHA and external. Two residents indicated that it would be helpful to have a better understanding of available community resources as part of their training. For the patient, access to services internal to LMHAs often required a longer wait period and limited appointments when compared to private institutions. One resident felt that having a social worker in the clinic would be helpful in linking patients to other services needed beyond psychiatric care.

- *“I would say that the services at the [LMHA] are kind of disparate. It can be confusing to know where to refer patients and to know which services are available. They're the local mental health authority, so they still kind of target everything based on level of services, which is more about funding sources than it really is about providing treatment.”*
- *“Certainly, I think that the services could be improved by having more access to therapy. That's a huge gap in the outpatient services that we provide. I know that they pull in some of the interns from the local university, so I don't know if there's any way to strengthen or shore-up that, but that would be something that I think would really be beneficial to training and being able to serve the patients.”*
- *“Sometimes I personally feel there should be a social worker in the clinic at all times to help us connect different patients and have the psychosocial issues addressed in that population.”*

Finally, residents discussed **inefficient electronic systems** at their LMHAs that contributed to time constraints and interruptions to patient care. The electronic medical record (EMR) was particularly challenging for residents. While improvements to this system were being made at some LMHAs, residents indicated that the EMR was not very user-friendly and lacked uniformity. Additionally, some residents also indicated that video conferencing for telehealth visits was challenging. For example, families often had difficulty accessing and installing the required programs. The time it took to get families set up took away from the time spent on patient care. This has been a challenge exacerbated by the COVID-19 pandemic and the corresponding increase in virtual visits. The EMR and video conferencing systems both created inefficiencies that affected time spent with patients.

- *“I think the EMR, the electronic medical record, is probably the worst one I've ever experienced. But they're addressing that already, and are expecting to transition to a different one which I'm familiar with. That's a definite upgrade. But that has been a major challenge, just working with it, because it really, really interrupts patient care.”*
- *“I had two did telemedicine systems in terms of video. I had three EMRs that I managed at one point. One of them had separate emails where I had to check in, a separate kind of hard drive that I had to check for access to.”*
- *“Basically, another challenge that's been pretty significant is having these families understand, especially during COVID, how to use the video service. There is an app we have called Life-Size, which is I guess a secure Zoom meeting. A lot of these families had a difficult time just setting up that program on their phones. And we would spend a significant amount of time just getting there before we could start the actual visit.”*

In summary, residents shared several challenges working within the public mental health system during their CPWE residency. These challenges included limited time and resources that affected patient care at times, disjointed services that impacted their ability to provide the highest level of comprehensive care to patients who need it most, and inefficient electronic systems such as the EMR that contributed to time constraints and interruptions to patient care. While some of these challenges may be widely accepted as part of working in a public setting, there are some opportunities to enrich the CPWE residency experience such as providing opportunities for pre-training that acclimates residents to the systems they will be using, as well as internal and external resources that they have access to for patient referrals.

RESIDENTS APPRECIATED THE OPPORTUNITY TO WORK WITH DIVERSE PATIENT POPULATIONS AT THEIR LMHAS.

Generally, residents described their patients as a diverse group, both in terms of demographics and psychopathology, who they have found great satisfaction in working with and learning from. While residents discussed challenges in relation to working with their patients, they generally expressed favorable attitudes toward them. Some residents especially enjoyed being able to specifically work with children. Residents discussed how their patients were often experiencing mental health services for the first time through their LMHAS (although not all were new to mental health services) and that they appreciated the level of impact they were having on children and families in need. There was also a

“So, like I said, very diverse as far as the patient population. You've got folks who've been hospitalized multiple times who are coming to us, you have people where this is their first kind of interface with mental health. So, that's always a fun blend to have, and then the range of pathologies. We've seen pretty severe mood disorders, anxiety, thought disorders. I mean, kind of the whole gamut, the whole range there.”

mutual gratitude – of families who were receiving mental health care and of residents who have learned so much from their patients. Residents indicated that their patient profiles were diverse, contributing to their learning about different types of pathologies and psychoses and the need for individualized care. Comfort levels with patients was high, especially with the support of attending physicians and supervisors in their training program.

- *“And what I would see at the [LMHA] is, yes, there is a pretty big percentage of people that have been discharged from inpatient hospitals, but also we're getting patients that have never had any access to mental healthcare, period. This is their first time getting it. And it's nice to see how families react to what we can offer.”*
- *“So, like I said, very diverse as far as the patient population. You've got folks who've been hospitalized multiple times who are coming to us, you have people where this is their first kind of interface with mental health. So, that's always a fun blend to have, and then the range of pathologies. We've seen pretty severe mood disorders, anxiety, thought disorders. I mean, kind of the whole gamut, the whole range there.”*
- *“Very vibrant. Working with kids is always fun and they always catch you by surprise. And I would say grateful too. I mean, especially with the parents who come in, we take a little extra time to talk with them, especially if this is their first kind of experience with mental health. They're very grateful for the time.”*
- *“I've gotten to see a wide breadth of outpatient children with different presentations and diagnoses. So I feel like I've actually learned quite a bit this past year, and feel a lot more prepared going into fellowship.”*

- *“A big advantage of being able to care for patients at a local mental health authority is that you get to help people with a wide range of problems. And that could be anything from the actual diagnoses they come in with to the age range.”*
- *“I feel comfortable dealing with these patients....I felt comfortable taking care of the patients and the attending supervising support was there all the time. [Doctor] has been a great supervisor. She's always accessible and if there are any answers we need or questions we have, she's very supportive too.”*

Overall, residents expressed favorable attitudes toward their patients. They described them as diverse individuals with whom they enjoyed working. Several residents particularly enjoyed working with children, some whom worked with children for their first time despite prior experience in public mental health settings. The wide range of diagnoses and ages that residents were exposed to helped them grow as practitioners and equip them for future work in the field. The support residents received from their attending physicians, supervisors, and LMHA staff enhanced their comfort level treating their patients. Nevertheless, residents did describe some unique characteristics and challenges of their patients that differed from those of private institutions, as described next.

RESIDENTS DESCRIBED PATIENTS OF THE MENTAL HEALTH SYSTEM AS DISADVANTAGED AND UNDERSERVED, WITH UNIQUE CHALLENGES THAT DIFFER FROM PATIENTS OF PRIVATE INSTITUTIONS.

While CPWE residents generally discussed their patients in the affirmative, they did describe them as socioeconomically disadvantaged and underserved. They acknowledged that their patients experience unique challenges that make it difficult for them to access care and for residents to treat them in the same manner they would private patients. The approach to care differed based on patient needs, which often extended beyond mental health care services. Patients were described as having challenges and stressors related to transportation, health insurance, financial resources, and education about mental health. Patients were more likely to be referred by outside entities such as legal services as opposed to seeking treatment on their own.

- *“The difference from the private settings is that I think they're more disadvantaged. Also, the patients at the LMHA, they don't have that much insight into their illness and they try to resort to different outlets... So there are other different outlets, maybe if it's illegal consequences or substances. And then that's how they get referred. I haven't seen that much of the component of substances and the legal in the private setting. They're more referred by their parents, their family members. So I think that's a unique aspect of the LMHA that we don't see in private practice.”*
- *“Some people have no insurance. Some people have chronic issues, they just haven't been treated. Some are acute issues, but I have found that most of my patients have had diagnoses for probably a few years but it's just the first time they're being formally diagnosed and given treatment options... You kind of start to see what patients are having struggles with. It's not just the transportation. It could be the finances. It could be the life stressors. It could be the hospitalization.”*
- *“Yeah, I mean, because of, like I said, the low socioeconomic status of the patients, there are some difficulties with compliance. Some of the families, for example, live in homeless shelters, and so coming to appointments or being able to consistently take medicines was really difficult for them. I've definitely been able to help out the patients, but still*

understand the barriers that they have, and also the limitations on our end, to be able to change everyone's living situation as well."

WORKING WITH DISADVANTAGED AND UNDERSERVED PATIENTS HAS ENHANCED RESIDENTS' EMPATHY, ADVOCACY AND FLEXIBILITY IN CARE.

Residents indicated that working with their LMHA patients have helped develop their skills as medical professionals beyond providing standard psychiatric treatment. For example, they have learned the importance of practicing empathy, meeting children and families where they are, making referrals and being advocates, and maintaining a level of flexibility in treatment and care. Given the widespread financial constraints of patients, residents often

"I guess what I mean is like system-based care, making sure that patients have stable housing, and how that affects their mental health. And if they are working, if they have stable transportation. Making sure that we ask about those things so that we can see how that's affecting their mental health...Making sure that people are on the Section 8 housing list, if they don't have stable housing. And making sure that, if they qualify for Social Security Disability and stuff like that, we coordinate care for that as well."

find themselves considering alternative medication or treatment options that their patients can access without significant burden. They also find themselves giving more grace to patients who are late for appointments due to factors such as transportation limitations, and assess how stressors impact their patients' mental health. There was a general consensus among residents that coordination of care beyond direct mental health services was important to their patients' overall well-being. Still, despite their best efforts, residents felt that they could not always meet all the needs of their patients given the resource constraints of both their LMHAs and patients.

- "It's especially important to have the skillset of learning who your audience is as far as, when you're talking to a child, are you formulating your questions in a way that they can understand? The parents, what is their education level? Are they understanding what you're asking of them? So those things as far as reading your audience and understanding what their level of understanding is medical knowledge-wise, I think that's probably one of the biggest things that I've had to learn."*
- "My patients at the LMHAs, maybe they don't have a solid income. They may not have work at all. They may be depending on family to try to get services or pay for medication, etc. So, those kinds of resources do make a difference in terms of medication that's more expensive versus, "Okay. I'm going to look at something that I know is a little bit more affordable or more available at the LMHA pharmacy." So, there's that."*
- "And then, just having to work with people, meet people where they're at so like I said before, the transportation aspect of it, if people were running late but they're trying to hop on three different buses to get there, working with them to make sure that they can still have their appointment."*

In summary, residents generally described their LMHA patients as disadvantaged and underserved which has challenged them to think beyond employing a standard level of care that you may find in private institutions. Care does not simply mean evaluating symptoms and behaviors, applying a diagnosis, and prescribing medication. Rather, care centers around empathy, advocacy, and holistic and systems-based thinking when it comes to treating public mental health patients. More often than not, residents' patients face stressors that impact their lives in many ways – mentally, physically, socially, economically, and spiritually. For example, families of children may face financial constraints related to health care and

obtaining medications, unreliable transportation, unstable living or working conditions, and so forth. These stressors, when not addressed in tandem with mental health, impacts the possibility of positive patient outcomes. Residents discussed the various ways they have learned to help patients beyond providing psychiatric services through their time in residency, whether it was assessing the underlining reasons patients were late for appointments and doing their best to accommodate them, researching the cost and accessibility of medications before prescribing to patients, or coordinating with internal and external community resources to help patients get their needs met beyond mental health. In essence, during their CPWE residencies, residents have enhanced their ability to care for patients who are socioeconomically disadvantaged through practicing empathy, advocacy, and flexibility in treatment and care.

THE MAJORITY OF RESIDENTS WERE STILL UNDECIDED ABOUT WHERE THEY WILL WORK POST-RESIDENCY DESPITE THEIR POSITIVE TRAINING EXPERIENCES, BUT ARE CONSIDERING PUBLIC MENTAL HEALTH AS AN OPTION.

While residents found their residency experiences to be positive, the majority were still undecided about what type of setting they wanted to work in post-residency. Still, residents were open-minded about

"After working there, I truly believe this is a great asset to the community and we're providing great service. Enough to the extent that I would consider working there. Actually, I am considering working there if the opportunity presents itself, because I truly believe that we are making a difference in these kids' lives...I'm open to a lot of possibilities at this point. At this point, I don't think I'm going to go full on private sector where it's cash only or private pay. But I definitely can see myself working at [LMHA] or something comparable."

working in a public mental health institution and at times preferred that option. Several mentioned the desire to work with a similar patient population as they see now. Some residents were leaning toward a public mental health setting, but were not sure whether they wanted to focus on inpatient or outpatient care. Facilitating factors included the depth and breadth of their experiences during their existing rotations and current CPWE residencies. Residents truly believed that the community mental health model is a beneficial one that

positively impacts patients' lives. Some limiting factors included the volume of patients often seen at LMHAs and how much time residents had left in their medical program (those who were nearing the end had a better idea about where they see themselves in the future). Residents considering options outside of LMHAs still considered offering care in a public setting either by moonlighting or acting as an attending physician part-time.

- *"I haven't decided yet, but I could definitely see myself working in a public setting. That would definitely be a preference for now... If I get an opportunity, I would definitely come back and work at [LMHA]. But that's still two years from now."*
- *"So I thought significantly about practicing in an academic setting. So like a medical school residency hooked onto a hospital. I think that would be the most likely scenario for me in the future. Thought about private practice as well. So those are kind of the two main ones that I've thought about... I hope some of my time is spent [in the public mental health sector]. It's been a really rewarding experience, especially if I'm in the academic setting. Maybe a rotating attending at one of the clinics would be great."*
- *"I am still trying to decide outpatient versus inpatient. I think I see myself probably, honestly, I could work at a local mental health authority and be happy. I could work at a hospital clinic and be happy. I think that primarily for me, I*

guess how many patients I have to see, how thorough I can be. I would say that is the only thing that makes me hesitant about the local mental health authority, is there's a huge, a large number of patients that need to be served. Often, there's not a lot of time to complete appointments."

In summary, residents were generally undecided about their future career plans. However, it appears that their CPWE residency experience, combined with prior rotations and residencies in the public mental health system, has inspired residents to at least consider public mental health as an option. The range of responses regarding future plans varied widely. A few residents indicated that if an opportunity presented itself at their current LMHAs, that they would likely go back to work there. Others had strong preferences toward working in public mental health, but were undecided whether they wanted to work in an inpatient or outpatient setting. At least one resident considered public mental health, but expressed concerns about being able to thoroughly treat and spend time with each patient given the sheer volume of patients.

EXPERIENTIAL LEARNING AT THE LMHAs HELPED PREPARE RESIDENTS FOR CROSS-CULTURAL INTERACTIONS AND CULTURALLY RESPONSIVE MENTAL HEALTH CARE.

Residents discussed their CPWE residencies in relation to cross-cultural training and patient interactions. While the majority of residents did not indicate widespread formal cultural competency training during their time in residency, they did indicate that their on-site learning developed their ability to interact with culturally diverse patients and adapt their mental health care to be culturally responsive. With support from their attending physicians, support staff, and other resources available to them (e.g., a translator) during their CPWE residencies, residents felt confident interacting with and treating their patients. Several residents also indicated their own cultural backgrounds helped with patient interactions, whether it was being raised in the same region or being able to converse in the patient's native language. Residents also indicated receiving some level of cultural competency training throughout their medical school program (e.g., through didactics, lectures, grand rounds), not necessarily connected to the CPWE residency, that helped prepare them for cross-cultural interactions.

"We were oriented about the diverse cultural backgrounds of the patient population from at the beginning of the [LMHA] rotation. So like I said, that was evident from the kind of patients that we saw. One of our preceptors sat with us and explained about the different populations that the [LMHA] sees, especially in the outpatient. So that gave us a preview to know what to expect from the different psychopathologies that we see... And we'd be part of a cultural competency evaluation where we pick a few patients and see what are some things, what are some aspects of the patient's culture that we were able to address in one evaluation? And if there is something that we were falling short on, or if there's some modifications that we can do, we give ourselves a few weeks or a few months in order to correct them so that we are able to fill that gap. So I feel like we were prepared very well as far as the training program's effort goes."

- "I will say that there was specific training for cultural competency as you move through your, what we call didactics during the first two years, which is really your coursework. There were specific trainings on cultural competency. We basically learned to negotiate some of the cultural differences seen in the major populations that we serve, particularly the Hispanic population, and the African-American population."*
- "[Attending physicians] are very progressive in making sure that we do get cultural competency training, which is always evolving. I think one thing that helps me is that I come from the [region], so a lot of these Hispanic cultural aspects transition well here to this patient population. So, we have to be mindful of, "Oh, is this a cultural norm or is*

this a pathologic mental health problem, here?" These are some things that they have actually taught here. Like ataque de nervios, which is one of the presentations, is like a nerve attack, or I guess in layman terms, anxiety. So they do talk about things like that, yes. And they have had actual formal teaching for it."

- "Can't say that we had any specific lectures that were like cultural competency in the adolescent population or pediatric population. Our faculty are really well-rounded and knowledgeable in this area, especially [attending physician]. And so residency is a lot of on the job training and I felt like I did gain a lot. Our pediatrics, our child psych rotation, isn't only this clinic. And so I was also going to other clinics where I was receiving a lot of like cultural competency training. And then our residency in general is very heavy on cultural competence, competency and empathy in general being a psych residency. And so I felt like it was an easy transition into it and I didn't feel like I needed much more than the on the job I received from [attending physician]."*

Residents shared stories and examples of interactions with patients where they had to take a step back and consider the cultural background of patients in order to understand how the patient was defining their mental health experience, how their cultural beliefs tied into their experience, and how to best work with their patient to develop a treatment plan that was culturally appropriate. Residents articulated how they were able to apply their knowledge of cultural differences to caring for their patients.

- "Sometimes, kids will say, "Hey, I've seen my deceased grandfather." And in some cultures, that's the norm and it's comforting. I'm like, "What do they say?" Oh, they say, "Go to church, be a good kid and just know that we always love you." And a lot of times, that is a cultural norm, so I mean, that's been one aspect where it's like, maybe someone was actually considering serving an antipsychotic on someone when in fact, that's just the normative, and it can help in the future to not expose this kid to a medication they don't need to be exposed to."*
- "I can recall a few cases on the acute unit where we really had to work hard to cross cultural boundaries and barriers to have the patient's family accept that medications are going to be needed throughout the entire life to manage treatment. I certainly have patients who I have to work harder to involve the entire family, because I understand that treatment is about the family unit and not just about the individual patient. I think that I've benefited from the training to recognize when that sort of approach is needed and to try to negotiate those barriers and boundaries."*
- "So we had a patient the other day. She had depression, anxiety. She's from a Hispanic cultural background. It was very hard for her to seek care because there's a lot of stigma and she did not want to share it with her family and her family was not accepting of her mental health diagnosis. She recently had a baby. So we ended up providing a lot of education and the first visit, patient did not want to accept any treatment. She just came in because a probation officer told her to be here. There was no way she was getting any treatment. Said there was nothing wrong with her, but the more we educated her about different diagnoses and different mechanisms and the treatments; the mechanisms of action, of medication, the more she was open to having a discussion. Eventually she decided to start the medication and is doing well. So I think the cultural aspect of the training is really strong and we get to see different cultures. How the stigma for mental health is real."*

In summary, the experiential aspect of the CPWE program prepared residents for cross-cultural interaction and providing culturally responsive mental health care. While residents discussed other modalities of cultural competency training such as didactics and grand rounds throughout their medical school training, the exposure to diverse cultures and the support received from supervisors and clinic

staff really enhanced their understanding of working with individuals of different backgrounds and serving them in a culturally responsive way.

THE CPWE PROGRAM DID NOT NECESSARILY CHANGE RESIDENT ATTITUDES TOWARD PATIENTS AND THE PUBLIC MENTAL HEALTH SYSTEM, BUT WAS SEEN AS AN INTEGRAL PART OF THEIR OVERALL MEDICAL TRAINING.

As discussed, residents generally expressed favorable attitudes toward both the public mental health system and patients it serves. Attitudes were not necessarily tied specifically to the CPWE program, but

"I was very excited going in, because I knew what kind of good work that the LMHAs do. And coming to rotate at [clinic within LMHA], I knew that I was going to get a similar experience with the diversity of illnesses that people suffer from in that population that the system serves. And that was basically exactly the experience that I got. So I didn't really see any disparity in expectations versus reality."

rather a more integrated experience of working across public mental health settings and departments throughout their medical school training. Many had prior exposure to public mental health settings – whether it was rotating through different inpatient and outpatient environments or working across specialized departments within the same LMHA that they were currently training at. This prior experience contributed to their understanding and level of comfort working within the public mental health system

and treating underserved populations even if in a different capacity. For the majority, they viewed the CPWE program as an integral part of their overall medical training and often assessed their public mental health experiences in their entirety. The CPWE program provided opportunities for learning and growth in terms of working with children and adolescents, caring for diverse patient populations, working in an outpatient setting versus inpatient, and navigating community-focused, systems-based care. These experiences helped expand residents' perspectives on working within a public mental health system with diverse and medically underserved patients.

- *"We hospitalize patients on our acute units that are funded by the [LMHA]. So we start interacting with the local mental health authority basically on day one... So I had a good and positive outlook on the LMHA prior to working there."*
- *"I would say not changed [attitude], but I think I would say broadened actually, because it is a really diverse community. You have people from different backgrounds, ethnic backgrounds... Just understanding the cultural backgrounds of these patients and families really helped me in knowing what their social taboos were about mental health and mental health illness, and what the barriers were for them to seek mental health and the time delay it took for them. So it was really helpful in knowing that aspect, I would say."*
- *"So, I spent a lot of time during my first and second years of training at [hospital], which is an inpatient psych hospital. And it's the county hospital, so it has pretty similar patient population, where a lot of uninsured patients go, because a lot of other psych hospitals won't accept them. Mostly, I worked with adults though... I honestly felt a lot of respect for [LMHA] because they provide a lot of care for people who can't pay for it, and the only way that a lot of people get their medications."*

In sum, the CPWE residency did not necessarily change residents' attitudes toward the public mental health system and patients served as they generally had positive views going in. However, the residency did broaden residents' perspectives on working specifically with children, adolescents and families in a

public mental health outpatient settings. It also further exposed residents to the need for culturally responsive mental health care and specialized, integrated care to help patients with psychosocial stressors.

Limitations and Next Steps

There is much more to learn in the second year evaluation as it explores the implementation of the CPWE initiative across HRIs and longer-term impacts. Since the CPWE initiative was new this year, documentation of its actual implementation, and how uniform or varied it might be across HRIs, is limited. Further, data collection and analysis was limited to a non-random sample of 10 resident interviews. The resident sample was one of convenience, recruited by HRI directors. Limitations of this method include the potential of a non-representative sample of the entire cohort of CPWE residents and introducing respondent bias. In the future, obtaining a random sample of residents to interview would be beneficial to the evaluation. Additionally, triangulating resident interview data with other data sources such as surveys or interviews with other key stakeholders (e.g., HRI staff responsible for implementation) would be advantageous to evaluating the CPWE program. In the next year, it will be important to continue embarking on a learning and discovery journey to better understand the CPWE initiative from the resident selection and onboarding process, to the ways HRIs are structuring and implementing the residencies.

Recommendations

The first year of the CPWE program has shown promising indicators of progress toward accomplishing its goals, as indicated in the qualitative analysis of resident experiences. However, in order to fully understand the impact of the program on residents and communities, we propose the following recommendations going into the second year of CPWE implementation:

- First, it would be useful for HRIs to **document their implementation processes** of the CPWE program. HRIs were tasked with reaching out to LMHAs to engage them as partners in the CPWE program. The level of engagement varied across HRIs, based on existing relationships with LMHAs. Further, there were no distinct guidelines provided to HRIs regarding CPWE implementation. HRIs were able to use their own discretion about how the program would be carried out, including how they would engage residents. Having a better understanding of how LMHAs and residents were engaged in the program will provide a better opportunity to explore successes and challenges of the program from an implementation perspective. It would also help support data collected from residents regarding their experiences in the program.
- Second, it would be useful for HRIs to **collect data about patients and communities served, as well as resident outcomes**, as it relates to the CPWE program goals. For instance, collecting data on number of additional patients served and expansion to geographic areas as a result of CPWE funding would provide a better picture of how the program is impacting community reach and capacity building among community mental health centers. Further, surveying residents who completed the CPWE program on their satisfaction with the program and where they began

working after residency would inform whether the CPWE experience may have inspired careers in public mental health.

F. COMPARISON OF TEXAS CPAN INITIATIVE TO OTHER STATES

Background

Currently, the United States has more than 30 regional Child Psychiatry Access Programs (CPAPs),¹⁵ which vary in structure, services, and funding sources, with many using both federal and state dollars for operational costs. The purpose of this preliminary literature review is to compare key metrics from the Texas CPAN program to similar child psychiatry access models in other states.

Methods

We conducted a literature search to identify relevant peer reviewed articles to compare CPAN to existing models in other states. Peer reviewed articles and reports from established CPAPs were identified and key program characteristics and common metrics between other state models and the Texas model were extracted from articles/reports and synthesized in an evidence table (see <https://bit.ly/EELitReview>).

Results

Five other child psychiatry access programs (CPAP) were included in the review: the Massachusetts Child Psychiatry Access Project (MCPAP), New York State's Child and Adolescent Psychiatry for Primary Care (CAP-PC), Washington Partnership Access Line (PAL), Wyoming Partnership Access Line (PAL), and ACCESS Mental Health CT.

Overview of Selected Child Psychiatry Access Programs (CPAPs)

MCPAP was established in 2005 to enhance access to child psychiatry and community mental health resources in the state of Massachusetts and is one of the most prominent and well-established CPAPs. The program is funded by the Commonwealth of Massachusetts and commercial insurers. MCPAP has six regional hubs in academic medical centers based on geographic proximity. Each team has a child and adolescent psychiatrist (CAP), a psychotherapist, and a care coordinator. Several teams include a specialized advanced practice registered nurse. Teams conduct outreach based on lists from Medicaid and commercial insurance directories with all providers in primary care practices serving children and adolescents. Each MCPAP hub has a toll-free line that providers can call. MCPAP services include phone consultation, face-to-face/in person consultation, patient care coordination, and PCP education. When phone consultations are not sufficient, MCPAP clinicians provide outpatient face-to-face consultations that are scheduled within two weeks of the phone consultation. PCPs receive consultation letters with detailed recommendations within 48 hours of the appointment. Since the start of the program, MCPAP has developed and sustained a highly accessible and highly used statewide program that supports collaboration between CAPs and PCPs to manage the behavioral and mental health needs of their patients.

Washington PAL was developed two years after MCPAP and was tailored to fit a limited funding stream, a lower population density, and more uneven dispersion of CAPs. The program focuses on expanding mental health services for children covered by Medicaid and improving access to CAPs in rural and low-income areas of Washington. Washington PAL is funded by Washington's Health Care Authority and is available to all providers in the state of Washington. Compared to other CPAPs that have regional teams that provide services, Washington PAL has a smaller centralized team of child and adolescent psychiatrists (CAPs) at the University of Washington (UW) School of Medicine. PAL offers phone consultations, face-to-face telehealth clinic consultations, and patient care coordination.

In 2011, the state of Wyoming engaged the team of CAPs at UW and joined PAL. The program is funded by the Wyoming Department of Health and is available to providers caring for any patient in Wyoming. Like Washington PAL, Wyoming PAL focuses on children covered by Medicaid in rural and low-income areas. Wyoming PAL services include phone consultations, televideo consults for high needs patients with Multidisciplinary Team (MDT)/foster care involvement, patient care coordination, and PCP education.

New York State's CAP-PC was established in 2010 through funding from the New York State Office of Mental Health. It was modeled after MCPAP, but emphasized formal education for PCPs and is one of the largest providers of Continuing Medical Education (CME). CAP-PC has five regional hubs, each located at a medical school. Each hub has 2–3 CAPs and a Liaison Coordinator, who is responsible for linkage and referral support. The program has one toll-free phone line for PCPs to call, with each hub covering one day per week. CAP-PC services include phone consultation, face-to-face/in person consultation, patient care coordination, and PCP education.

ACCESS Mental Health CT was established in 2014 to ensure that all youth in the state under the age of 19 have access to psychiatric and behavioral health service through their primary care provider. The program is funded by the Department of Children and Families (DCF). ACCESS Mental Health CT has 3 hubs at behavioral health organizations. Each hub team has a CAP, behavioral health clinician, program coordinator, and a half-time family peer specialist. ACCESS Mental Health CT offers phone consultations, face-to-face assessments, and patient care coordination.

Table 51 provides a comparison of the CPAP programs provided in the review, including the year the CPAP was established, the structure of its care team, and the services offered.

Table 51. Overview of a Selection of State-Based Child Psychiatry Access Programs (CPAPs) Included in Review

Characteristics	Massachusetts MCPAP	Washington PAL	Wyoming PAL	New York Project TEACH	ACCESS Mental Health CT	Texas CPAN
Year Started	2005	2008	2011	2010	2014	2020
Hubs	6 regional teams in academic medical institutions	Centralized team at the University of Washington	Centralized team at the University of Washington	5 regional teams in academic medical institutions	3 behavioral health organizations	12 regional teams in academic medical institutions
Services Offered						
Phone Consultation	X	X	X	X	X	X
In-person consultation with PCP	X				X	X
In-person evaluation/treatment with family	X			X	X	
Telepsychiatry evaluation/ treatment	X	X	X	X		
Resources/Referral Assistance	X	X	X	X	X	X
Clinician education	X	X	X	X	X	X
Additional Programs						
Perinatal/Maternal Mental Health	X	X		X		
Adult patients (18+)		X				
School Program		X				X

Metric Comparisons Across CPAPs

Due to the difference in timeframes of published data, the comparisons that follow must be considered with caution. Table 52 presents a comparison of enrollment and utilization data across CPAPs. MCPAP had the highest number of encounters compared to other CPAP programs. Compared to MCPAP and ACCESS Mental Health CT, CPAN had a higher number of clinics and PCPs enrolled.

Table 53 compares the timeliness at which PCP's were connected to consulting psychiatrists. This data was only available for ACCESS Mental Health CT and CPAN. 84% of PCPs who called ACCESS Mental Health CT were connected directly to a psychiatrist compared to 5% of PCPs who called CPAN. Calls returned within 30 minutes of the PCP's initial inquiry were higher for ACCESS Mental Health CT (97%) than CPAN (88%). Table 54 presents a comparison of care teams for telephone consultations. This data was only available for MCPAP and CPAN. Psychiatrists were assigned to a large number of calls for both MCPAP (44.9%) and CPAN (50.5%). While resource coordinators were included in the care team for 53.8% of CPAN consultations, they were only included in 8.7% of MCPAP consultations.

Table 52. Comparison of Enrollment and Utilization Data Across CPAPs

Characteristics ^a	Massachusetts MCPAP ^{b,16}	Washington PAL ^{c,17}	Wyoming PAL ^{d,18}	New York CAP-PC ^{e,10}	ACCESS Mental Health CT ^{f,19}	Texas CPAN ^g
Total Clinics Enrolled	353	-	-	-	367	1,090
Clinic Type^h						
Pediatric	-	-	-	-	220 (59.9%)	455 (44.8%)
Family Medicine	-	-	-	-	131 (35.7%)	275 (27.1%)
Integrated	-	-	-	-	12 (3.3%)	234 (23.1%)
Other					0 (0.0%)	51 (5.0%)
Total PCPs Enrolled	1,341	-	-	1,931	-	6,729
Utilization						
Clinics that Used CPAP Service, n (%)	244 (69%)	-	-	-	117 (32%) ⁱ	339 (31.1%)
% PCPs that Used CPAP Service, n (%)	-	592	-	1,506 (78%)	-	1,210 (18.0%)
Total Patients Served	10,114	1,863	631	6,285	-	1,335
Total Encounters (All Services)	35,335 ^j	2,405 ^k	631 ^l	8,590	30,288	3,891
Total Telephone Consult Encounters	14,174	2,285	277	8,013	-	-

(a) Dash (-) indicates data is not available. (b) From July 1, 2005 to December 31, 2008 (3.5 years). (c) From April 1, 2008 through April 30, 2011 (3 years). (d) From January 1st, 2011 to March 31st, 2013 (2 years). Includes telephone consults, televideo consults for Multidisciplinary Teams, and medication reviews. (e) From 2010 through end of 2016 (6 years). Includes telephone consults and face-to-face encounters. (f) From June 16th, 2014 through June 30th, 2019 (5 years). Includes telephone consults, and face-to-face encounters, and care coordination and family support. (g) CPAN Encounter-level Extract, Trayt. From August 16, 2020 to August 31 2021 (1 year). (h) Clinic type missing for 4 (1.1%) of ACCESS Mental Health CT clinics and 75 (6.9%) of Texas CPAN clinics. (i) Calculated for From July 1, 2018 - June 30th, 2019 (1 year). (j) Includes telephone consults, face-to-face encounters, care-coordination with providers, and care-coordination with families. (k) Includes telephone consults and in-person/televideo consults. (l) Includes televideo consults for medications, medication review consultations, and elective telephone consultations.

Table 53. Comparison of Call Back Times Across CPAPs

Call Characteristics	ACCESS Mental Health CT ^{a,19} n = 1,709	Texas CPAN ^b n = 1,778
Calls connected Directly to PSY	1,401 (84%)	89 (5.0%)
Calls Returned by PSY Within 30-min	1,666 (97%)	1,126 (88.0%)

(a) From July 1, 2018 to June 30, 2019 (1 year).

(b) CPAN Encounter-level Extract, Trayt. From August 16, 2020 to August 31, 2021 (1 year).

Table 54. Comparison of Telephone Consultation Care Teams Across CPAPs

Care Team ^a	Massachusetts MCPAP ^{b,16} (n = 14,174)	Texas CPAN ^c (n = 5,317)
Therapist	3693 (26.1%)	1178 (30.3%)
Psychiatrist	6370 (44.9%)	1966 (50.5%)
Resource Coordinator	1236 (8.7%)	2173 (55.8%)
Advanced Practice Registered Nurse	2874 (20.3%)	-

(a) Dash (-) indicates data is not available.

(b) From July 1, 2005 to December 31, 2008 (3.5 years).

(c) CPAN Encounter-level Extract, Trayt. From August 16, 2020 to August 31, 2021 (1 year).

CPAN encounters may have more than one provider type; results will not sum up to 100%.

For all programs, calls were primarily about children ages 5-18 years (Table 55). Tables 56-57 present a comparison of reasons why PCPs initially called the CPAP (Table 56) and diagnoses as a result of mental health consultations (Table 57). For MCPAP, CAP-PC, and CPAN, referral assistance and medication-related questions were common reasons for PCPs to utilize the service. While few CPAN calls were for diagnostic-related questions (5.1%), this was the reason recorded for a third of MCPAP calls. Across all programs, attention-deficit/hyperactivity disorder, anxiety disorder, and depression were top diagnoses.

Table 58 presents a comparison of providers' perceived outcomes of the CPAP. For CAP-PC, 92.7% of surveyed providers reported an increase in their knowledge in mental health care, 89.0% reported an increase in their skills to provide mental health care, and 88.5% reported an increase in their confidence to provide mental health care. For CPAN, 73.8% of surveyed providers reported an increase in their knowledge in mental health care, 74.8% reported an increase in their skills to provide mental health care, and 71.8% reported an increase in their confidence to provide mental health care.

Table 55. Comparison of Patient Demographics Across CPAPs

Characteristics ^a	Massachusetts MCPAP ^{b,20} (n = 5,099)	Washington PAL ^{c,17} (n = 2,285)	Wyoming PAL ^{d,18} (n = 277)	New York CAP-PC ^{e,10} (n = 8,013)	ACCESS Mental Health CT ^{f,19} (n = 1,465)	Texas CPAN ^g (n = 3,718)
Gender						
Male	3,086 (60.5%)	-	175 (63.2%)	-	781 (53.3%)	1,578 (42.4%)
Female	2,013 (39.5%)	-	97 (35.0%)	-	684 (46.7%)	2,109 (56.7%)
Other	-	-	-	-	-	31 (0.8%)
Age						
0-5	719 (14.1%)	274 (12.0%)	40 (14.4%)	401 (5.0%) ^k	152 (10.4%)	364 (9.7%)
6-12	1,904 (37%) ^h	1,028 (45.0%)	132 (47.7%)	3,285 (41.0%) ^l	548 (37.4%)	1,444 (38.8%)
13-18	2,251 (44.1%) ⁱ	983 (43.0%) ^j	79 (28.5%)	3,446 (43.0%) ^m	677 (46.2%)	1,815 (48.9%)
19+	217 (4.3%)	-	15 (5.4%)	881 (11.0%) ⁿ	86 (5.9%)	90 (2.4%)
Race and Ethnicity						
Hispanic		-	-	-	200 (13.7%)	819 (22.0%)
White, non-Hispanic		-	-	-	893 (61.0%)	1,089 (29.3%)
Black, non-Hispanic		-	-	-	181 (12.4%)	290 (7.8%)
Asian, non-Hispanic		-	-	-	33 (2.3%)	91 (2.5%)
Other		-	-	-	45 (3.1%)	120 (3.2%)
Declined/Unknown		-	-	-	113 (7.7%)	496 (13.3%)

(a) Dash (-) indicates data is not available. (b) From July 1, 2018 to June 30, 2019 (1 year). Includes telephone consults, face-to-face encounters, care-coordination with providers, and care-coordination with families. n=8 missing. (c) From April 1, 2008 through April 30, 2011 (3 years). (d) From January 1, 2011 to March 31, 2013 (2 years). Includes telephone consults, televideo consults for Multidisciplinary Teams, and medication reviews. (e) From 2010 through end of 2016 (6 years). Includes telephone consults and face-to-face encounters. (f) From June 16, 2014 through June 30, 2019 (5 years). Includes telephone consults, and face-to-face encounters, and care coordination and family support. (g) From August 16, 2020 to August 31, 2021 (1 year).

(h) Includes patients 6-11. (i) Includes patients ages 12-18. (j) Includes patients ages ≥ 13. (k) Includes patients < age 5. (l) Includes patients ages 5-11. (m) Includes patients ages 12-17. (n) Includes patients ages 18-21.

Table 56. Comparison of Reasons for Telephone Consultations Across CPAPs

Consultation Reason ^a	Massachusetts MCPAP ^{b,16} (n = 3,497)	New York CAP-PC ^{c,10} (n = 8,013)	Texas CPAN ^d (n = 3,891)
Assessment	23 (1.0%)	-	279 (7.2%)
Diagnosis	1190 (34.0%)	1603 (20%)	199 (5.1%)
Behavioral Management	231(6.6%) ^e	1603 (20%) ^f	291 (7.5%)
Medication Questions	956 (27.3%)	5449 (68%)	1643 (42.2%)
Referral Assistance	957 (27.4%)	2083 (26%)	1902 (49.0%)
General Resources	-	-	771 (19.8%)
Second Opinion	80 (2.3%)	-	-
Crisis	54 (1.5%)	-	-

(a) Dash (-) indicates data is not available. (b) From April 1, 2008 to December 31, 2008 (9 months). (c) From 2010 through end of 2016 (6 years). Includes telephone consults and face-to-face encounters. A PCP may report more than 1 reason for calling; results will not sum up to 100%. (d) From May 1, 2020 to September 30, 2021. A PCP may report more than 1 reason for calling; results will not sum up to 100%. (e) Includes MCPAP categories "Advice for parents" and "School issues". (f) Includes CAP-PC category "Non-pharmacologic treatment"

Table 57. Comparison of Patient Diagnoses as a Result of Mental Health Consultations Across CPAPs

Diagnosis ^a	Massachusetts MCPAP ^{b,16} (n = 14,174)	Washington PAL ^{c,17} (n = 2,285)	Wyoming PAL ^{d,18} (n = 229)	New York CAP-PC ^{e,10} (n = 8,013)	Texas CPAN ^f (n = 1,784)
Attention-Deficit/Hyperactivity Disorder	4502 (32%)	1188 (52%)	89 (39%)	1522 (19%)	568 (33%)
Anxiety Disorder	3276 (23%)	823 (36%)	64 (28%)	1923 (24%)	531 (30%)
Depression	3357 (24%)	457 (20%)	101 (44%)	1202 (15%)	703 (39%)
Autism Spectrum Disorder	-	320 (14%)	-	-	163 (9%)
Oppositional Defiant Disorder	1755 (12%)	-	-	561 (7%)	73 (4%)
Posttraumatic Stress Disorder	451 (3%)	251 (11%)	82 (36%)	-	67 (4%)
Developmental Disorders	147 (1%)	251 (11%)		1603 (20%) ^g	17 (1%)
Substance Use	252 (2%)			48 (0.6%)	15 (0.8%)
Conduct/ Disruptive Behavior Disorder	115 (1%)	823 (36%)	119 (52%)	721 (9%)	16 (0.9%)

(a) Dash (-) indicates data is not available.

(b) From July 1, 2005 to December 31, 2008 (3.5 years).

(c) From April 1, 2008 through April 30, 2011 (3 years)

(d) From January 1, 2011 to March 31¹, 2013 (2 years). Includes Televideo consults for Multidisciplinary Teams (MDTs). More than one diagnosis per encounter may exist; results will not sum up to 100%.

(e) From 2010 through end of 2016 (6 years).

(f) From August 16, 2020 to August 31, 2021 (1 year). More than one diagnosis per encounter may exist; results will not sum up to 100%.

(g) Includes Autism Spectrum Disorder.

Table 58. Comparison of Providers' Perceived Outcomes of CPAP^a

	New York CAP-PC ^{b,10} (n = 356)	Texas CPAN ^c (n = 103)
Increased my knowledge in MH care	330 (92.7%)	76 (73.8%)
Increased my skill to provide MH care	317 (89.0%)	77 (74.8%)
Increased my confidence to provide MH	315 (88.5%)	74 (71.8%)

(a) Combines survey response options “moderately” and “very much” (other options: not at all, slightly).

(b) CAP-PC Annual Surveys (combined results form 2013, 2014, and 2015 annual surveys).

(c) 2021 External Evaluation CPAN Implementation Survey. Includes providers who called CPAN occasionally or regularly, and providers who called CPAN in the past but not anymore.

G. COST ANALYSIS: CPAN & TCHAT

Background

Time-driven activity-based costing (TDABC) is a methodology for estimating the cost of resources consumed in the program and identifying potential process improvements. The TDABC model helps organizations realize the time and cost spent on providing services and assess improvement strategies to reduce the cost, while still ensuring the delivery of quality services²¹.

In year one, we focused on developing the cost model and estimating the pre-implementation phases of CPAN and TCHAT for each HRI, prior to “going live” with the provision of services. In years 2 and 3, we will use the TDABC methodology to assess the cost of implementing mental health improvement programs (CPAN and TCHAT) and their return on investment, once established and providing services to participants.

Methods

The pre-implementation TDABC model was derived from detailed process maps describing the mental healthcare delivery cycle developed by our multidisciplinary team (see Appendix B for Process Map examples for HRIs, clinics and schools). Model implementation steps are listed below, using CPAN as an example:

- Identify resources required for the pre-implementation phase of the mental health programs. Resources include the staff (e.g. program directors, project coordinators, behavioral health specialists, and administrators), and non-personnel fixed and variable costs such as rent, software, computer equipment, training materials and miscellaneous).
- For each staff member, estimate the total activity time per person per week based on their self-reported working hours for the following combinations of activities including internal meetings (strategizing and planning, budgeting, outreach materials design), initial outreach (reviewing, searching, and identifying clinics, and emailing monthly posts about CPAN), implementation period after engagement (meetings with clinics/PCPs, providing enrollment options, sending emails to enroll via Trayt), complete enrollment period (entering PCP enrollment information into Trayt and Excel, delivering CPAN presentation and meetings to answer questions, etc.) and time spent on other relevant activities. Time was estimated based on the staff members’ best knowledge of the procedure and understanding of the program. A program coordinator was often in the best position to provide a retrospective “order of magnitude” estimate of the time input for members of the team. The aggregated procedures for CPAN (Figure 40) and TCHAT (Figure 41) are shown for one HRI as examples of how the data were reported by the sites.

Figure 40. Aggregated Procedure and Activity Time of CPAN Implementation Staff

Instructions: Please enter the time spent on pre-implementation activities. For steps 2 and 3 estimate the number of hours per person per week and number of weeks. For steps 1 and 4 estimate total hours. Your best estimates are sufficient. The data collected primarily relies on your knowledge and understanding of the processes.

Process Step	Director (Medical)	Program Manager	Behavioral Health Consultant	Administrator	Behavioral Health Consultant	Other [Name, Title]
1) Time spent <u>planning outreach prior to beginning outreach</u> (includes attending internal meetings, strategizing and planning outreach, budgeting, and designing/creating own outreach materials)	Total: 40 hours	Total: 228 hours	Total: 96 hours	Total: 50 hours	Total: 96 hours	Total: ____ hours
2) Time spent <u>conducting outreach from beginning of outreach up until "go-live" date</u> (includes reviewing list of PCPs in area, conducting internet searches to identify additional clinics, making cold calls to clinics, sending emails/faxes with CPAN information, delivering presentations, setting up meetings with clinics/PCPs, explaining program with Q&A)	approximate 1 hour per week * 52 weeks	approximate 20 hours per week * 57 weeks	approximate: 24hrs/wk * 52 weeks	approximate 1 hours per week / 10 weeks	20 hrs/wk * 50 weeks	approximate ____ hours per week / ____ weeks
3) Time spent <u>enrolling clinics/PCPs from beginning of enrollment through now</u> (includes entering enrollment information in Trayt, documenting enrollment in Excel, sending welcome packets, conducting meet and greet following enrollment)	approximate 0 hours per week / ____ weeks	approximate 8 hours per week * 50 weeks	approximate: 2/wk * 46 weeks	approximate 0 hours per week / ____ weeks	approximate: 3 hrs/wk * 46 weeks	approximate ____ hours per week / ____ weeks
4) Time spent on other relevant start-up activities (does NOT include activities involved in implementing the program such as engaging enrolled clinics/PCPs and service delivery) (please specify here: hub/COSH/other HRI meetings, SOP/Process Mapping, IT/Hardware/Software related needs, purchasing, Hiring related tasks, Resource Database development/mtgs, training development, website development, education [CME/ECHO] related planning /development, reporting,)	Total: 80 hours	Total: 357 hrs	Total: 416 hours	Total: 150 hours	Total: 416 hours	Total: ____ hours
Total hours per week						

Figure 41. Aggregated Procedure and Activity Time of TCHAT Implementation Staff

Instructions: Please enter the time spent on pre-implementation activities. For steps 2 and 3 estimate the number of hours per person per week and number of weeks. For steps 1 and 4 estimate total hours. Your best estimates are sufficient. The data collected primarily relies on your knowledge and understanding of the processes.

Process Step	Medical Director	Program Manager	Outreach Coordinator	Administrator	Behavioral Health Consultant (e.g., LPC, LCSW)	Other Staff (e.g., Care Manager, Data Manager, Project Manager)
1) Time spent on <u>planning outreach prior to beginning outreach</u> (includes attending internal meetings, strategizing and planning outreach, budgeting, identifying school districts, and developing flyers/emails for outreach)	Total: 30 hours	Total: 100 hours	Total: 10 hours	Total: 30 hours	Total: ____ hours	Total: ____ hours
2) Time spent on <u>conducting outreach from beginning of outreach up until "go-live" date</u> (includes contacting school district leadership, sending outreach materials, delivering TCHAT presentations to TEAs and ISDs, and meeting with school districts to provide more information about the program)	approximate 2 hours per week / 12 weeks	approximate 10 hours per week / 36 weeks	approximate 10 hours per week / 36 weeks	approximate 5 hours per week / 36 weeks	approximate ____ hours per week / ____ weeks	approximate ____ hours per week / ____ weeks
3) Time spent on <u>enrolling ISDs from beginning of enrollment through now</u> (includes providing MOU to school district, conducting onboarding with ISDs, and delivering trainings to school personnel)	approximate ____ hours per week / ____ weeks	approximate 20 hours per week / 20 weeks	approximate 20 hours per week / 20 weeks	approximate 10 hours per week / 36 weeks	approximate ____ hours per week / ____ weeks	approximate 20 hours per week / 20 weeks
4) Time spent on other relevant start-up activities (does NOT include activities involved in implementing the program such as engaging enrolled schools and service delivery) (please specify)	Total: ____ hours	Total: ____ hours	Total: ____ hours	Total: ____ hours	Total: ____ hours	Total: ____ hours
Total hours per week						

- Calculate the capacity cost rate for staff. Capacity cost rate (CCR) is the cost per hour = ((salary + benefits)/ (hours per week × number of weeks)) × percentage of resource usage. The salary and benefits were based on the proposal budgets submitted by the HRI's to carry out the contract. See Table 59 for an example of capacity cost rates for a CPAN program.
- Confirm the number of staff participating in each aggregated procedure and their CCR and calculate the cost for the procedures. See Figure 42 for an example of the TDABC model personnel cost estimates for a CPAN program. The cost depends on the activity time of the procedure, number of staff required, percentage of resource usage and capacity cost rate.
- Identify the non-personnel resources and costs required for the pre-implementation phase of the programs. Annualize the non-personnel capital cost and apply to the duration of the pre-implementation phase. The following formulas were applied for annualizing the capital costs.

$$AC = [RV - (SV/(1 + R)^N)] * A(R, N)$$

$$A(R, N) = [R(1 + R)^{-N}]/[(1 + R)^{-N} - 1]$$

Where AC is annualized cost, RV is replacement value, SV is scrap value, R is the long-term safe interest rate (U.S. 10 Year Treasury Bills) and N is the expected life of the capital item. Four year life of computer and other equipment, zero scrap value and a one-year pre-implementation period were assumed for this calculation.

- Sum the implementation staff cost and non-personnel fixed cost for the pre-implementation phase of the program. Cost results by HRI for CPAN and TCHAT shown in Tables 60 and 61 and Figures 43 and 44 below.

Table 59. Example of Capacity Cost Rates for One CPAN Program

YEAR	PERIODS	INSTITUTION	CATEGORY	TITLE	CCR
FY20	Year 1	Site 1	CPAN	Psychiatrists - Asst/Assoc	150.2404
FY20	Year 1	Site 1	CPAN	Psychiatrists -Division Head	165.2644
FY20	Year 1	Site 1	CPAN	LCSW - Instructor	40.625
FY20	Year 1	Site 1	CPAN	Gen Admin - Administrator	87.5
FY20	Year 1	Site 1	CPAN	Gen Admin - Grant Admin	62.5
FY20	Year 1	Site 1	CPAN	Gen Admin - Coordinator	40.625
FY20	Year 1	Site 1	CPAN	Gen Admin - Data Manager	56.25
FY20	Year 1	Site 1	CPAN	Gen Admin - HR	37.5
FY20	Year 1	Site 1	CPAN	Gen Admin - Accounting	40.625

Figure 42. Time Driven Activity Based Costing Model Template for CPAN Procedure

Steps	Resource	Percentage of Resource Usage	Estimated Activity Time	Capacity Cost Rate	Total Cost
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Specialist (LCSW)	100%	120	40.625	\$4,875
	Behavioral Health Specialist (LCSW)	100%	124	40.625	\$5,037.5
	Coordinator	100%	10	40.625	\$406.25
	Psychiatrists -Division Head	100%	100	165.26	\$16,526.44
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Specialist (LCSW)	100%	60	40.625	\$2,437.5
	Behavioral Health Specialist (LCSW)	100%	60	40.625	\$2,437.5
	Coordinator	100%	10	40.625	\$406.25
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Specialist (LCSW)	100%	100	40.625	\$4,062.5
	Behavioral Health Specialist (LCSW)	100%	200	40.625	\$8,125
	Coordinator	100%	840	40.625	\$3,4125
	Psychiatrists - Asst/Assoc	100%	100	150.24	\$15,024.03
4. Time spent on other relevant start-up activities	Behavioral Health Specialist (LCSW)	100%	75	40.625	\$3,046.875
	Behavioral Health Specialist (LCSW)	100%	85	40.625	\$3,453.125
	Coordinator	100%	100	40.625	\$4,062.5
	Psychiatrists - Asst/Assoc	100%	75	150.24	\$11,268.03
5. Time spent on other relevant start-up activities	Psychiatrists -Division Head	100%	150	165.26	\$24,789.66

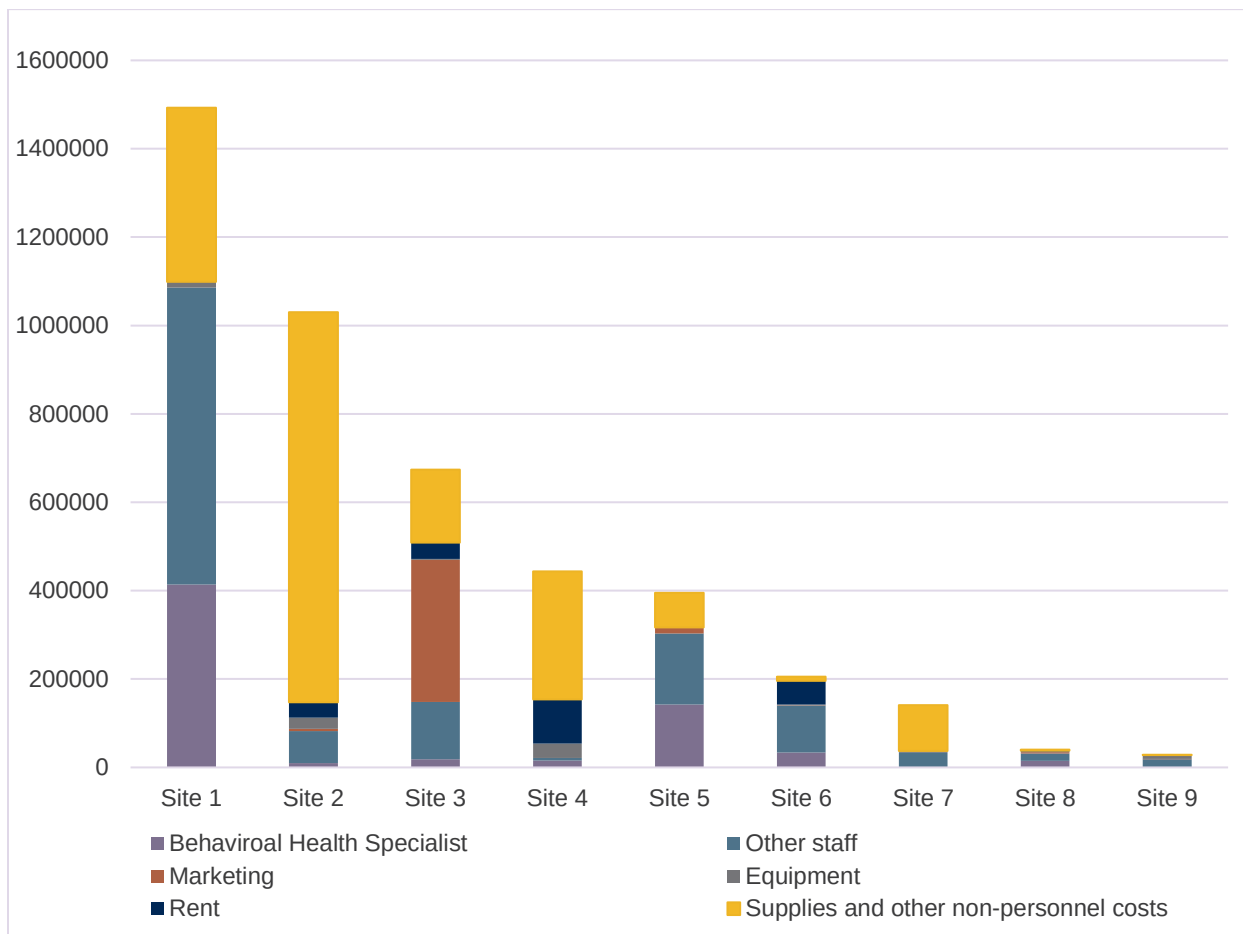
Results

CPAN: Table 60 summarizes the pre-implementation costs for 9 CPAN HRI programs. The average total cost across all 9 programs was \$494,627 with a range from \$28,045 to \$1,492,661. Removing the programs with the lowest and highest costs lowered the average total cost to \$418,705 and narrowed the cost range to \$42,227 --- \$1,030,157. The average cost per clinic enrolled was \$10,011 and with the lowest and highest cost HRI's removed the average cost declined to \$8,284 per clinic enrolled. Site 7 was an outlier with cost per clinic enrolled nearly 4 times the average cost among all sites. Figure 43 further demonstrates substantial differences in resource allocation between personnel, rent, marketing, equipment, and supplies, suggesting fundamental differences in the way the programs tackled the pre-implementation challenges associated with identifying and enrolling the CPAN sites. For example, 95 percent of program 8 investment was non-personnel resources compared to only 20 percent for program 3. Program 2 reported a majority of costs incurred for marketing while other programs did not report marketing costs (detailed spreadsheets for all sites are available in Appendix J).

Table 60. Pre-implementation Costs for 9 CPAN HRI Programs

	Personnel Cost (\$)	Non-personnel Cost (\$)	Total Cost (\$)	Cost Per Clinic Enrolled by HRI (\$)
Site 1	140,083	65,169	205,252	1,936
Site 2	34,775	105,803	140,578	862
Site 3	33,706	8,521	42,227	621
Site 4	303,391	91,863	395,254	3,188
Site 5	18,386	9,659	28,045	355
Site 6	148,109	526,115	674,224	2,983
Site 7	82,362	947,795	1,030,157	42,923
Site 8	21,391	421,855	443,246	5,472
Site 9	1,085,727	406,934	1,492,661	31,759
Average value of the total 9 sites	207,548	287,079	494,627	10,011
Average value excluding lowest and highest costs	109,117	309,589	418,705	8,284

Figure 43. Breakdown of Cost Contributions of 9 CPAN HRI Programs



Supplies and marketing expenses varied substantially among the 9 CPAN programs. Higher expenses were associated with the number of PCPs and clinics in the service area. CPAN clinics located in the rural areas and border cities may require more resources to conduct outreach and higher costs to provide clinical consultation. This finding is consistent with the geographic distribution of clinics enrolled in CPAN across Texas in Figure 6a & 6b. Costs for personnel (including behavioral health specialist and other administrative staff) varied depending on the complexity of the outreach activities and the number of clinics per HRI. Several clinics required more time to connect and deliver presentations before enrollment.

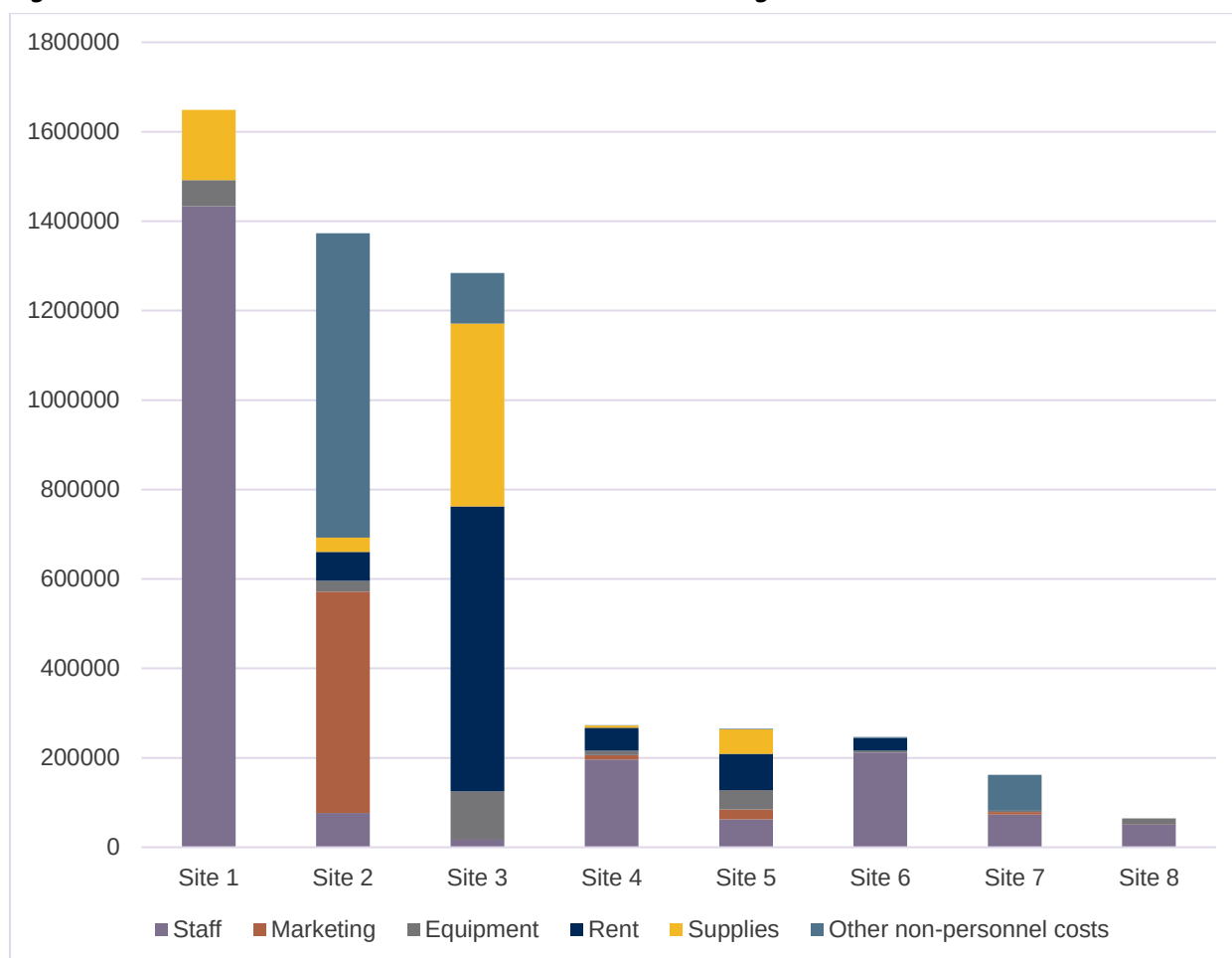
TCHATT: Table 61 and Figure 44 summarize the pre-implementation costs for 8 TCHATT HRI programs. The average cost across all programs was \$664,613 with a range from \$64,325 to \$1,648,861. Removing the programs with the lowest and highest costs lowered the average cost to \$600,619 and narrowed the range to \$161,965 --- \$1,373,009. The average cost per campus enrolled was \$5,095 and with the lowest and highest cost HRI's removed the average cost declined to \$3,925 per campus enrolled. Site 8 was an outlier with cost per campus enrolled nearly 3.2 times the average cost among all sites. The programs also demonstrated substantial differences in their resource allocation between personnel vs. non-personnel resources, suggesting fundamental differences in the way they tackled the pre-implementation challenges associated with identifying and enrolling the TCHATT sites. For example, 98

percent of program 7 investment was non-personnel resources compared to only 14 percent for program 1.

Table 61. Pre-implementation Costs for 8 TCHAT HRI Programs

	Personnel Cost (\$)	Non-personnel Cost (\$)	Total Cost (\$)	Cost Per School Campus Enrolled by HRI (\$)
Site 1	211,980	34,443	246,423	1,760
Site 2	195,869	76,923	272,792	1,705
Site 3	73,178	88,787	161,965	428
Site 4	51,258	13,067	64,325	723
Site 5	76,375	1,296,634	1,373,009	8,581
Site 6	62,322	202,881	265,203	5,100
Site 7	16,664	1,267,660	1,284,324	5,974
Site 8	1,433,213	215,649	1,648,861	16,488.61
Average of the total 8 sites	265,107	399,506	664,613	5,095
Average value excluding the lowest and highest costs	106,065	494,555	600,619	3,925

Figure 44. Breakdown of Cost Contributions of 8 TCHAT HRI Programs



Non-personnel costs including marketing, rent, supplies and equipment (computer and phone system) had a significant variance among 8 TCHAT programs, which may have been driven by the initial availability of resources and the number of school districts and campuses within the region. School

campuses enrolled in the program concentrated in the Houston, Dallas and Austin metropolitan areas shared costs to connect and deliver services (Figure 15), while ISDs in the rural areas may require higher costs to connect and deliver training to school personnel. Costs for personnel varied depending on the complexity of conducting outreach activities, meeting with school district leaders and presentations to TEAs and ISDs (detailed spreadsheets for all sites are available in Appendix J).

Limitations and Next Steps

Time estimates for the TDABC model are rough “order of magnitude” best estimates based on a long recall period (sometimes exceeding one year) necessitated by the late start of the external evaluation. Also, the planning and recruiting activities were still in process for some HRI’s following their “go live” date with the program implementation. Other non-personnel costs were categorized by the respondents who may have differed in the way they described the costs, e.g. marketing cost. Time and other resource data collection will be captured on a more current basis for the implementation phase of the programs to obtain more precise estimates of ongoing resource use and costs for service delivery. In addition, we will delineate resources required by the program that were utilized but not expensed, including space, equipment, and volunteers. These resources represent opportunity costs even though they may not have been tracked in project records. We expect that programs will be more similar in the way they allocate resources for program delivery compared to the pre-implementation activities, although local conditions likely will require different levels of cost and resource allocation. In years 2 and 3, we will use the TDABC methodology to assess the cost of implementing mental health improvement programs (CPAN and TCHATT) and their return on investment.

H. KEY CHALLENGES IDENTIFIED

Below are key challenges that we encountered as part of the external evaluation. Possible solutions are discussed when available.

- No centralized database of TCHATT program school district and school users. Lack of a centralized database of contacts across the TCHATT districts and campus sites delayed surveys with school-site implementers. To compile a directory, our team reached out to main contacts from each of the 12 HRIs and requested complete lists of district-level and campus-level contacts for the districts selected in our survey sample. Only 5 of the 12 HRIs had a main contact for the districts selected in our planned sample. To obtain complete lists for these HRIs, we reached out individually to main contacts from 42 school districts and asked for a list of district and school personnel involved in the TCHATT program from their respective districts. Approximately half of HRI contacts responded (20 of the 42 districts). For the remaining 22 districts, we sent the survey to the main district contact identified by the HRI.
- Duplicate CPAN provider information. Although we obtained a database of CPAN providers, we experienced challenges due to a lack of procedures for data validation. We identified duplicates, including cases where the same people work at multiple campuses, or have multiple roles. We spent a significant amount of time communicating with Trayt managers to determine a process to resolve these cases. This experience led to establishing the data workgroup meetings to discuss data inconsistencies with Trayt encounter and directory extracts.
- Limitations of codebooks for existing data collection systems. Due to the early phase of the Trayt-based data collection system development, we did not have access to a Trayt data dictionary, or codebook required to understand the Trayt data collection system, including to understand available data collected and to interpret Trayt's data count summaries provided. The external evaluation database planning, data extractions, and survey development (to design surveys that complement existing data) was subsequently delayed. We are now engaged with data governance and Trayt stakeholders to streamline our evaluation processes based on existing data.
- Student level vulnerability data limited. Current data limit evaluation in regards to student-specific indicators of vulnerability (e.g., demographic, sex and gender, socio demographic factors, as well as specific exposure factors of potential interest to the Consortium, e.g., COVID-19 pandemic-related trauma).

REFERENCES

1. Mental Health America. Prevalence of Mental Illness 2021. 2021; <https://mhanational.org/issues/2021/mental-health-america-prevalence-data>.
2. Mental Health America. Access to Care Ranking 2021. 2021; <https://mhanational.org/issues/2021/mental-health-america-access-care-data>.
3. USDA Economic Research Service. Rural-Urban Continuum Codes. <https://www.ers.usda.gov/data-products/rural-urban-continuum-codes.aspx>. Accessed October 28, 2021.
4. CDC Agency for Toxic Substances and Disease Registry. CDC/ATSDR Social Vulnerability Index. <https://www.atsdr.cdc.gov/placeandhealth/svi/index.html>.
5. Walker TJ, Brandt HM, Wandersman A, et al. Development of a comprehensive measure of organizational readiness (motivation x capacity) for implementation: a study protocol. *Implement Sci Commun*. 2020;1(1):103.
6. Scaccia JP, Cook BS, Lamont A, et al. A practical implementation science heuristic for organizational readiness: R = MC(2). *J Community Psychol*. 2015;43(4):484-501.
7. Walker TJ, Risendal B, Kegler MC, et al. Assessing Levels and Correlates of Implementation of Evidence-Based Approaches for Colorectal Cancer Screening: A Cross-Sectional Study With Federally Qualified Health Centers. *Health Educ Behav*. 2018;45(6):1008-1015.
8. Livet M, Yannayon M, Richard C, Sorge L, Scanlon P. Ready, set, go!: exploring use of a readiness process to implement pharmacy services. *Implement Sci Commun*. 2020;1:52.
9. Archbold T. The Psychiatric Assistance Line: Six-Month Follow-up on Consultations to Primary Care. *Minn Med*. 2016;99(8):49-50.
10. Kaye DL, Fornari V, Scharf M, et al. Description of a multi-university education and collaborative care child psychiatry access program: New York State's CAP PC. *Gen Hosp Psychiatry*. 2017;48:32-36.
11. Minnesota Department of Health. 2018 Minnesota Health IT Clinic Survey. 2018; <https://www.health.state.mn.us/facilities/ehealth/assessment/docs/survey2018clinic.pdf>.
12. Hsieh HF, Shannon SE. Three approaches to qualitative content analysis. *Qual Health Res*. 2005;15(9):1277-1288.
13. Imm P, Williams A, Hyde J, Wandersman A. An organizational readiness lens for implementing the risk-need-responsivity model. *Federal Probation*. 2020;84(2):23-29.
14. Domlyn AM, Wandersman A. Community coalition readiness for implementing something new: Using a Delphi methodology. *J Community Psychol*. 2019;47(4):882-897.
15. NNCPAP. National Network of Child Psychiatry Access Programs. <https://nncpap.org>. Accessed October 28, 2021.
16. Sarvet B, Gold J, Bostic JQ, et al. Improving access to mental health care for children: the Massachusetts Child Psychiatry Access Project. *Pediatrics*. 2010;126(6):1191-1200.
17. Hilt RJ, Romaine MA, McDonnell MG, et al. The Partnership Access Line: evaluating a child psychiatry consult program in Washington State. *JAMA Pediatr*. 2013;167(2):162-168.
18. Hilt RJ, Barclay RP, Bush J, Stout B, Anderson N, Wignall JR. A Statewide Child Telepsychiatry Consult System Yields Desired Health System Changes and Savings. *Telemed J E Health*. 2015;21(7):533-537.
19. Szczygiel L, Sharillo E, Pirard S, Plant R. Access Mental Health Annual Progress Report. SFY: July 1, 2018 - June 30, 2019.: Report prepared by Beacon Health Options for the Department of Children and Families;2019.
20. Holt W. The Massachusetts Child Psychiatry Access Project: Supporting Mental Health Treatment in Primary Care. The Commonwealth Fund;March 2010.
21. Kaplan RS, Witkowski M, Abbott M, et al. Using time-driven activity-based costing to identify value improvement opportunities in healthcare. *J Healthc Manag*. 2014;59(6):399-412.

Appendix A. Process Mapping Interview Guides

CPAN HRI INTERVIEW GUIDE

Introduction (Led by Interviewer)

Welcome and good (morning/afternoon/evening). Thank you for taking the time to participate in this interview. My name is _____, and I am part of the External Evaluation team for the Texas Child Mental Health Care Consortium. With me is _____, who will be taking notes. The overall goal of the external evaluation is to provide policymakers and Consortium members with evidence-based recommendations to guide ongoing quality improvement and decision making for future program implementation and dissemination planning. The first step in our evaluation plan for CPAN is to conduct stakeholder interviews with informants from each HRI and a diverse sample of 20 clinic sites. Feedback from this interview will be used to create a process map that describes implementation practices for the CPAN program at your HRI. Your participation is voluntary, and you may stop participating in the interview at any point. A decision not to take part or to stop being a part of the interview will not affect your participation in the CPAN program. With your permission, we will be audio recording this interview so that we do not miss any of your comments. Is it OK to record our discussion?

A generic process flow for CPAN was sent to you to use as a reference during this interview. Do you have this on hand?

If YES: Great. Please refer to this process flow throughout the interview and point out anything that looks similar or different to how the process actually works at your HRI.

If NO: OK, I will share the process flow so you can view it throughout the interview. Please point out anything that looks similar or different to how the process actually works at your HRI.

Interview Questions

Program Awareness

Please refer to the green part of the process flow for these questions

- 1) What outreach strategies do you use to increase awareness about the CPAN program among clinics and providers?
 - a. *Probe:* How did you identify potential participants in your target area?
 - b. *Probe:* Do you target specific PCPs or clinics?
 - c. *Probe:* What materials are used for outreach?
 - d. *Probe:* How are you using social media for outreach?
 - e. *Probe:* How much do materials cost?
 - f. *Probe:* How do you know a PCP or clinic is interested?
 - g. *Probe:* Who manages and implements the outreach? What is their job title?
 - h. *Probe:* How much time is spent on outreach?

- 2) Who designed your outreach approach?
 - a. *Probe:* What is their job title?
 - b. *Probe:* Why were they chosen to design the outreach approach?
 - c. *Probe:* How much time was spent on designing your outreach approach?

Program Adoption

Please refer to the yellow part of the process flow for these questions

- 3) What steps do you take to enroll new PCPs and clinics?
 - a. *Probe:* What materials do you provide to newly enrolled PCPs and clinics?
 - b. *Probe:* Who is in contact with clinics during the enrollment process? What is their job title?
 - c. *Probe:* How much time does it take to enroll a new PCP or clinic?

Training

Please refer to the pink part of the process flow for these questions

- 4) How are newly enrolled clinics trained on the CPAN program?
 - a. *Probe:* Who delivers the training? What is their job title?
 - b. *Probe:* Who attends the training? What are their job titles?
 - c. *Probe:* How long are the trainings?

Program Engagement

- 5) Describe your process for engaging PCPs who have enrolled in the program?
 - a. *Probe:* How do you reach out to them after enrollment to remind them about the program and services you provide?

Service Delivery

Please refer to the purple part of the process flow for these questions

- 6) What is the process for answering calls from the PCPs as the calls come in to the CPAN Hub?
 - a. *Probe:* Who answers calls? What is their job title?
- 7) What is the process for returning missed calls to the CPAN Hub?
 - b. *Probe:* Who returns missed calls? What is their job title?

- 8) What is the process for collecting and documenting information about patients?
What are the specific steps?
- Probe:* Who collects information about patients? What is their job title?
 - Probe:* Do you need to obtain patient consent? If so, describe the process for doing this.
- 9) What is the process by which psychiatrists and behavioral health consultants are involved during the consultation?
- Probe:* Who is their first point of contact?
 - Probe:* How are psychiatrists or behavioral health consultants assigned to calls?
 - Probe:* Who assigns psychiatrists or behavioral health consultants to calls? What is their job title?
 - Probe:* Who determines whether a consultation requires a psychiatrist or behavioral health consultants review?
 - Probe:* How is information communicated between individuals involved in the consultation?
- 10) What is the process for reviewing medication with the PCP?
- Probe:* Who reviews medication prescribed to the child/youth? What is their job title?
- 11) What is the process for explaining behavioral interventions with the PCP?
- Probe:* Who discusses the behavioral interventions with the PCP? What is their job title?
- 12) What is the process for collecting and recording consultation data between the PCP and psychiatrist or behavioral health consultants?
- Probe:* Who interacts with the data collection system (Trayt or otherwise)? What is their job title?

Referrals

Please refer to the red part of the process flow for these questions

- 13) What is the process for identifying and deciding on a referral for a given patient?
- Probe:* Who decides on the appropriate referral? What is their job title?
- 14) What is the process for making a referral?
- Probe:* Who communicates the referral to the PCP/clinic staff? What is their job title?

- b. *Probe*: How are the referral services documented?
 - c. *Probe*: Who documents the referral services? What is their job title?
 - d. *Probe*: How is information shared back with the PCP?
- 15) What is the process for maintaining connection to referral partners in the community?
- a. *Probe*: Who works to identify and remain connected to community referral partners? What is their job title?
- 16) Is there anything else that you would like to share that might help us to better understand the process by which the CPAN program is implemented at your HRI? If so, please describe.

Closing

Thank you for taking the time to talk with us today! Your feedback is very valuable to our evaluation. Someone from our external evaluation team will follow up with a redesigned process map to confirm accuracy. You will be provided with a \$50 Amazon gift card in appreciation of your time. The gift card will be delivered to you via email within the next 2 weeks. If you have any questions, feel free to reach out to our project director, Erica Frost [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

TCHAT HRI INTERVIEW GUIDE

Introduction (Led by Interviewer)

Welcome and good (morning/afternoon/evening). Thank you for taking the time to participate in this interview. My name is _____, and I am part of the External Evaluation team for the Texas Child Mental Health Care Consortium. With me is _____, who will be taking notes. The overall goal of the external evaluation is to provide policymakers and Consortium members with evidence-based recommendations to guide ongoing quality improvement and decision making for future program implementation and dissemination planning. The first step in our evaluation plan for TCHAT is to conduct stakeholder interviews with informants from each HRI and a diverse sample of 20 school districts. Feedback from this interview will be used to create a process map that describes implementation practices for the TCHAT program at your HRI. Your participation is voluntary, and you may stop participating in the interview at any point. A decision not to take part or to stop being a part of the interview will not affect your participation in the TCHAT program. With your permission, we will be audio recording this interview so that we do not miss any of your comments. Is it OK to record our discussion?

A generic process flow for TCHAT was sent to you to use as a reference during this interview. Do you have this on hand?

If YES: Great. Please refer to this process flow throughout the interview and point out anything that looks similar or different to how the process actually works at your HRI.

If NO: OK, I will share the process flow so you can view it throughout the interview. Please point out anything that looks similar or different to how the process actually works at your HRI.

Interview Questions

Program Awareness

Please refer to the green part of the process flow for these questions

- 1) What outreach strategies do you use to increase awareness about the TCHAT program among school districts?
 - a. *Probe:* How did you determine which school districts to recruit?
 - b. *Probe:* What materials are used for outreach?
 - c. *Probe:* How are you using social media for outreach?
 - d. *Probe:* How much do materials cost?
 - e. *Probe:* How do you know a school district is interested?
 - f. *Probe:* Who manages and implements the outreach? What is their job title?
 - g. *Probe:* How much time is spent on outreach?

- 2) Who designed your outreach approach?
 - a. *Probe:* What is their job title?
 - b. *Probe:* Why were they chosen to design the outreach approach?
 - c. *Probe:* How much time was spent on designing your outreach approach?

Program Adoption

Please refer to the yellow part of the process flow for these questions

- 3) What steps do you take to enroll new school districts?
 - a. *Probe:* Can school districts verbally agree, or do they all have to complete the MOU?
 - b. *Probe:* What materials do you provide to newly enrolled school districts?
 - c. *Probe:* Who is in contact with school districts during the MOU process? What is their job title?
 - d. *Probe:* How much time does it take to enroll a new school district?

Training

Please refer to the pink part of the process flow for these questions

- 4) How are newly enrolled school districts trained on the TCHATT program?
 - a. *Probe:* Who delivers the training? What is their job title?
 - b. *Probe:* Who attends the training? What are their job titles?
 - c. *Probe:* How long are the trainings?

Referrals

Please refer to the purple part of the process flow for these questions

- 5) What is the process for receiving referrals?
 - a. *Probe:* Who is responsible for receiving referrals? What is their job title?
 - b. *Probe:* What are the steps to enroll students?
 - c. *Probe:* Who is responsible for enrolling students? What is their job title?
 - d. *Probe:* What information are patients/parents provided during the enrollment process?
 - e. *Probe:* Who communicates with patients/parents during the enrollment process? What is their job title?

Parent Consent

Please refer to the red part of the process flow for these questions

- 6) What is the process for obtaining parent consent?

- a. *Probe:* Who administers and collects parent consent? What is their job title?
- b. *Probe:* How does the parent provide consent?
- c. *Probe:* How is consent documented?

Service Delivery

Please refer to the blue part of the process flow for these questions

- 7) What is the process for getting the student to the telehealth visit?
 - c. *Probe:* Who is responsible for coordinating, scheduling, and reminding participants? What is their job title?
 - d. *Probe:* Describe anything else that the patient/parent needs to complete prior to attending the telehealth visit.
- 8) Describe a typical telehealth visit.
 - a. *Probe:* Which HRI staff are involved in the telehealth visit?
 - b. *Probe:* Do parents normally participate in visit?
 - c. *Probe:* How is the visit documented?
 - d. *Probe:* Who documents the visit? What is their job title?
 - e. *Probe:* Do the above vary depending on which visit it is (e.g., 1st visit vs fourth visit)?
- 9) What is the process for diagnosing students and providing ongoing care recommendations?
 - a. *Probe:* Who reviews diagnoses and ongoing care recommendations? What is their job title?
 - b. *Probe:* What is the process for collecting and recording assessment data?
 - c. *Probe:* Who collects and records data from the assessment? What is their job title?

Follow Up

Please refer to the gray part of the process flow for these questions

- 10) How is need for follow-up visits determined?
 - b. *Probe:* Who schedules follow-up visits? What is their job title?

Results and Ongoing Care

Please refer to the orange part of the process flow for these questions

- 11) How is the need for ongoing care determined?
 - a. *Probe:* Who makes the determination?

- b. *Probe:* How are referrals for ongoing care made?
 - c. *Probe:* Who develops ongoing care referrals? What is their job title?
 - d. *Probe:* How is referral information documented?
 - e. *Probe:* What happens in the case that ongoing care is not recommended?
- 12) How are diagnostic results communicated to parents?
- a. *Probe:* Who delivers these results to parents? What is their job title?
 - b. *Probe:* How is this communication documented?
 - c. *Probe:* How do you ensure that parents are supported in carrying out the plan?
- 13) Is there anything else that you would like to share that might help us to better understand the process by which the TCHAT program is implemented at your HRI? If so, please describe.

Closing

Thank you for taking the time to talk with us today! Your feedback is very valuable to our evaluation. You will be provided with a \$50 Amazon gift card in appreciation of your time. The gift card will be delivered to you via email within the next 2 weeks. If you have any questions, feel free to reach out to our project director, Erica Frost [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

CPAN CLINIC INTERVIEW GUIDE

Introduction (Led by Interviewer)

Welcome and good (morning/afternoon/evening). Thank you for taking the time to participate in this interview. My name is _____, and I am part of the External Evaluation team for the Texas Child Mental Health Care Consortium. With me is _____, who will be taking notes. The overall goal of the external evaluation is to provide policymakers and Consortium members with evidence-based recommendations to guide ongoing quality improvement and decision making for future program implementation and dissemination planning. The first step in our evaluation plan for CPAN is to conduct stakeholder interviews with informants from each health-related institution (HRI) and a diverse sample of 12 clinic sites. Feedback from this interview will be used to create a process map that describes implementation practices for the CPAN program at your clinic. Your participation is voluntary, and you may stop participating in the interview at any point. A decision not to take part or to stop being a part of the interview will not affect your participation in the CPAN program. With your permission, we will be audio recording this interview so that we do not miss any of your comments. Is it OK to record our discussion?

A generic process flow for CPAN was sent to you to use as a reference during this interview. Do you have this on hand?

If YES: Great. Please refer to this process flow throughout the interview and point out anything that looks similar to or different than how the process actually works at your clinic.

If NO: OK, I will share the process flow so you can view it throughout the interview. Please point out anything that looks similar to or different than how the process actually works at your clinic.

Interview Questions

Program Awareness

Please refer to the green part of the process flow for these questions

- 1) Describe your first exposure to the CPAN program?
 - a. *Probe:* How did your clinic first hear about the CPAN program (e.g., by phone, email, or fax)?
 - b. *Probe:* Who at your clinic was contacted by the HRI? What is their job title?
 - c. *Probe:* What material did you receive about the CPAN program?

Program Adoption

Please refer to the yellow part of the process flow for these questions

- 2) Describe the decision making process for adopting the CPAN program.
 - a. *Probe:* Who at the clinic-level decided the clinic should enroll? What is their job title?
 - b. *Probe:* What factors were considered when making the decision? (look for responses that speak to patient demographics, clinic capacity/bandwidth)
 - c. *Probe:* Who was involved in enrolling your clinic? What is their job title?
 - d. *Probe:* What did the enrollment process entail?
 - e. *Probe:* What material did you receive after enrolling?

Training

Please refer to the red part of the process flow for these questions

- 3) How did your clinic become trained on the CPAN program?
 - a. *Probe:* Who conducted the training? What is their job title?
 - b. *Probe:* Who receives the training? What are their job titles?
 - c. *Probe:* How long are the trainings?

Engagement

Please refer to the purple part of the process flow for these questions

- 4) Describe any communication you have received from the HRI following enrollment.
 - a. *Probe:* Do you receive any regular communication or updates about the program (e.g., through newsletters?)
 - b. Have you received any additional training or support from the HRI?

Utilizing CPAN Service

- 5) Have you utilized the CPAN service in your clinic?

If Yes: Skip to Service Delivery section below.

*If No: What barriers to adopting the CPAN program have you encountered?
[END INTERVIEW]*

Service Delivery

Please refer to the blue part of the process flow for these questions

- 6) What is the process for initiating a CPAN consultation?
 - e. *Probe:* Who can decide to initiate a consultation? What are their job titles?
 - f. *Probe:* Who can place the initial call to the CPAN Hub? What are their job titles?
 - g. *Probe:* What information is provided to the HRI prior to the consultation?

- 7) What information is the patient/parent given about the CPAN consultation?
 - a. *Probe:* Who discusses this with the patient/parent? What is their job title?
- 8) How does the PCP interact with the psychiatrist, if a consultation from a psychiatrist is needed?
 - b. *Probe:* What is discussed during the consultation?
 - c. *Probe:* Are any other clinic staff involved in the consultation besides the PCP?
 - d. *Probe:* Who documents consultation notes, diagnoses, and recommendations?
 - e. *Probe:* Where are consultation notes, diagnoses, and recommendations documented?
 - f. *Probe:* What happens if a consultation from a psychiatrist is not needed?
- 9) What happens after the consultation?
 - g. *Probe:* What is the process for following up with the patient/parent following the consultation?

Referrals

Please refer to the orange part of the process flow for these questions

- 10) Have you ever received a referral for a patient through CPAN?

If Yes: Continue to question 11.

If No: Skip to question 13.
- 11) What is the process for obtaining patient referrals through CPAN?
 - c. *Probe:* Who calls the CPAN Hub to obtain the referral?
 - d. *Probe:* How are referrals shared with clinics?
 - e. *Probe:* Who documents the referral information provided by the CPAN Hub?
 - f. *Probe:* Where is referral information documented?
- 12) How are referrals delivered to patients/parents?
 - e. *Probe:* Who provides the referral to the patient/parent? What is their job title?
 - f. *Probe:* What is the process for documenting referrals given to the patient/parent?
 - b. *Probe:* What does the clinic do next to support families who receive a referral for their child?

- 13) Is there anything else that you would like to share that might help us to better understand the process by which the CPAN program is implemented at your clinic? If so, please describe.

Closing

Thank you for taking the time to talk with us today! Your feedback is very valuable to our evaluation. You will be provided with a \$50 Amazon gift card in appreciation of your time. The gift card will be delivered to you via email within the next 2 weeks. If you have any questions, feel free to reach out to our program manager, Erica Frost [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

TCHATT SCHOOL DISTRICT INTERVIEW GUIDE

Introduction (Led by Interviewer)

Welcome and good (morning/afternoon/evening). Thank you for taking the time to participate in this interview. My name is _____, and I am part of the External Evaluation team for the Texas Child Mental Health Care Consortium. With me is _____, who will be taking notes. The overall goal of the external evaluation is to provide policymakers and Consortium members with evidence-based recommendations to guide ongoing quality improvement and decision making for future program implementation and dissemination planning. The first step in our evaluation plan for TCHATT is to conduct stakeholder interviews with informants from each health-related institution (HRI) and a diverse sample of 12 school districts. Feedback from this interview will be used to create a process map that describes implementation practices for the TCHATT program in your school district. Your participation is voluntary, and you may stop participating in the interview at any point. A decision not to take part or to stop being a part of the interview will not affect your participation in the TCHATT program. With your permission, we will be audio recording this interview so that we do not miss any of your comments. Is it OK to record our discussion?

A generic process flow for TCHATT was sent to you to use as a reference during this interview. Do you have this on hand?

If YES: Great. Please refer to this process flow throughout the interview and point out anything that looks similar to or different than how the process actually works at your school district.

If NO: OK, I will share the process flow so you can view it throughout the interview. Please point out anything that looks similar to or different than how the process actually works at your school district.

Interview Questions

Program Awareness

Please refer to the green part of the process flow for these questions

- 1) Describe your first exposure to the TCHATT program.
 - a. *Probe:* How did your school district first hear about the TCHATT program (e.g., by phone, email, or flyer)?
 - b. *Probe:* Who was contacted by the HRI? What is their job title?
 - c. *Probe:* What material did you receive about the TCHATT program?

Program Adoption

Please refer to the yellow part of the process flow for these questions

- 2) Describe the decision-making process for adopting the TCHAT program.
 - a. *Probe:* Who at the district-level decided the district should enroll? What is their job title?
 - b. *Probe:* Who was involved in enrolling your school district? What is their job title?
 - c. *Probe:* Please describe any support that you received to help with program adoption.

- 3) How do you decide which schools will receive TCHAT services?
 - a. *Probe:* Who decides which schools will receive TCHAT services? What is their job title?
 - b. *Probe:* What school characteristics do you consider when deciding who will receive TCHAT services?
 - c. *Probe:* In your experience, are there school characteristics that lend itself more to being able to implement TCHAT services in the school?

Training for Program Implementers

Please refer to the red part of the process flow for these questions

- 4) How do district and school staff become trained on the TCHAT program?
 - a. *Probe:* Who delivers the training? What is their job title?
 - b. *Probe:* Which district and school staff are trained? What are their job titles?

Utilizing TCHAT Services

- 5) Are you currently utilizing TCHAT services in your school district?

If Yes: Skip to Interviewer script below.

If No: What barriers to adopting the TCHAT program have you encountered? [END INTERVIEW]

Interviewer: Now we are going to talk about program activities. An activity is a work task performed as part of the overall program, from identifying students in need for a mental health referral to completion of mental health consults.

Referrals

Please refer to the purple part of the process flow for these questions

- 6) What is the process for ensuring each staff member at the school knows how to refer a student for a mental health referral?

- 7) What is the process for making a TCHATT referral?
- a. *Probe:* Who is responsible for identifying students in need of TCHATT services? What is their job title?
 - b. *Probe:* Who creates/sends the referral to the HRI? What is their job title?
 - c. *Probe:* Can you describe a process for ensuring all students have equal access to TCHATT services?
 - d. *Probe:* What barriers have you experienced to completing the referral processes?
- 8) What is the process for obtaining parent consent?
- d. *Probe:* When is parental consent obtained?
 - e. *Probe:* Who administers and collects parent consent? What is their job title?
 - f. *Probe:* Is there a translator available for families who do not speak English?
 - g. *Probe:* What materials are provided to parents/legal guardians with the consent information? What language(s) are used in the materials?
 - h. *Probe:* How does the parent provide consent?
 - i. *Probe:* How is consent documented?
 - j. *Probe:* What happens if parents refuse? Do you document the reason for refusal?
- 9) What information is the student/parent provided during the referral process?
- a. *Probe:* Who communicates with students/families during the referral process? What is their job title?
- 10) What happens after a referral was made?
- a. *Probe:* Is someone at the school responsible for following up with the student/family to make sure they get connected to TCHATT?
 - b. *Probe:* Who is responsible for this? What is their job title?

Service Delivery

Please refer to the blue part of the process flow for these questions

- 11) What is the process for providing patient information to the TCHATT HRI prior to the first assessment?
- h. *Probe:* Who is responsible for retrieving and providing patient information? What is their job title?
 - i. *Probe:* Describe anything else that the patient/parent needs to complete prior to attending the telehealth visit.

- 12) What is the process for getting the student to the telehealth visit?
- f. *Probe:* Which school staff are involved in coordinating, scheduling, and reminding students about the visit? What are their job titles?
- 13) What does the school do to facilitate the telehealth visit?
- c. *Probe:* Which school staff are involved? What is their job title?
 - d. *Probe:* How does the school document the telehealth visit?
 - e. *Probe:* Who documents the telehealth visit? What is their job title?
 - f. *Probe:* Describe how this varies depending on which visit is being conducted.
- 14) Describe the parents' involvement in the telehealth visit. How does this vary by which visit is being conducted?
- a. *Probe:* In situations where parents do not speak English, how is this handled during the visit?
 - b. *Probe:* In situations where parents have limited access to the internet, how is this handled to complete a telehealth visit?
 - c. *Probe:* How do you deal with transportation or scheduling barriers to parent participation?
- 15) What do schools do to track follow-up TCHAT visits?
- g. *Probe:* Who tracks follow-up visits? What is their job title?

Results and Ongoing Care

Please refer to the orange part of the process flow for these questions

- 16) What happens after the last TCHAT visit?
- a. *Probe:* Do schools receive a patient report from the HRI? If so, what information is included in the report?
 - b. *Probe:* Does the school help facilitate ongoing care? If so, how?
- 17) Is there anything else that you would like to share that might help us to better understand the process by which the TCHAT program is implemented at your school district? If so, please describe.

Closing

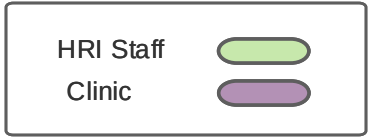
Thank you for taking the time to talk with us today! Your feedback is very valuable to our evaluation. We would like to provide each of you with a \$50 Amazon gift card in

appreciation of your time. However, we realize that school districts have different policies on receiving incentives. Do you know if you are able to accept these gift cards?

If YES: Great. The gift card will be delivered to you via email within the next 2 weeks. If you have any questions, feel free to reach out to our program manager, Erica Frost [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

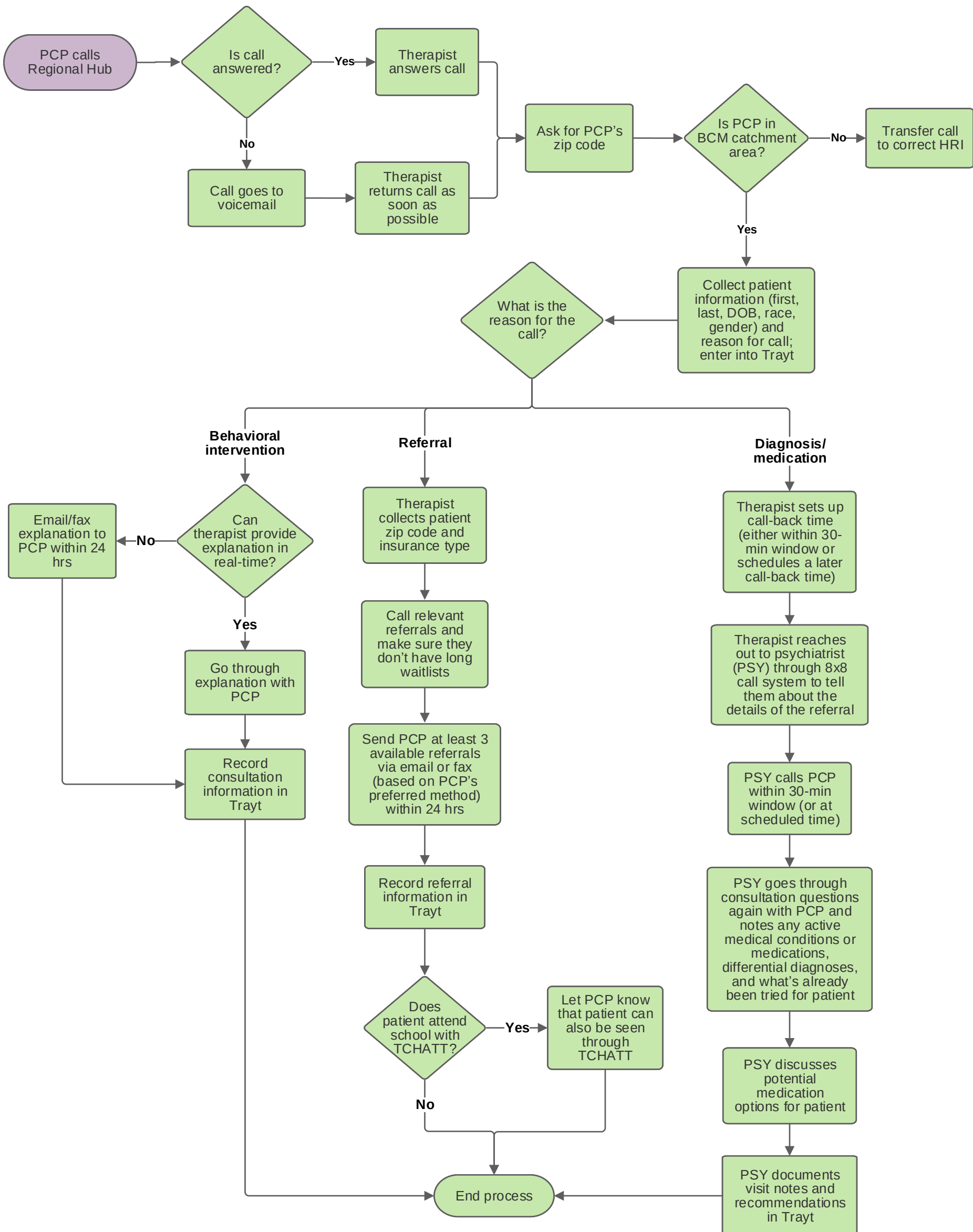
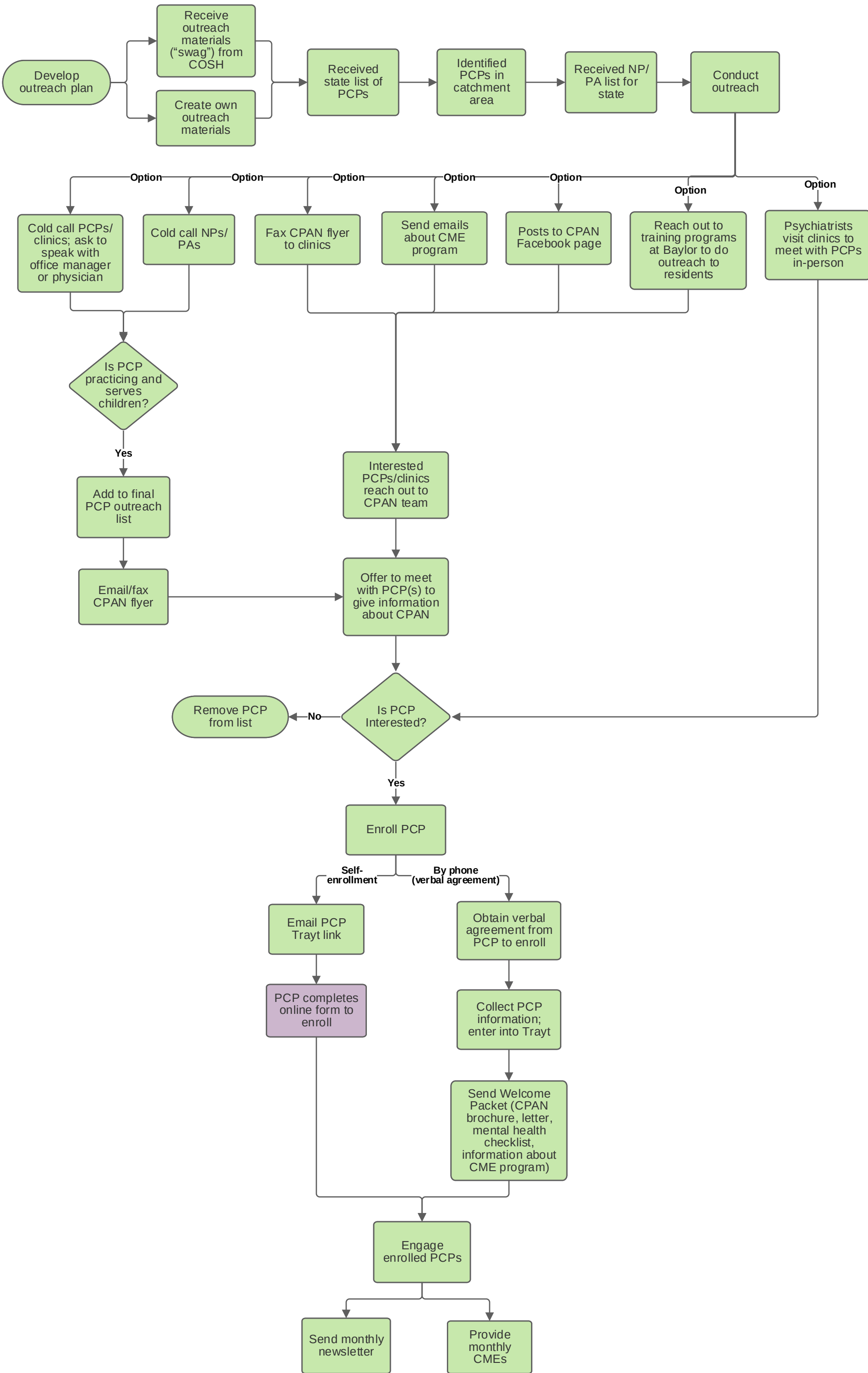
If NO: We understand. We may have the capacity to share these incentives with schools and districts in other ways. I will notify Erica Frost, our program manager, and she will follow up with you about this. Please also feel free to reach out to Erica if you have any other questions [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

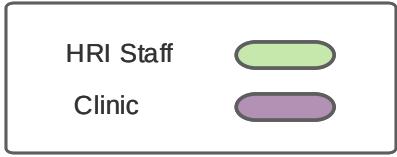
Appendix B. Process Maps



BCM CPAN Process Flow

TCMHCC EE Team

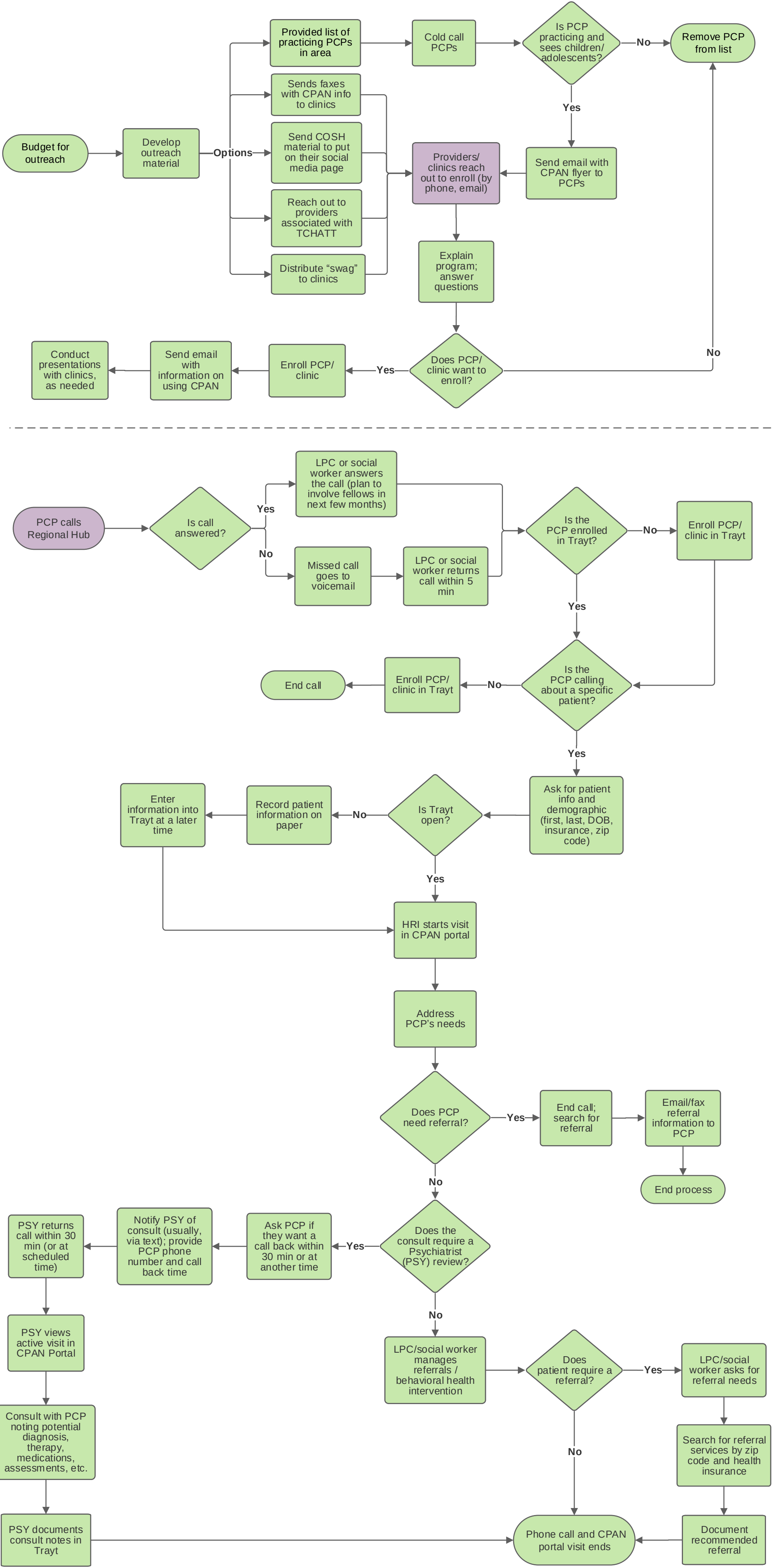


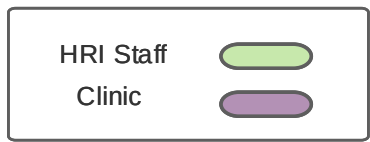


TAMUHSC CPAN Process Flow

TCMHCC EE Team

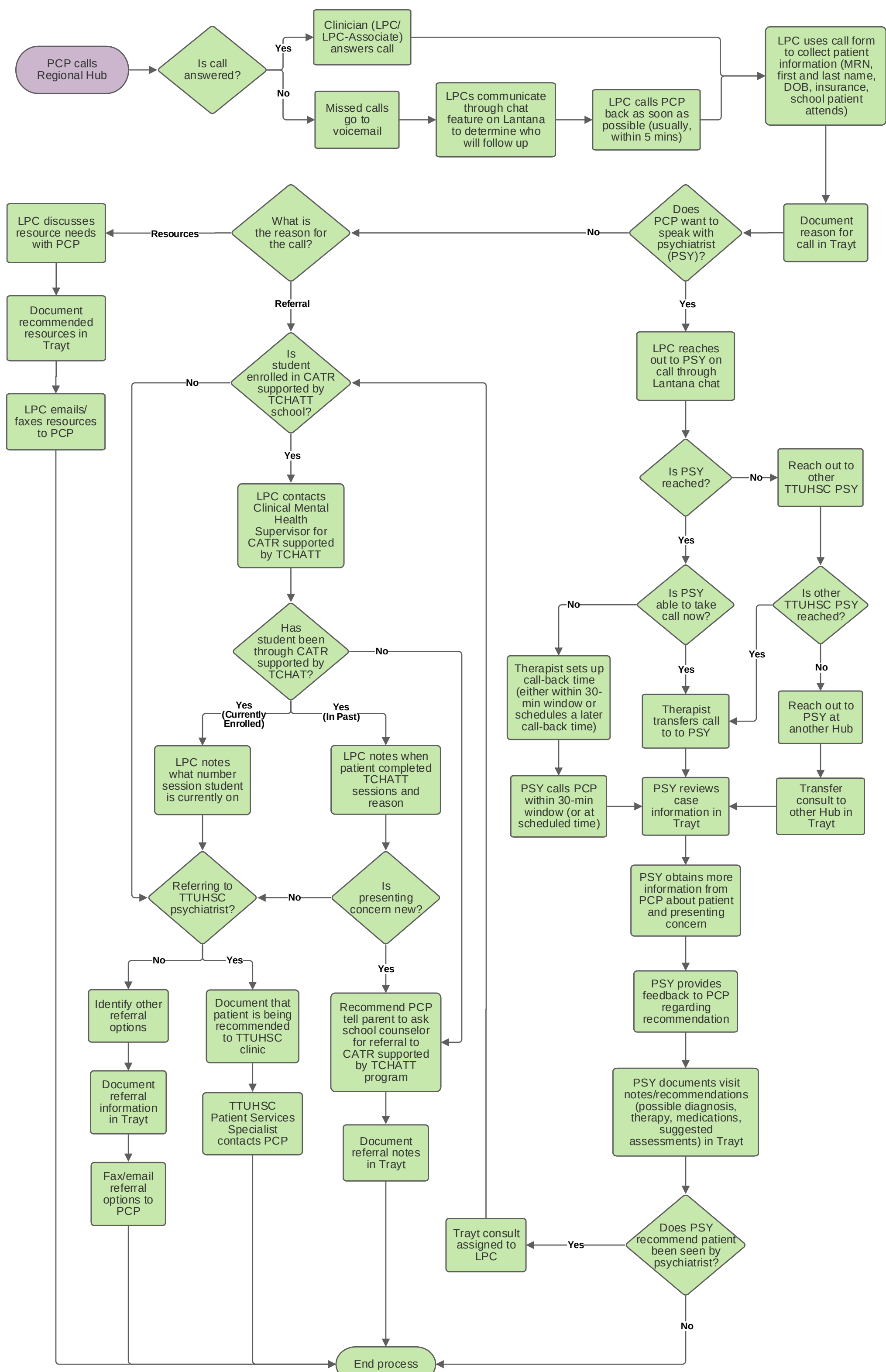
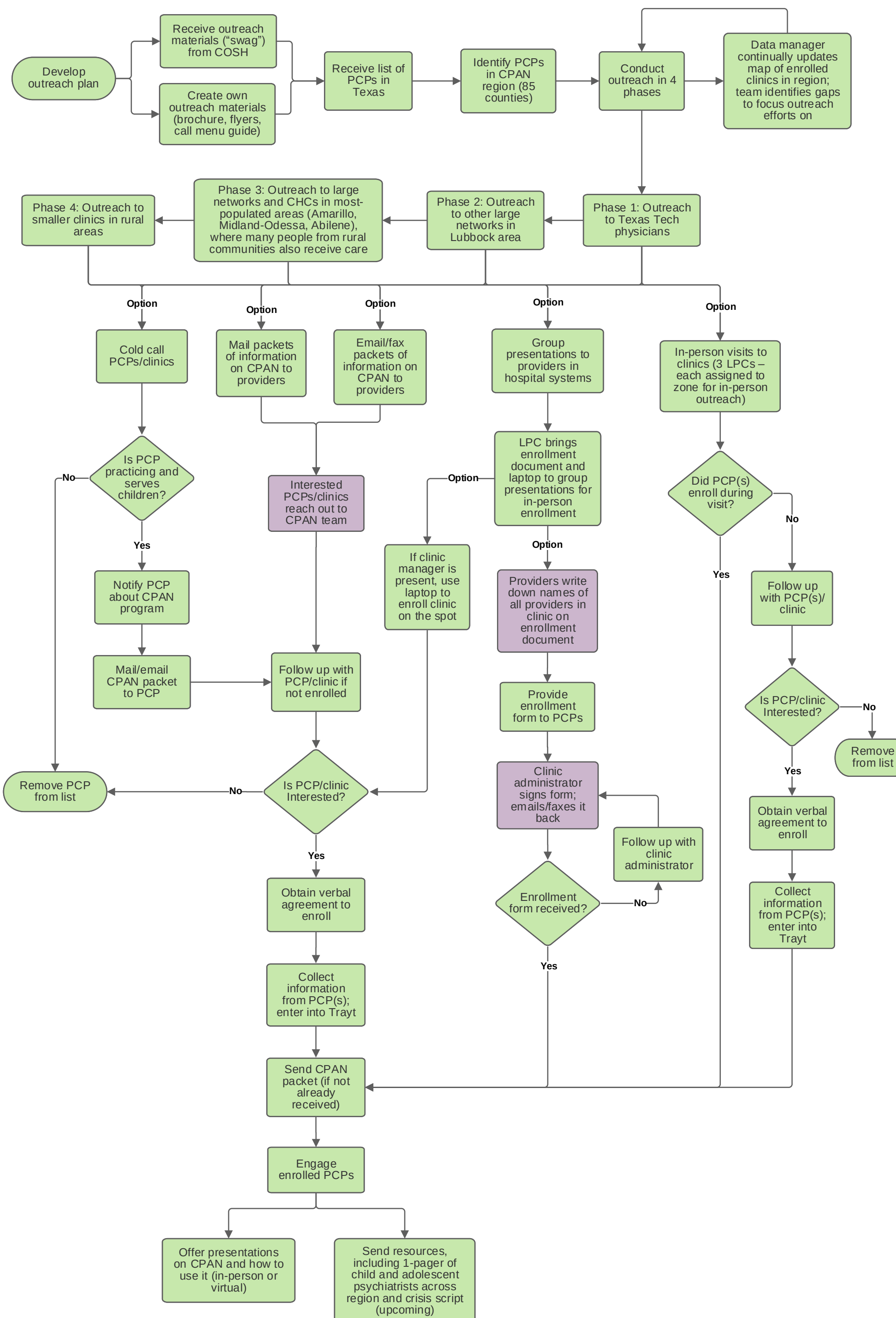
NOTE: HRI has only been live for a few weeks at time of interview





TTUHSC CPAN Process Flow

TCMHCC EE Team



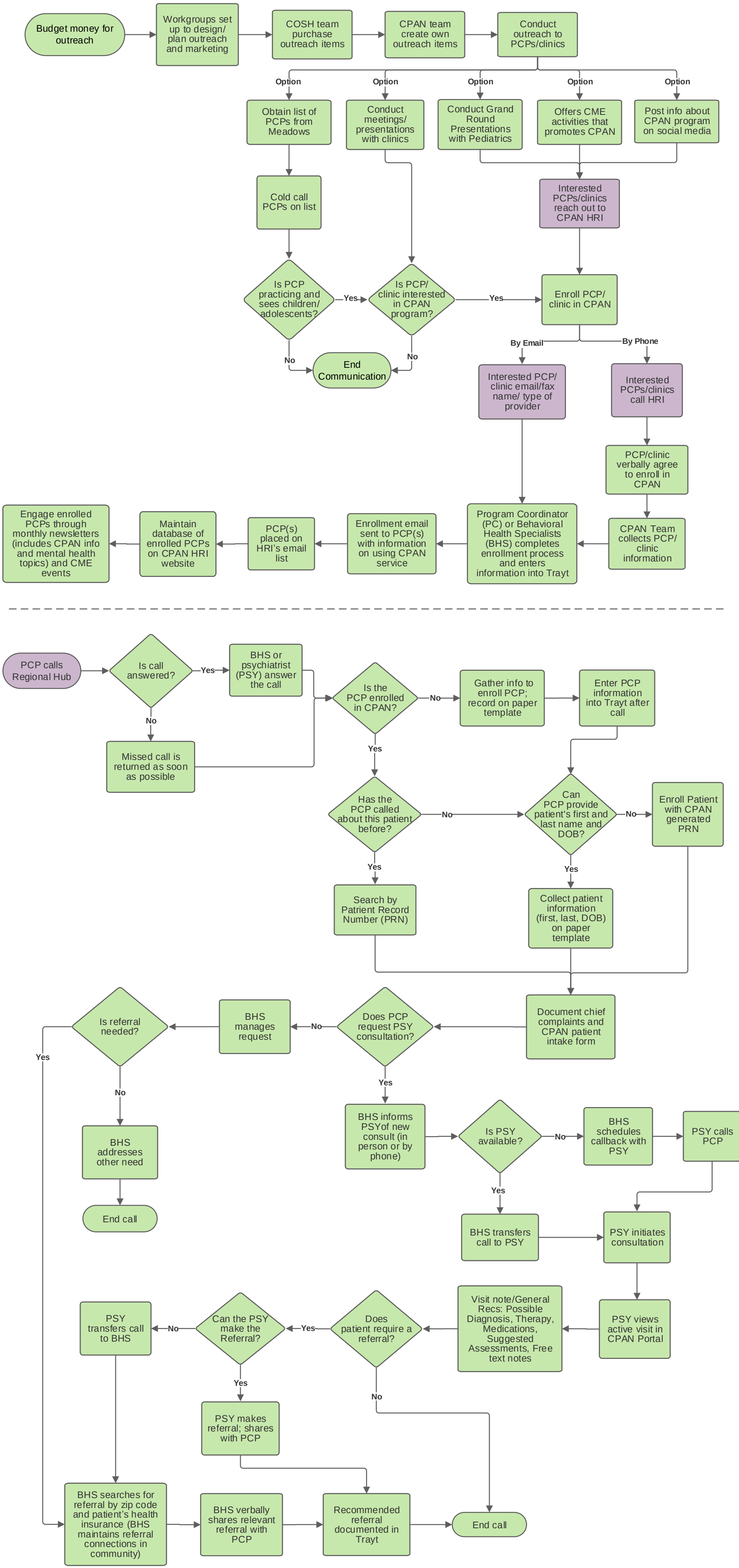
TTUHSCEP CPAN Process Flow

TCMHCC EE Team

HRI Staff



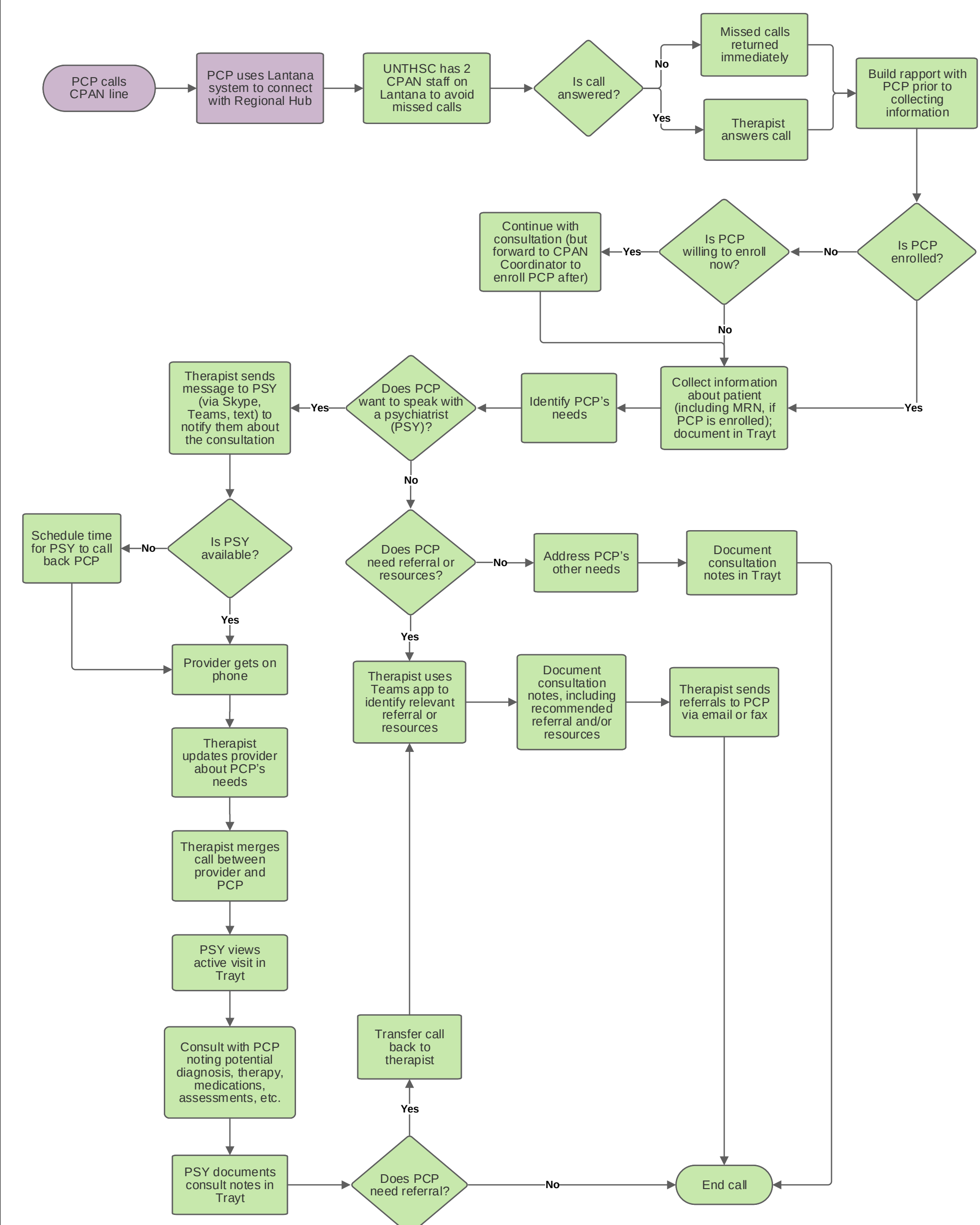
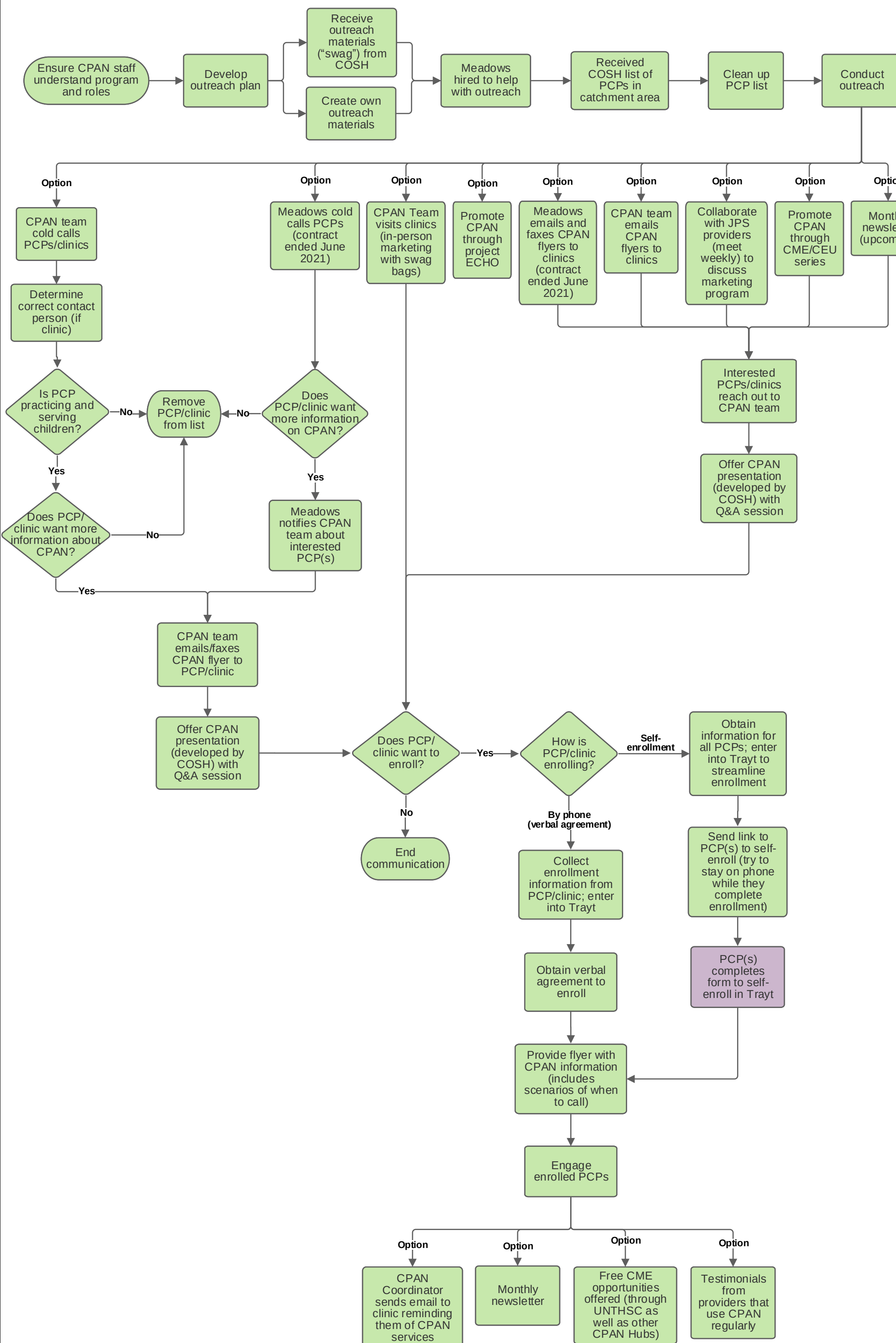
Clinic



UNTHSC CPAN Process Flow

TCMHCC EE Team

HRI Staff
Clinic

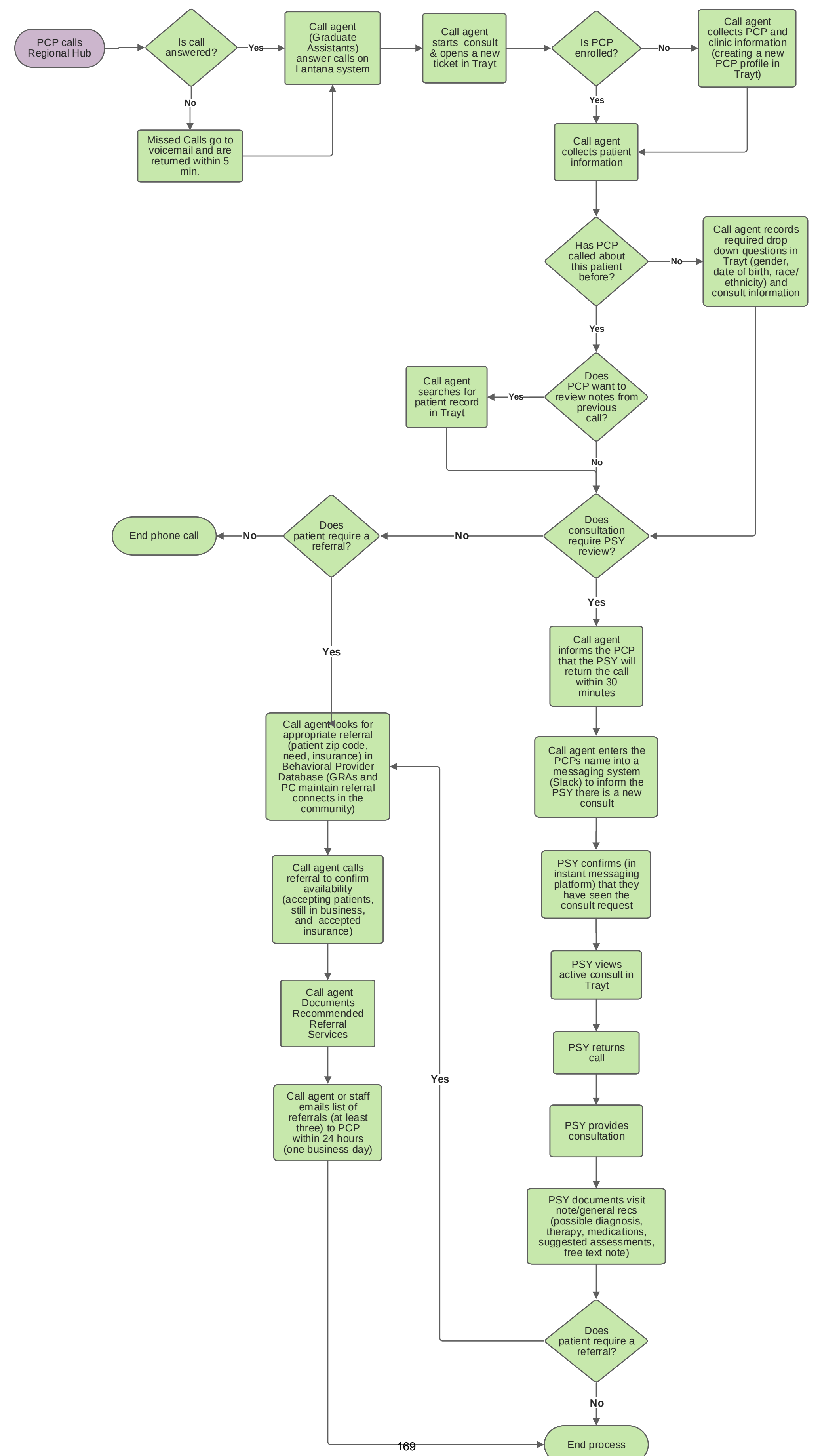
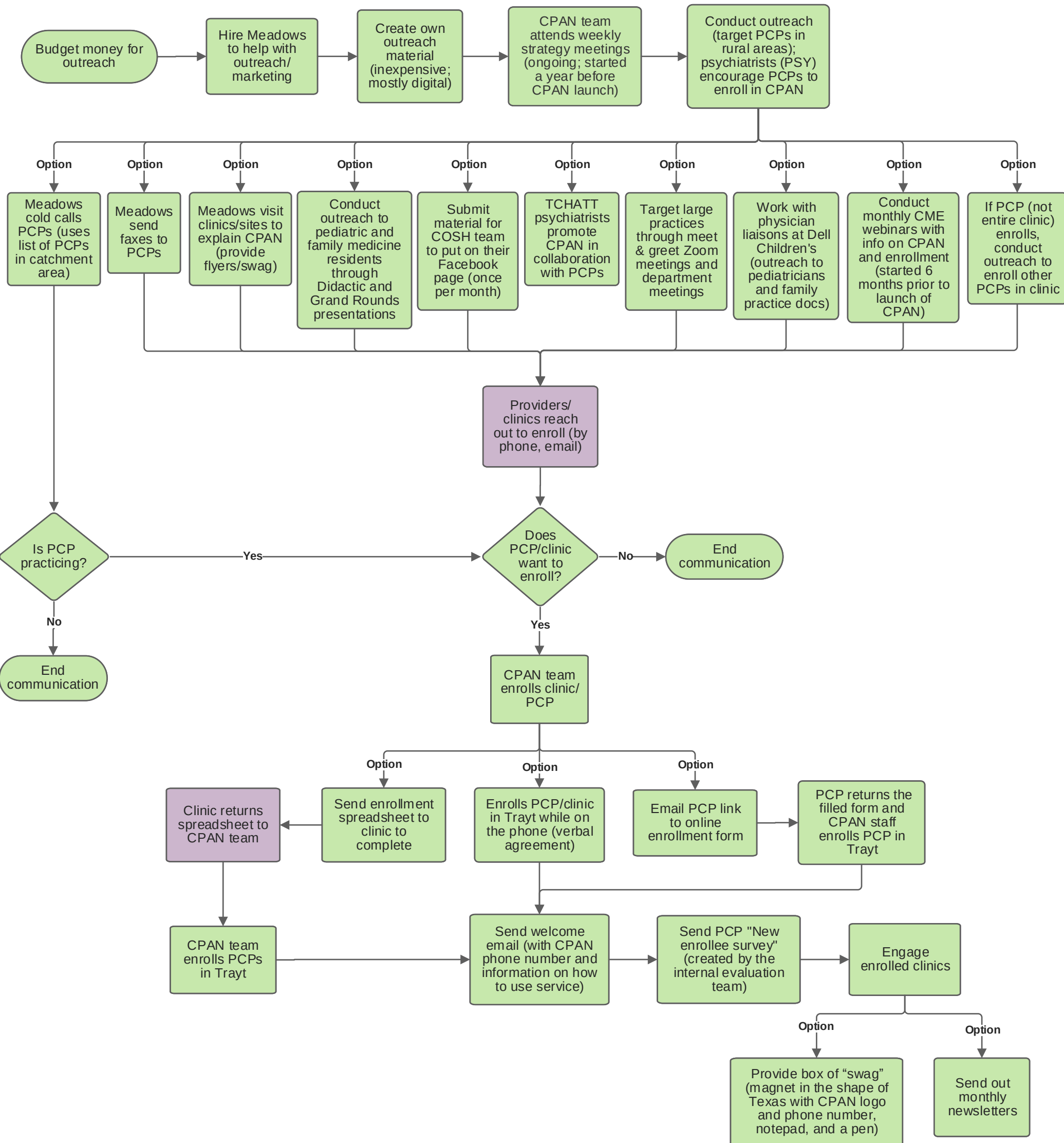


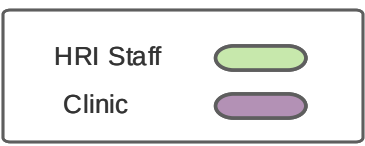
UT Dell CPAN Process Flow

TCMHCC EE Team

HRI Staff

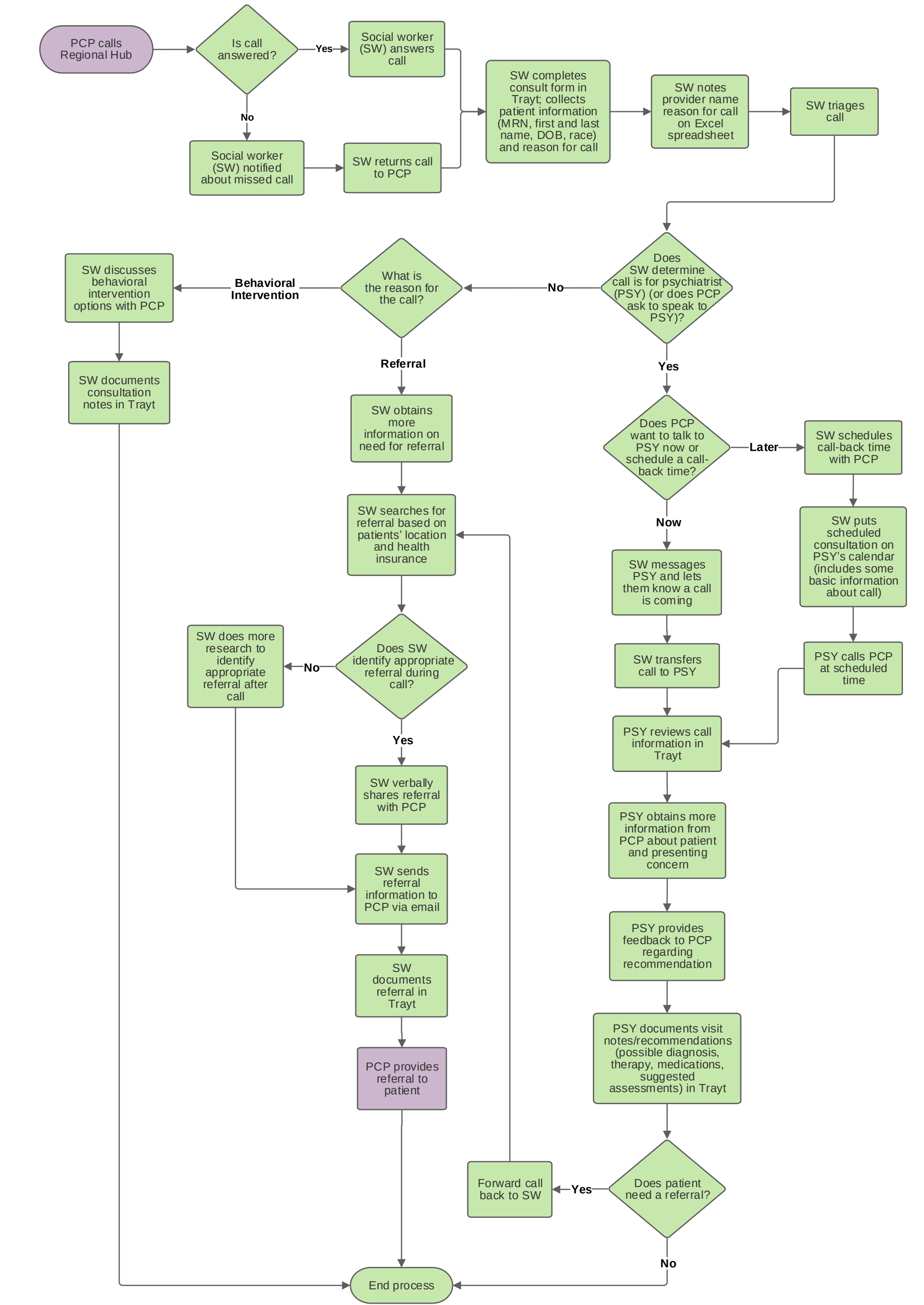
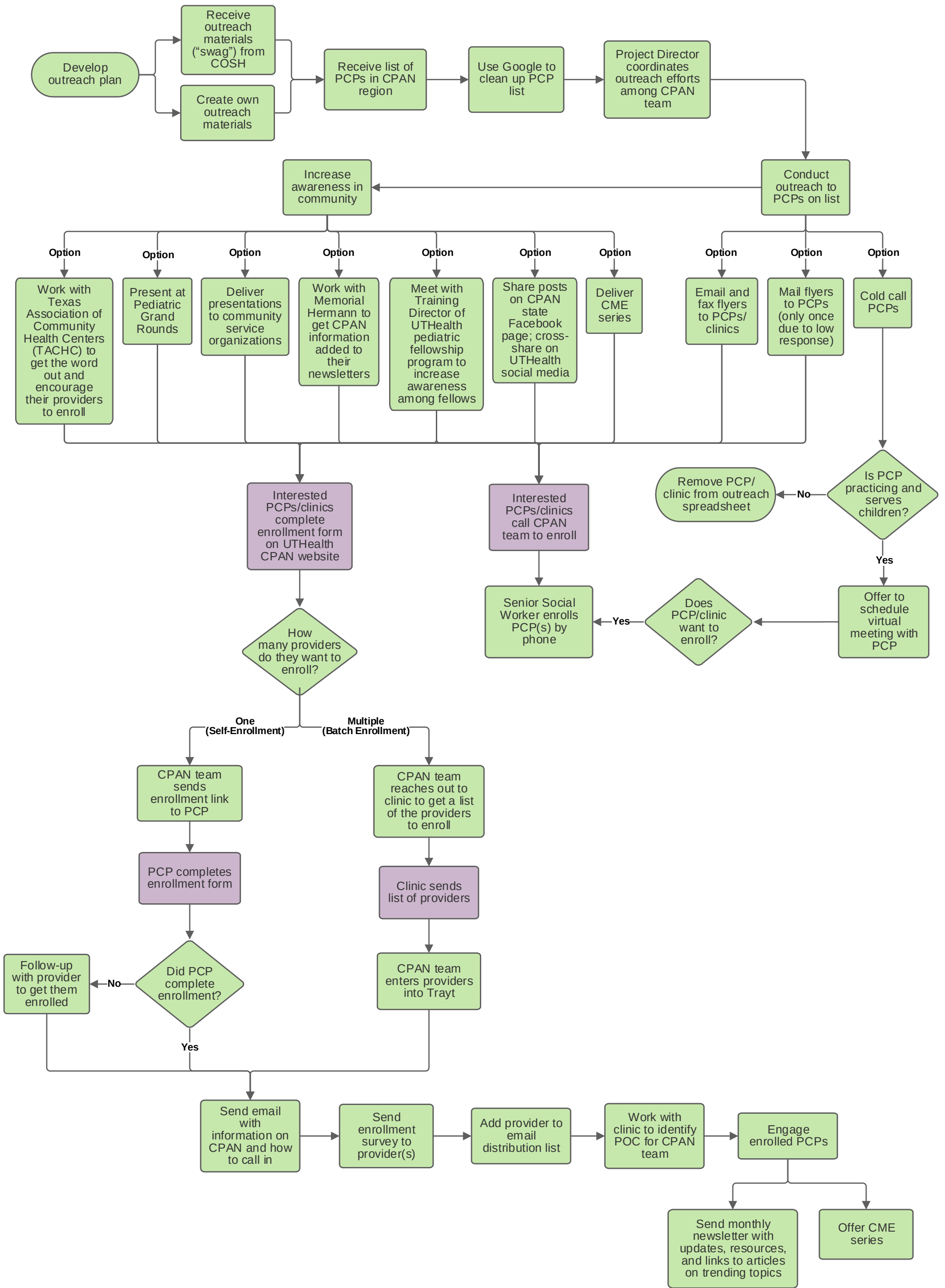
Clinic

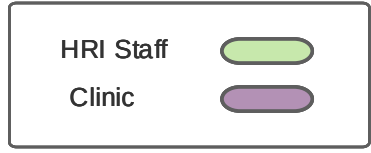




UTHSCH CPAN Process Flow

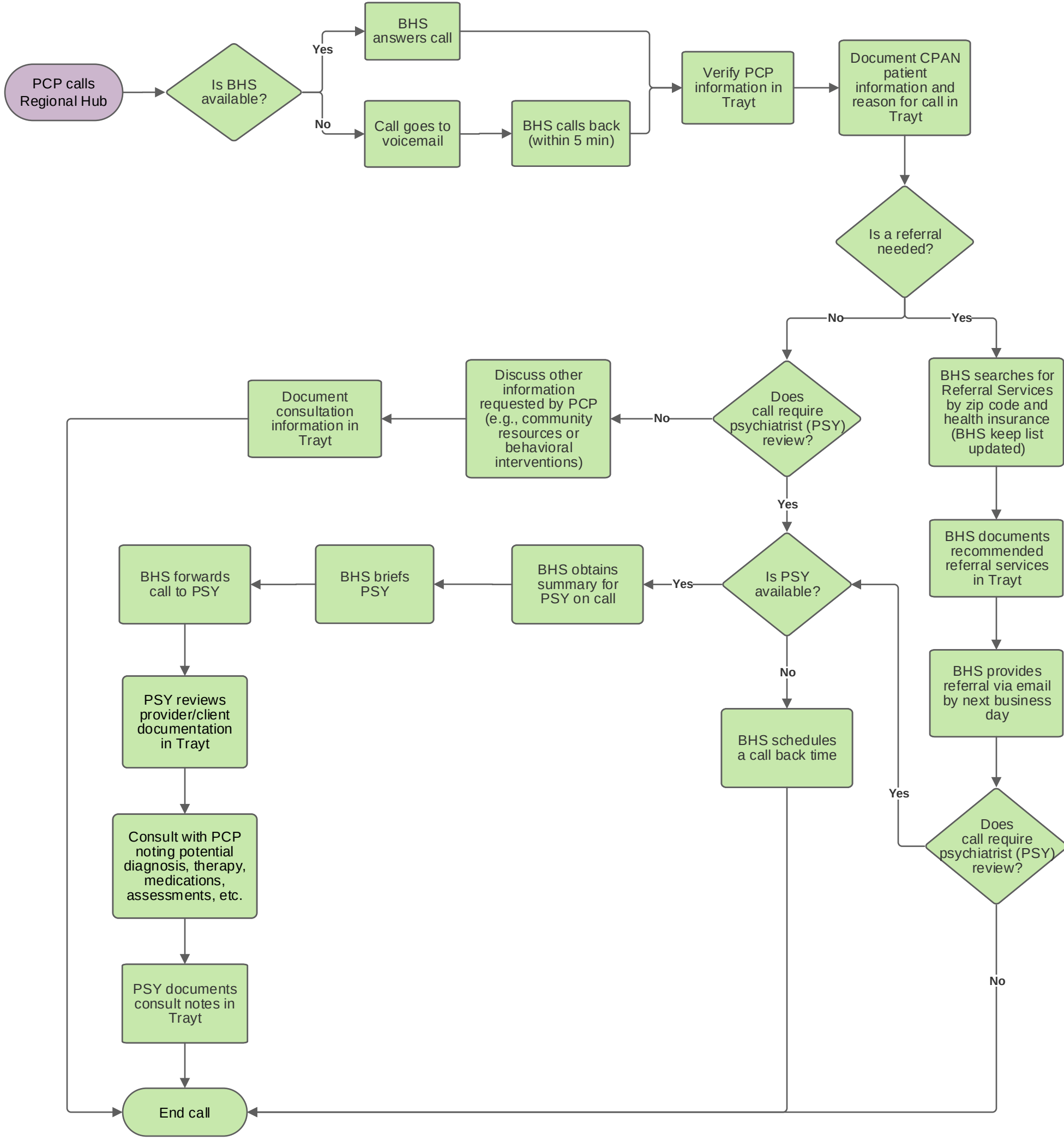
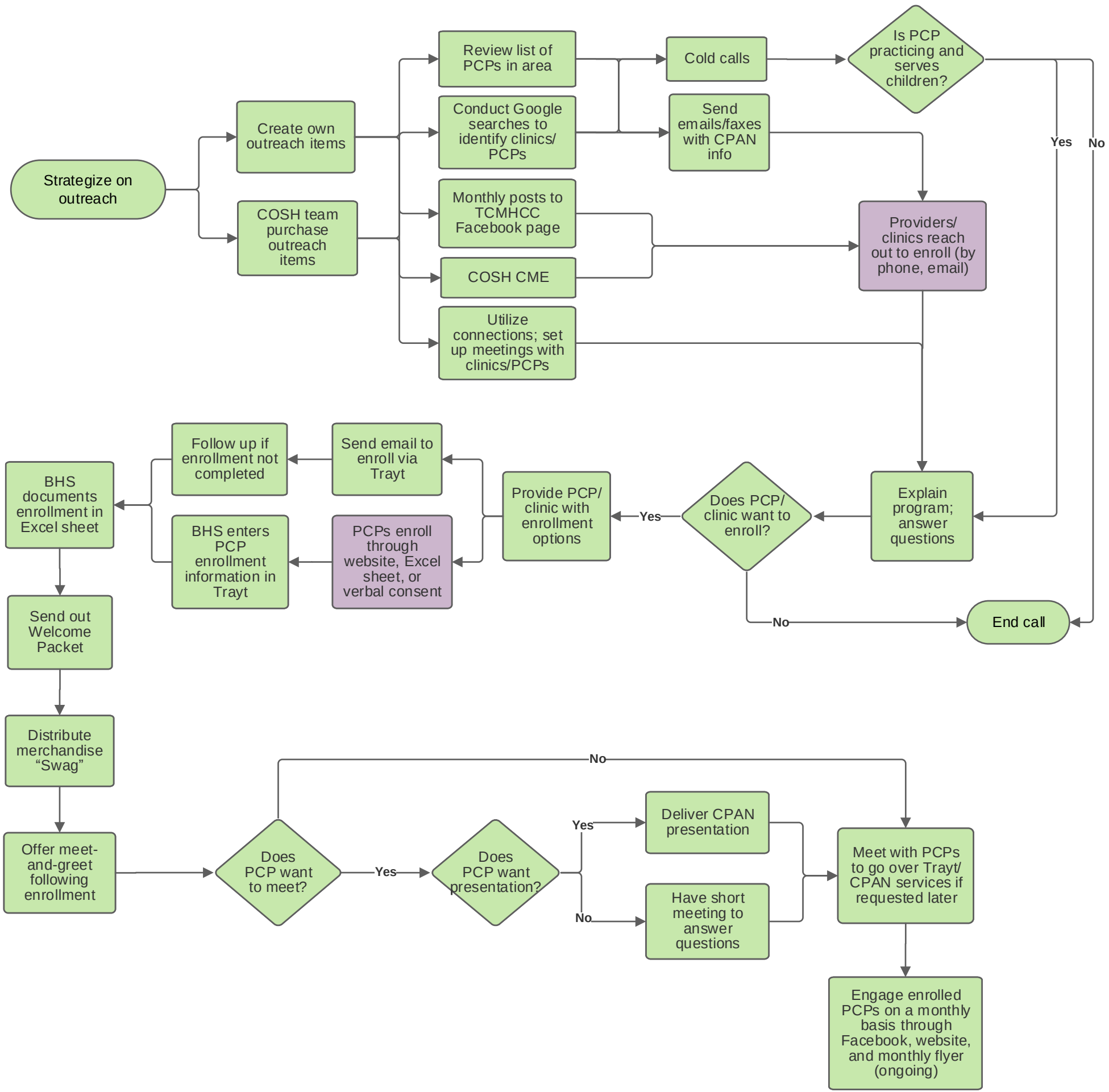
TCMHCC EE Team





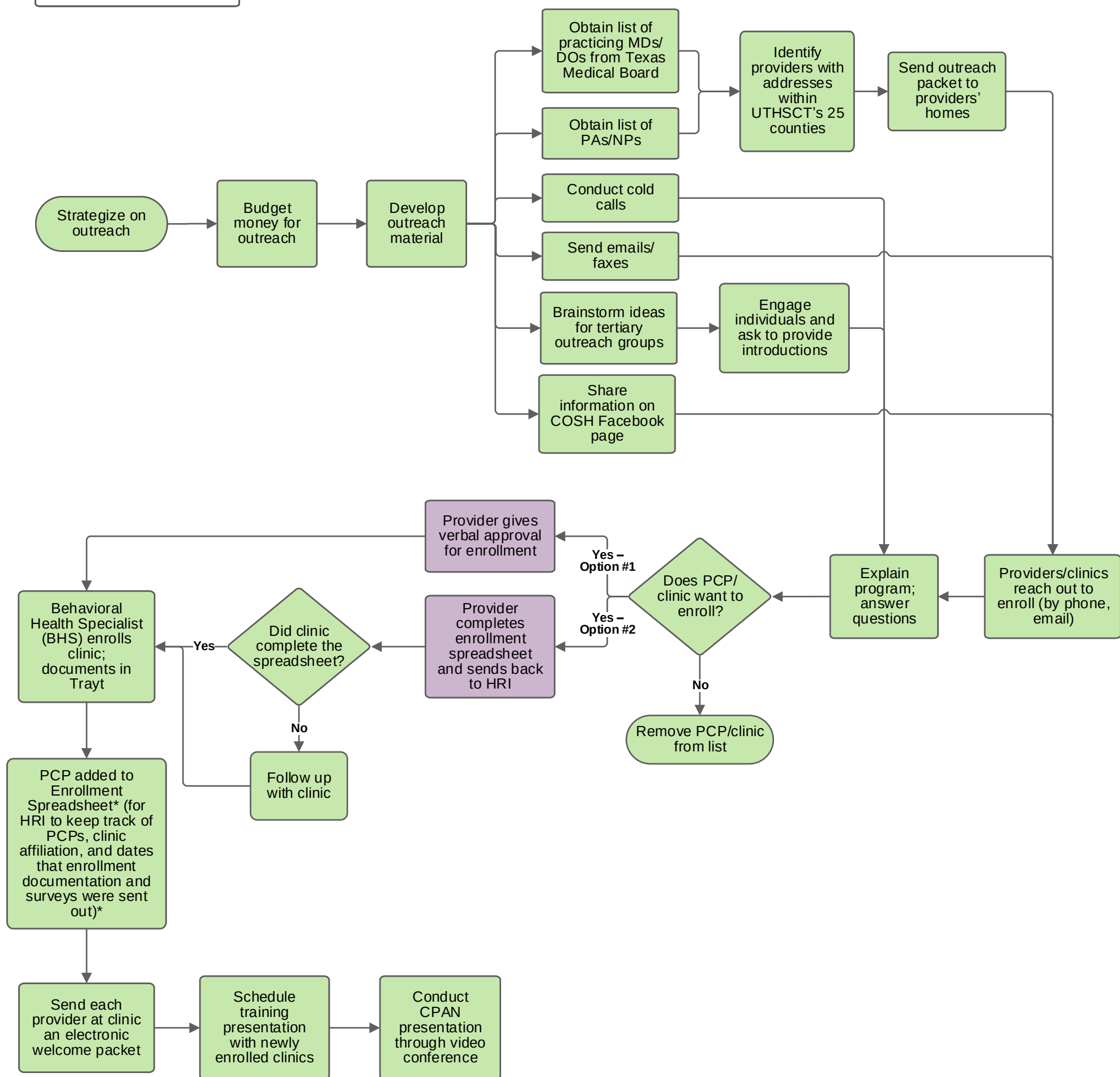
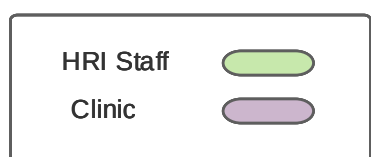
UTHSCSA CPAN Process Flow

TCMHCC EE Team

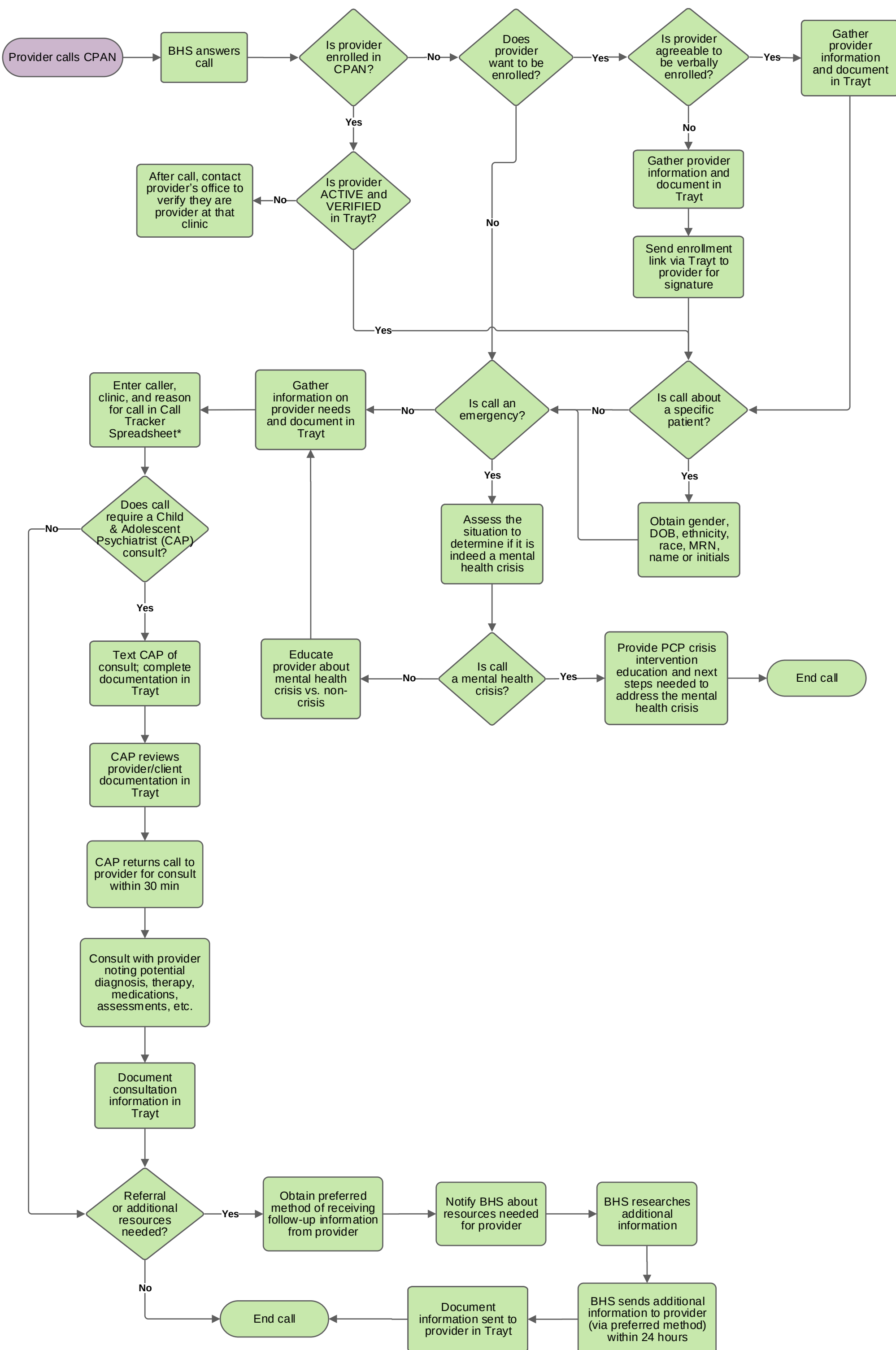


UTHSCT HRI CPAN Process Flow

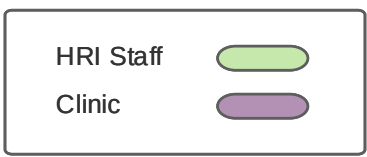
TCMHCCCE Team



*Strategy implemented by HRI to ensure they always have access to provider, call information, and stats at their fingertips

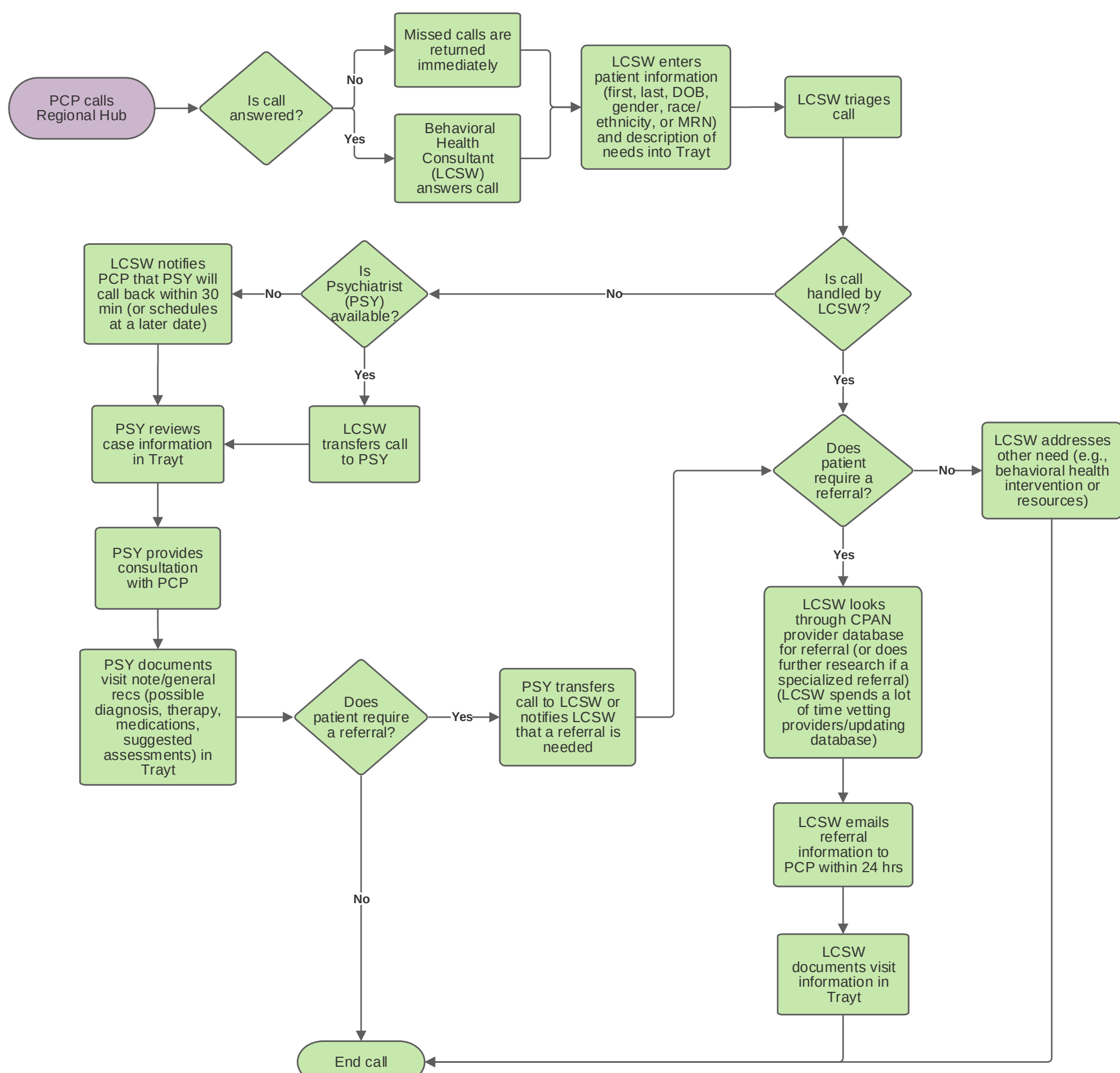
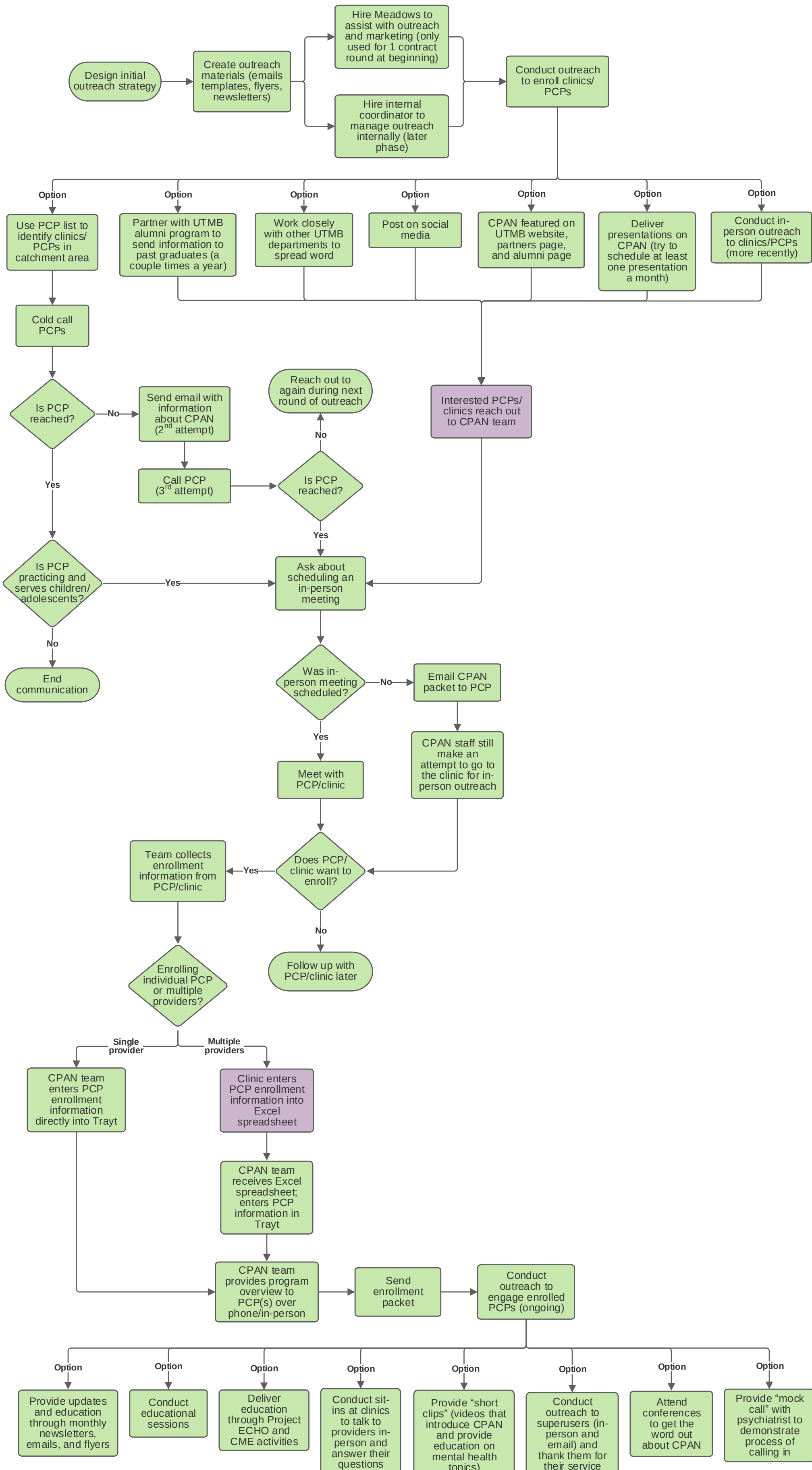


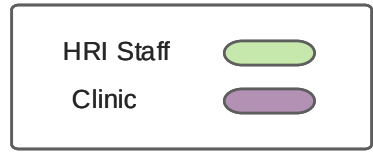
*Strategy implemented by HRI to ensure they always have access to provider, call information, and stats at their fingertips



UTMB CPAN Process Flow

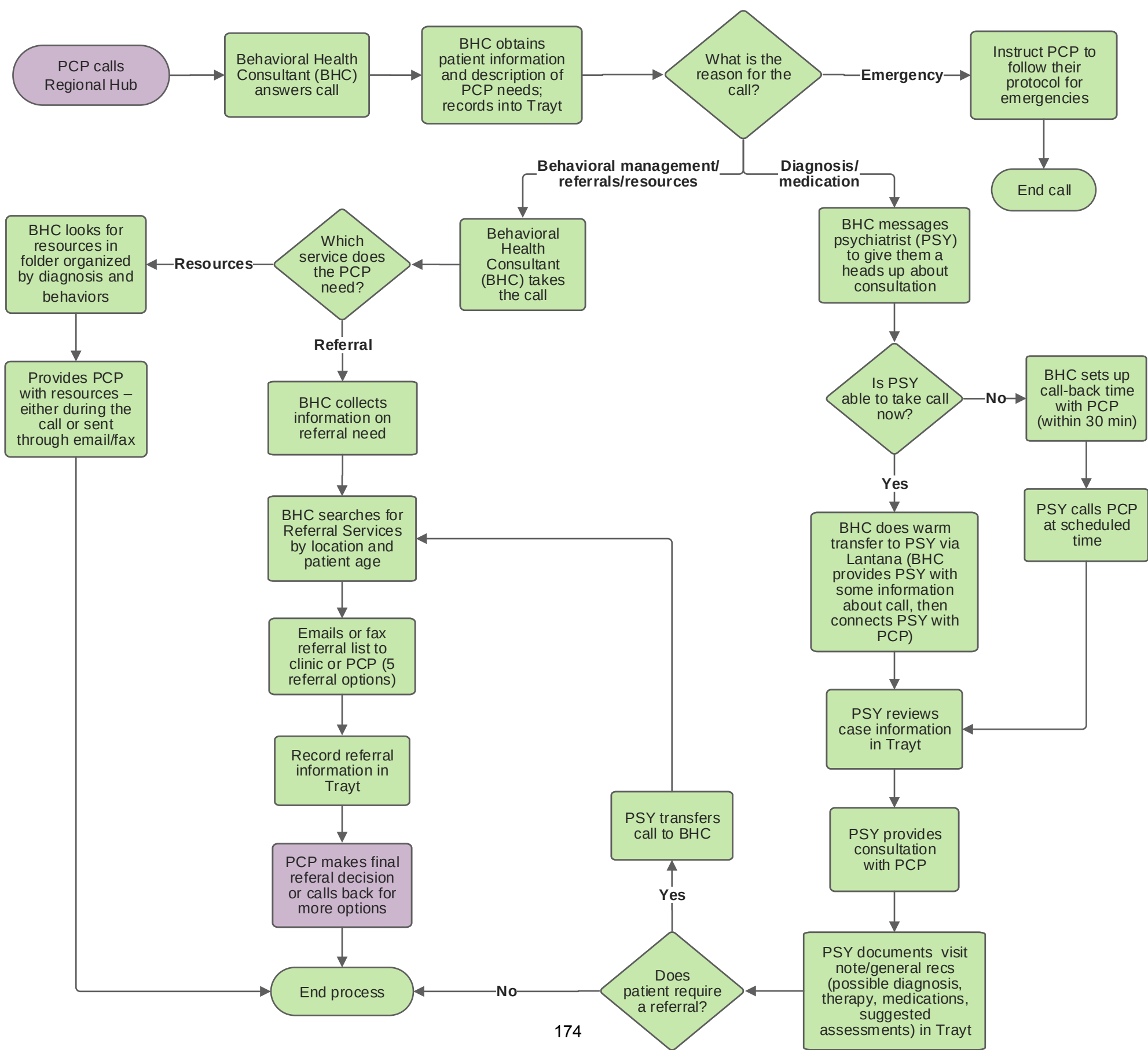
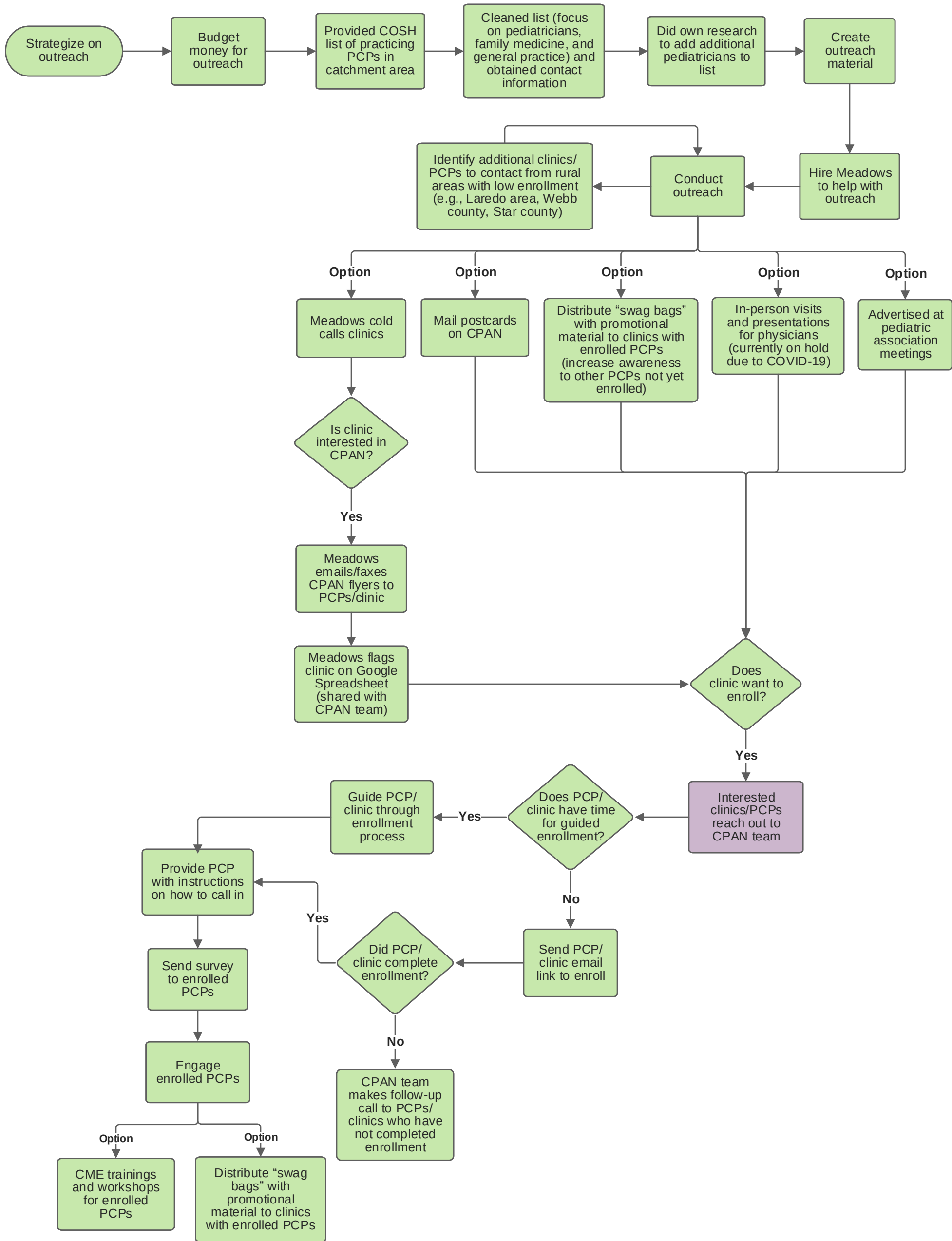
TCMHCC EE Team

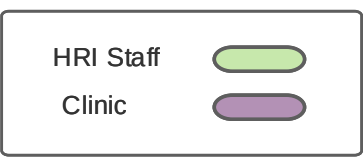




UTRGV CPAN Process Flow

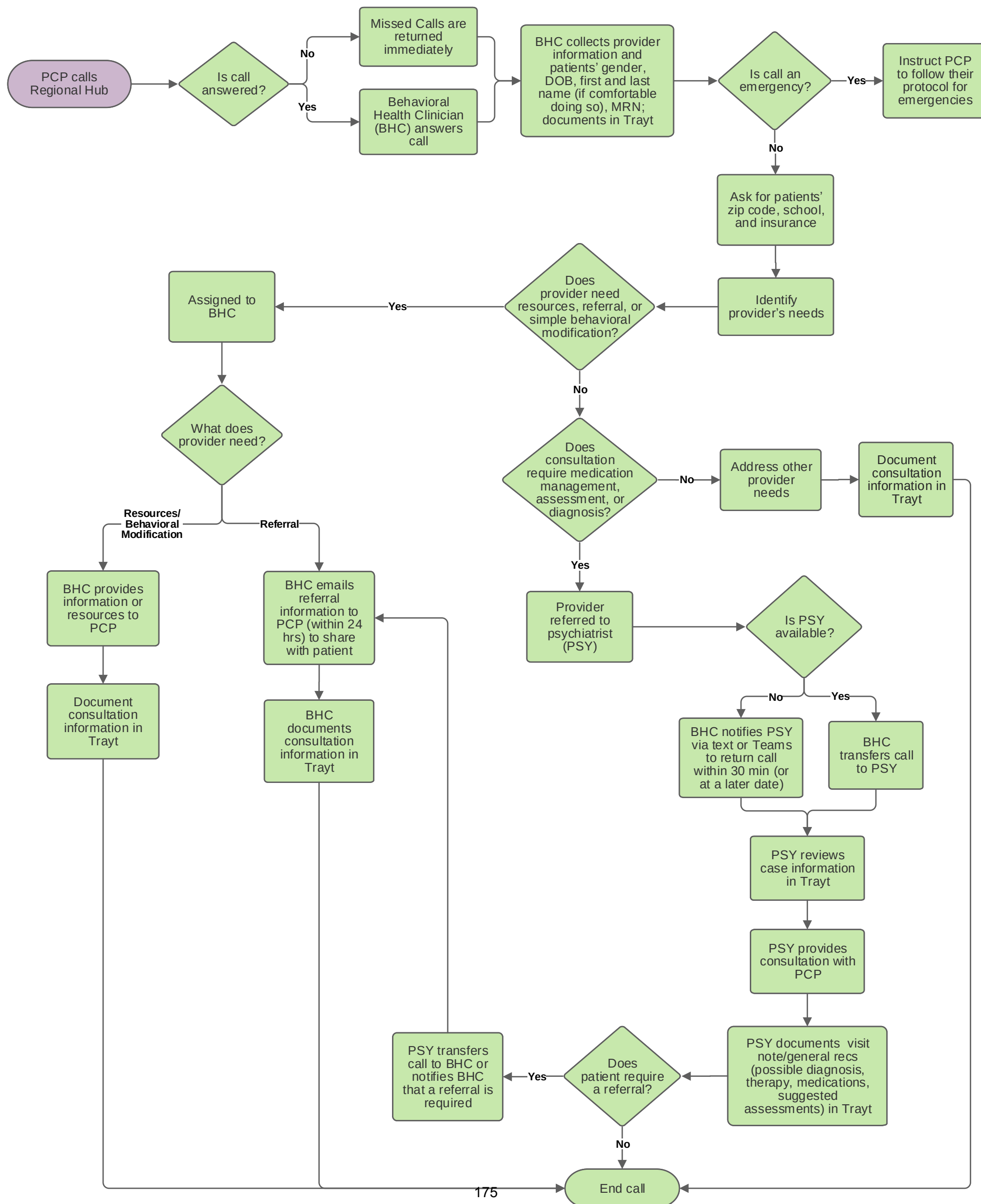
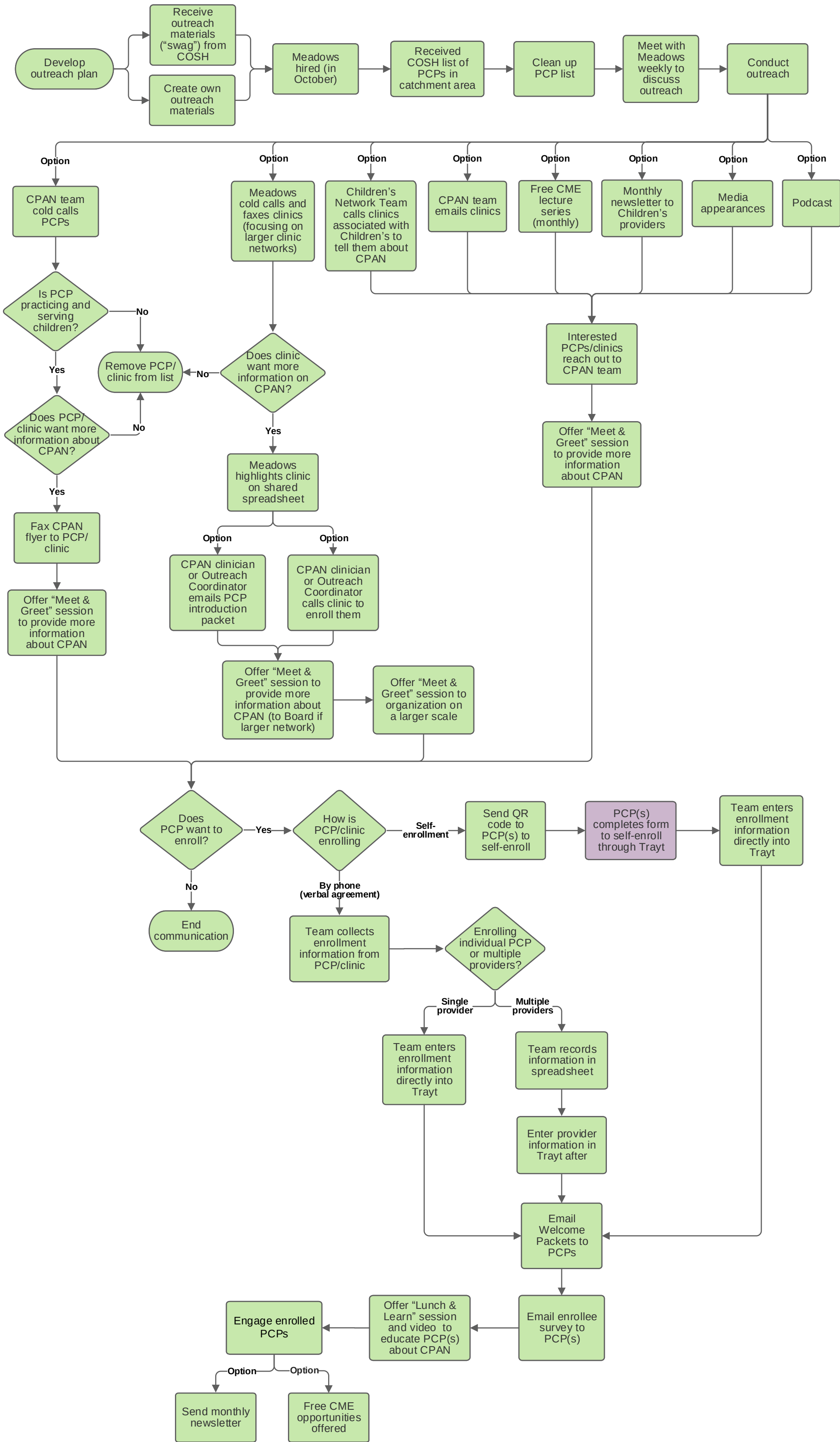
TCMHCC EE Team

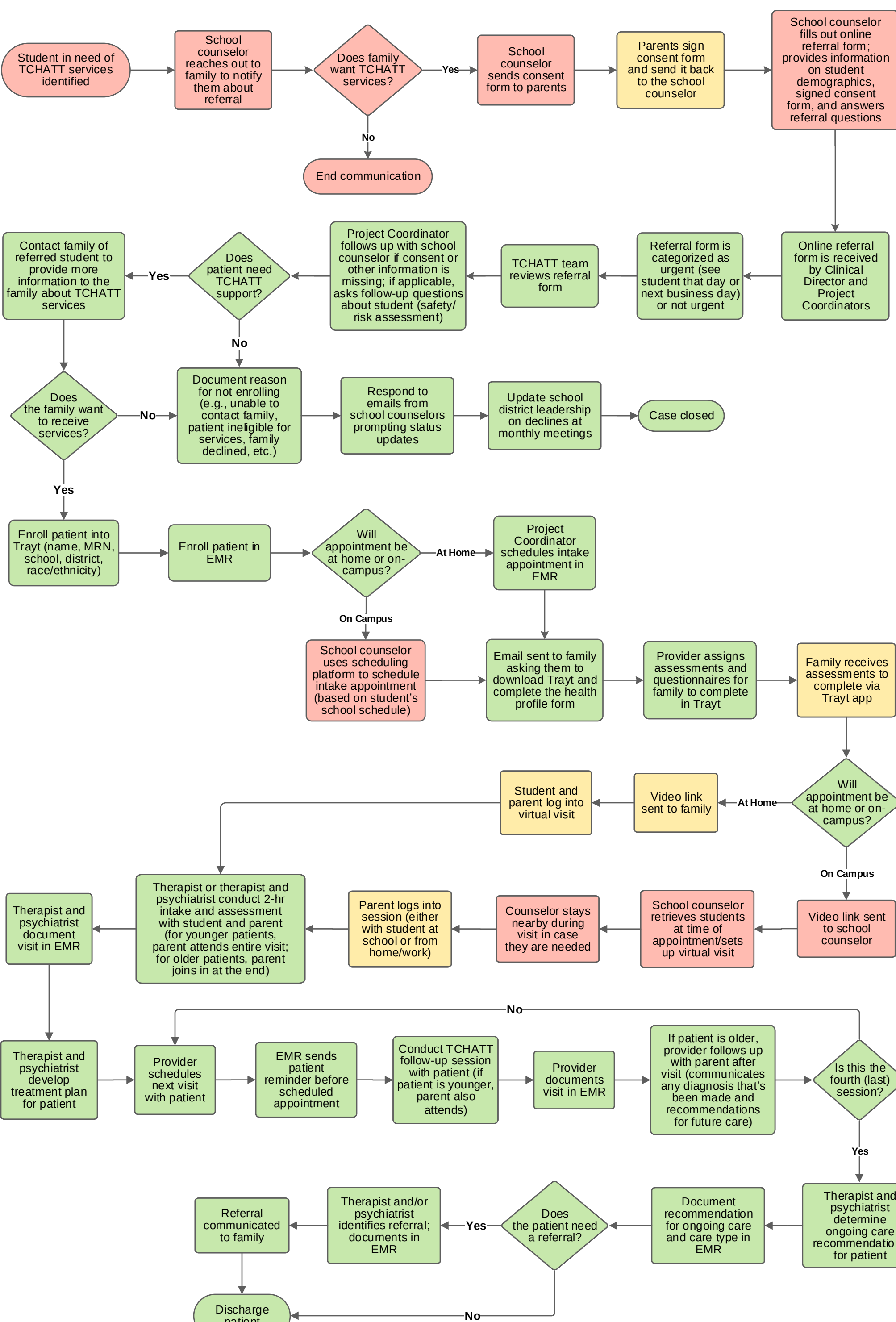
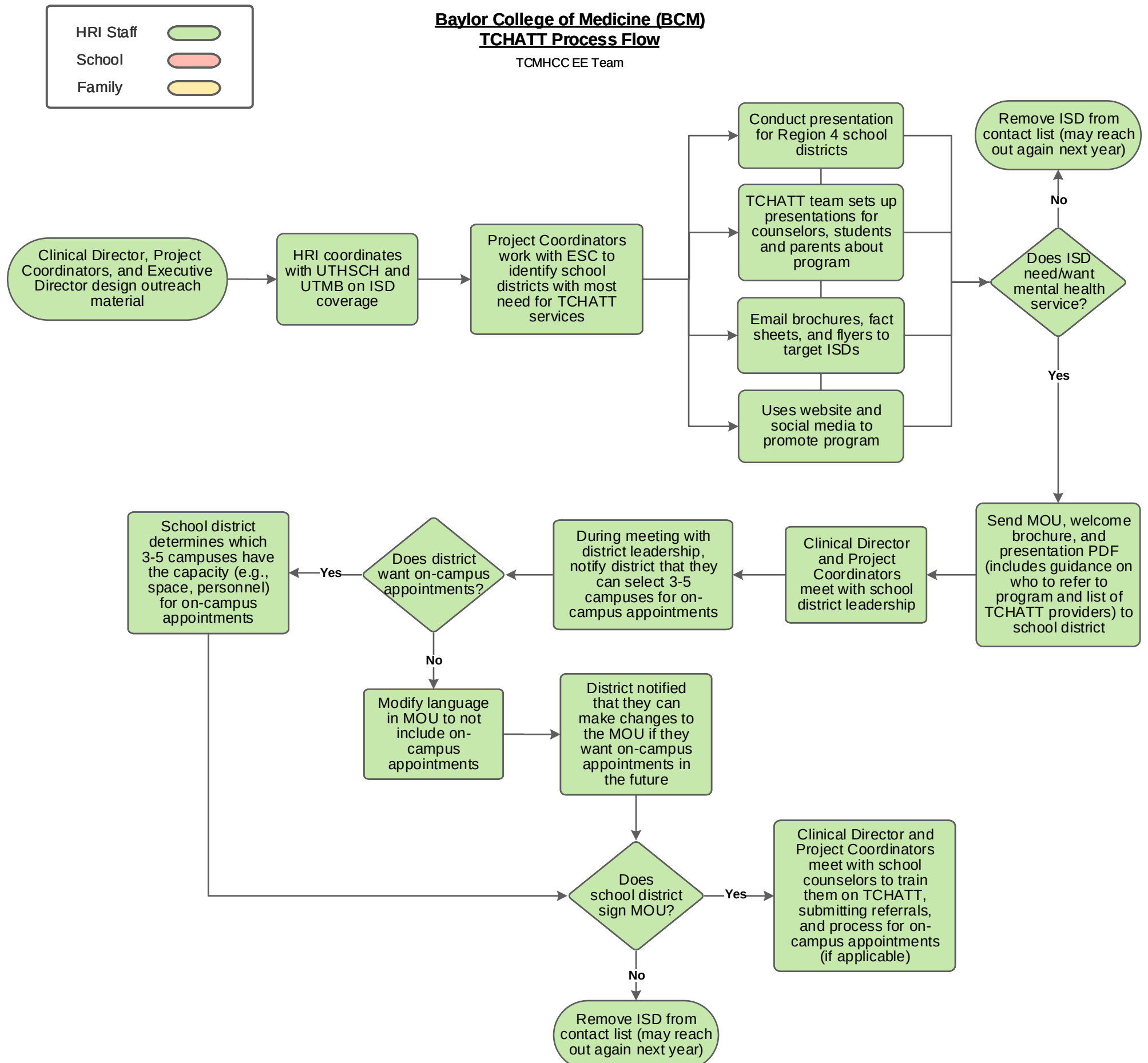


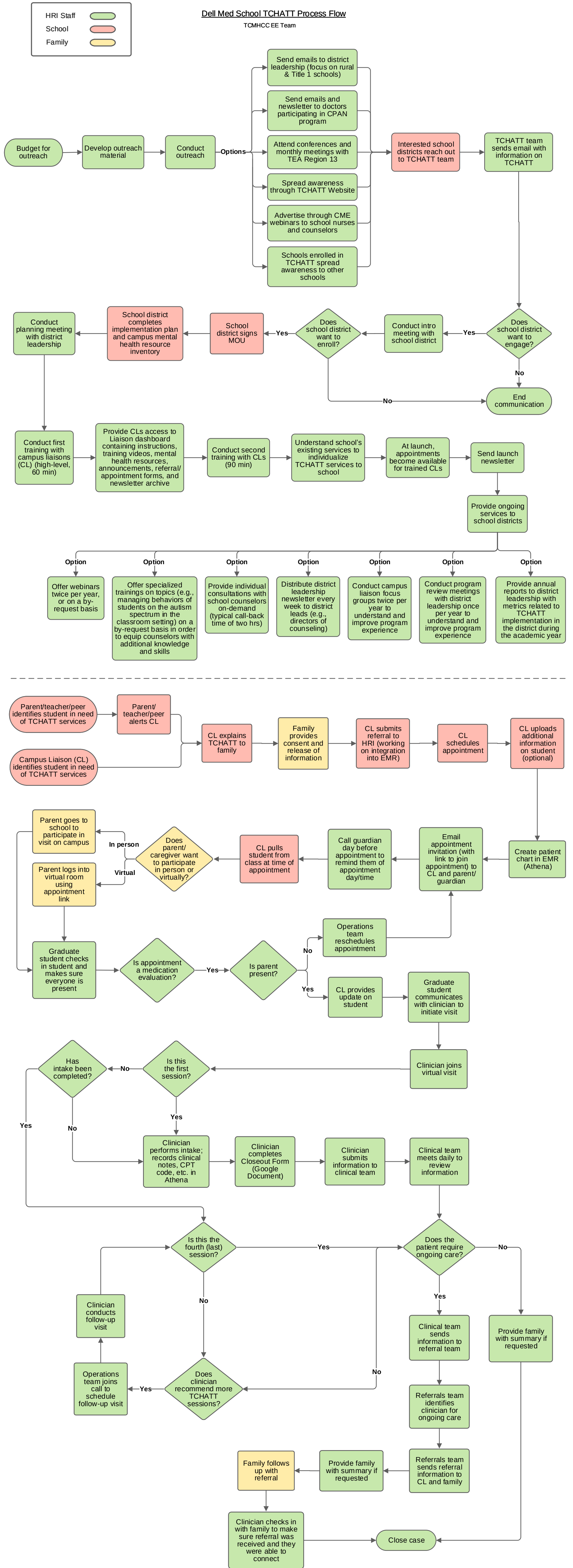


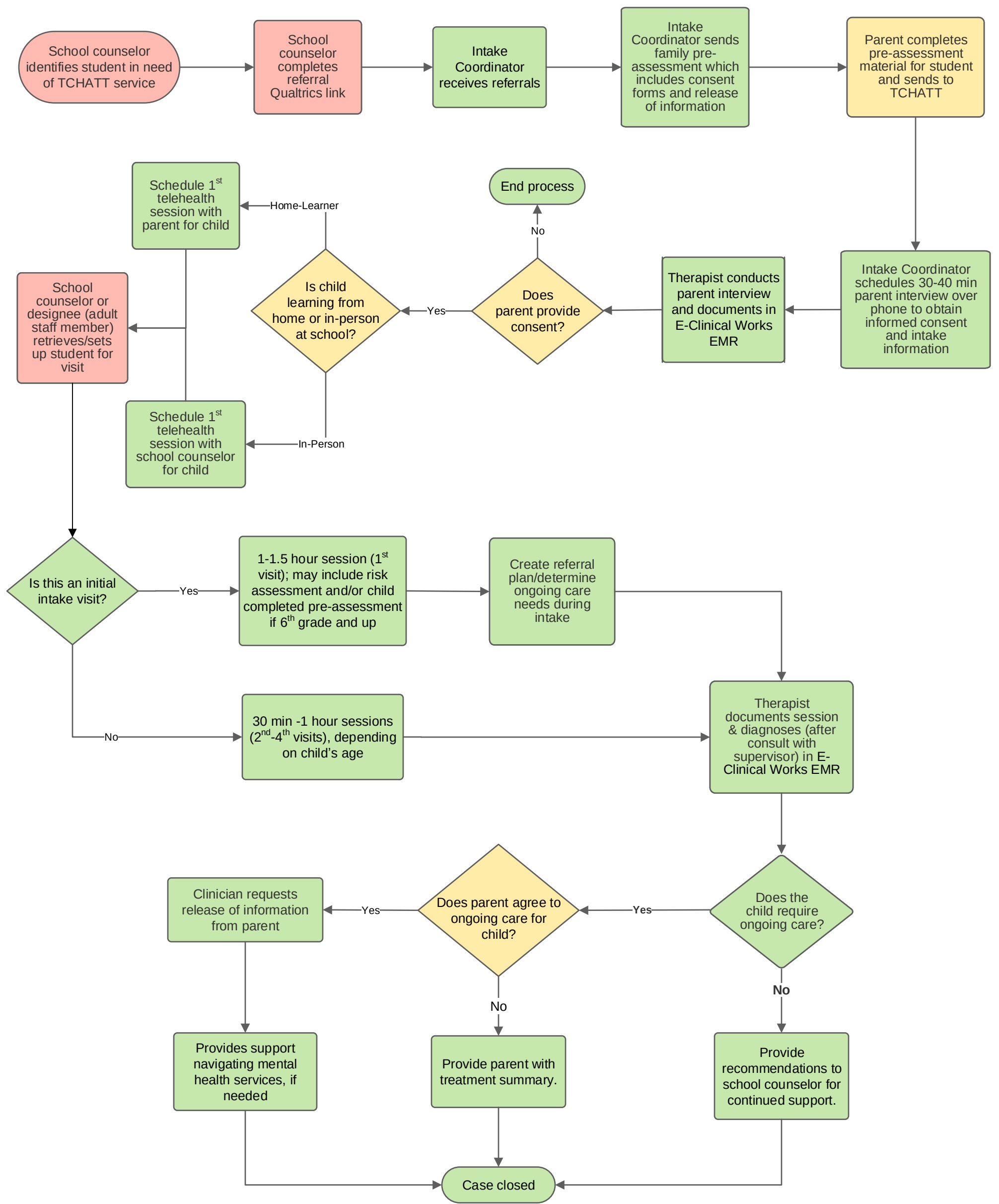
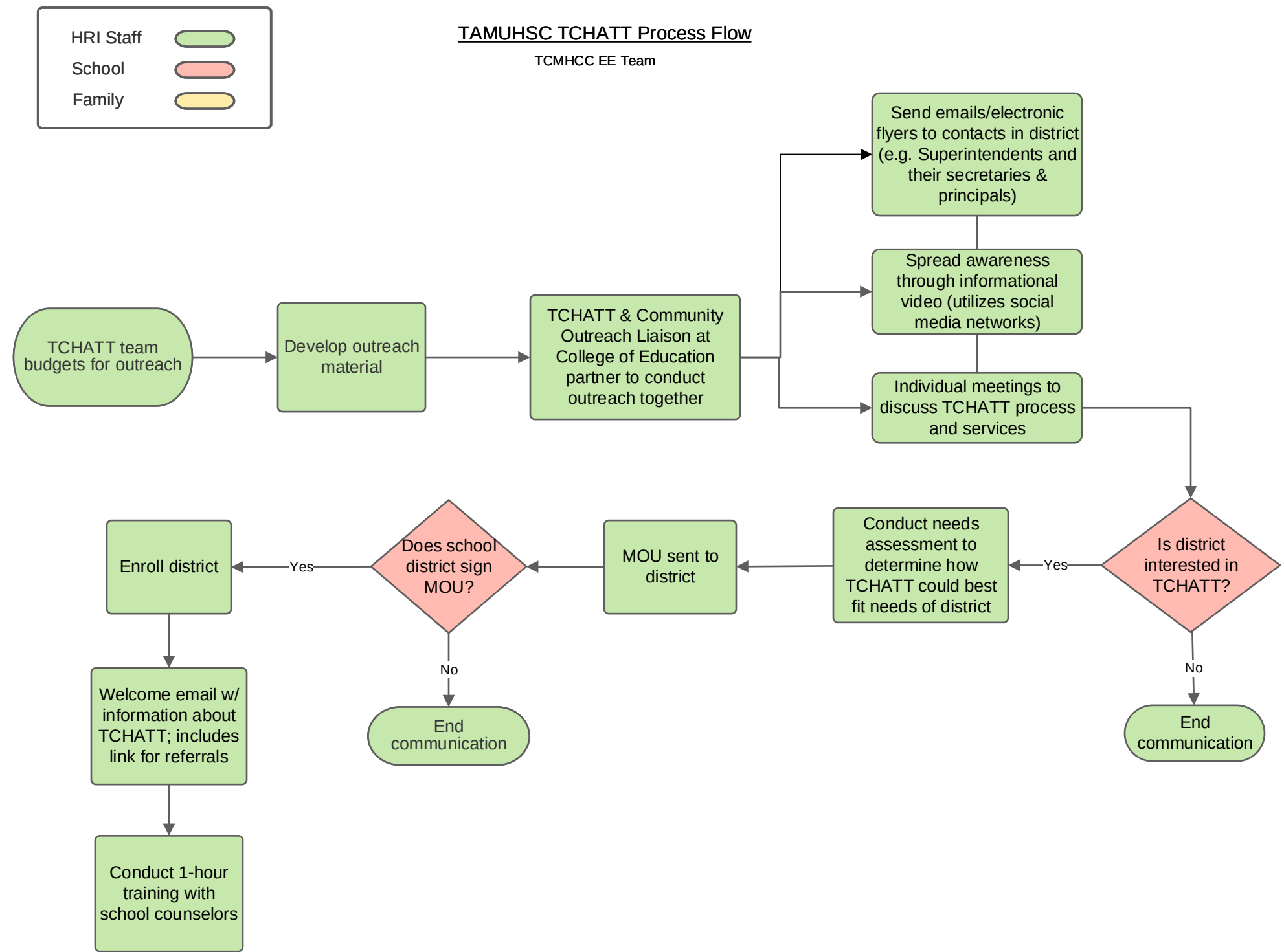
UTSW CPAN Process Flow

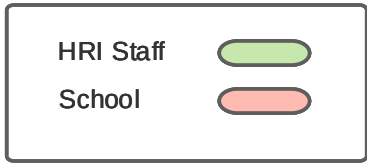
TCMHCC EE Team





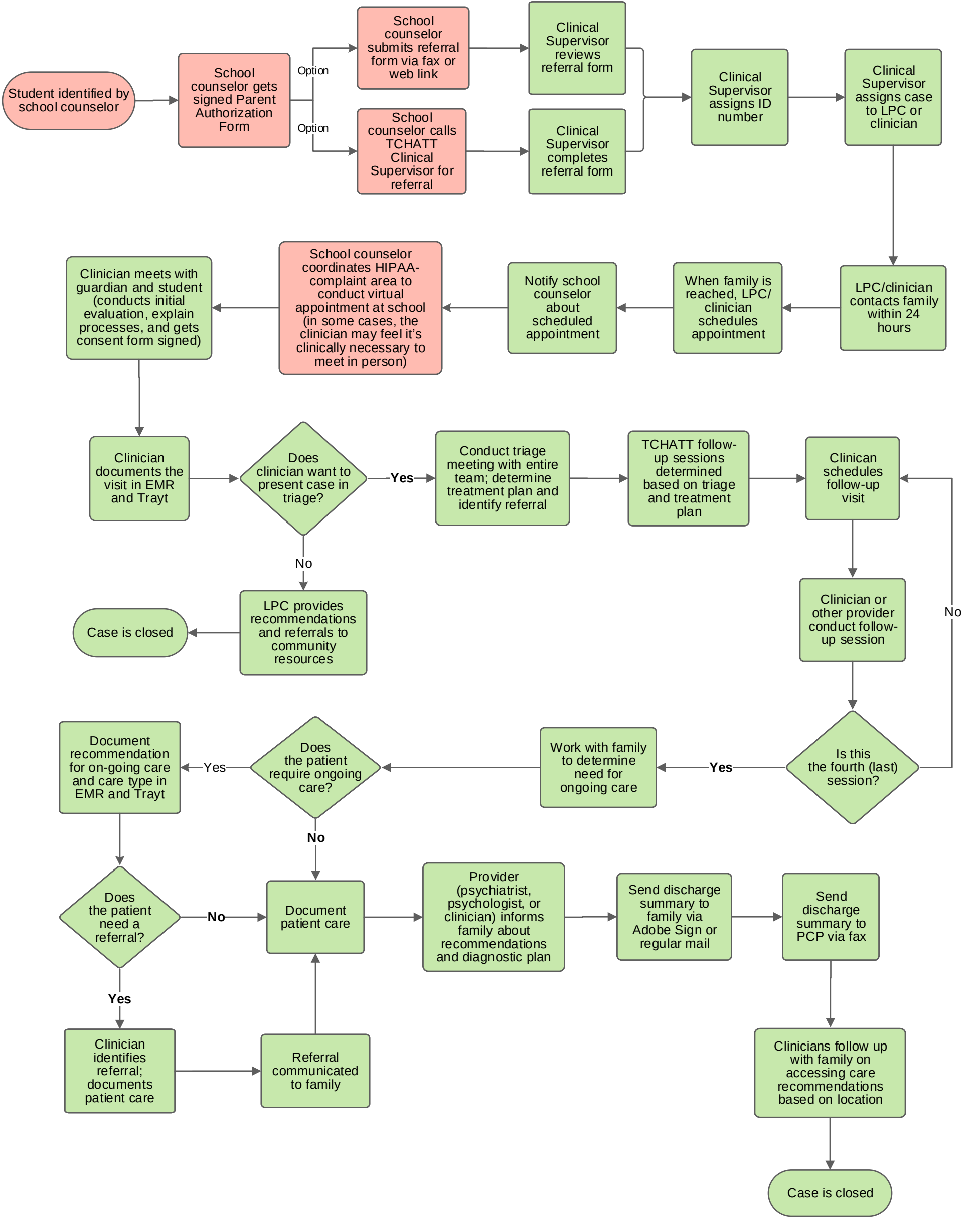
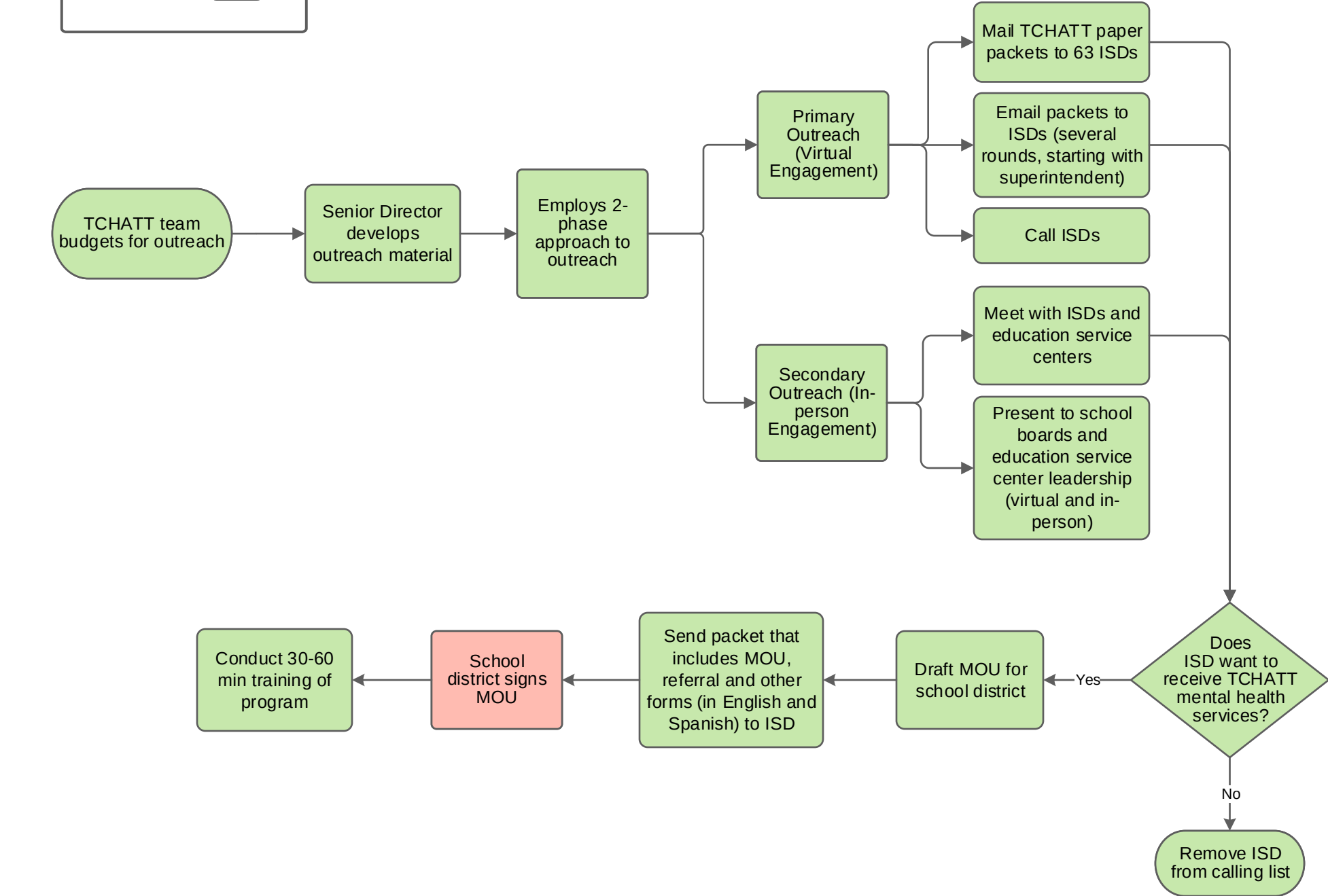


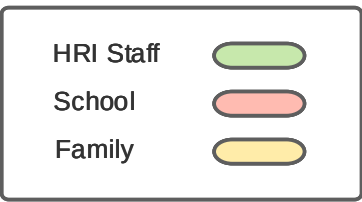




TTUHSC Lubbock TCHATT Process Flow

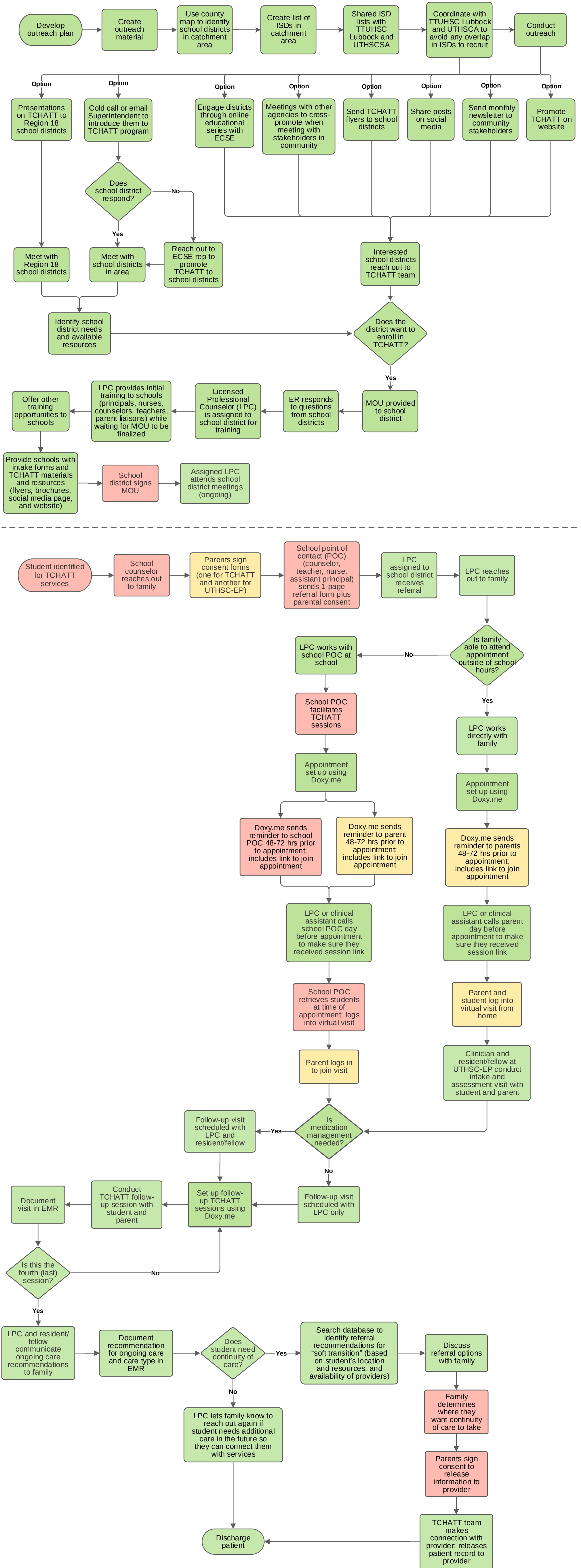
TCMHCC EE Team

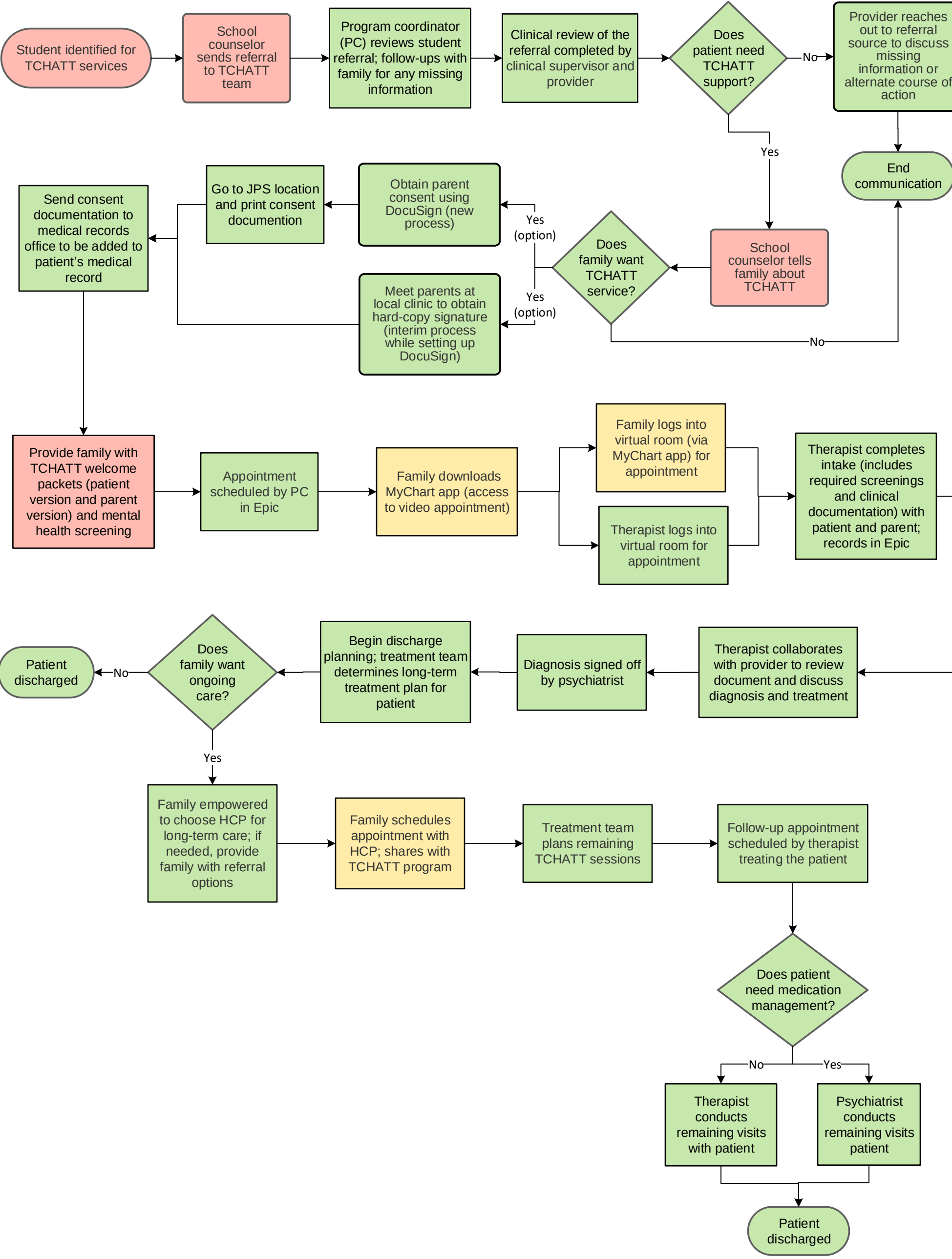
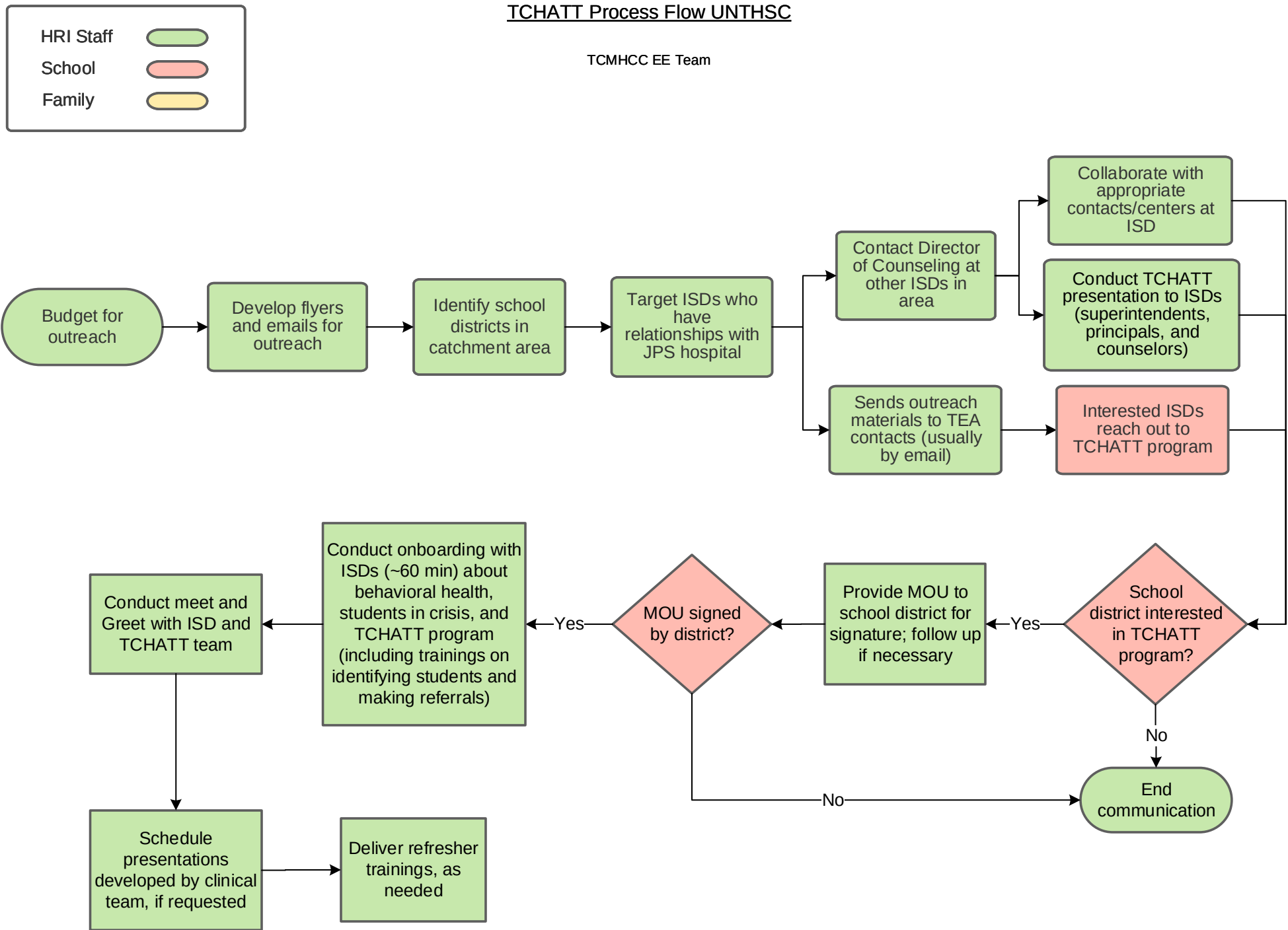
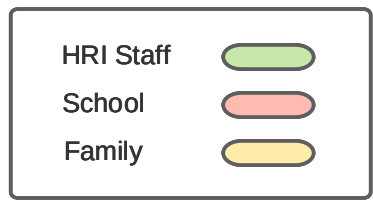


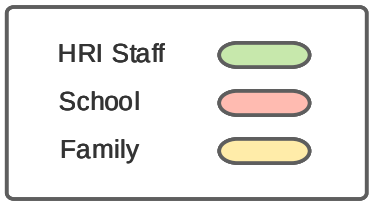


TTUHSC-EP TCHATT Process Flow

TCMHCC EE Team

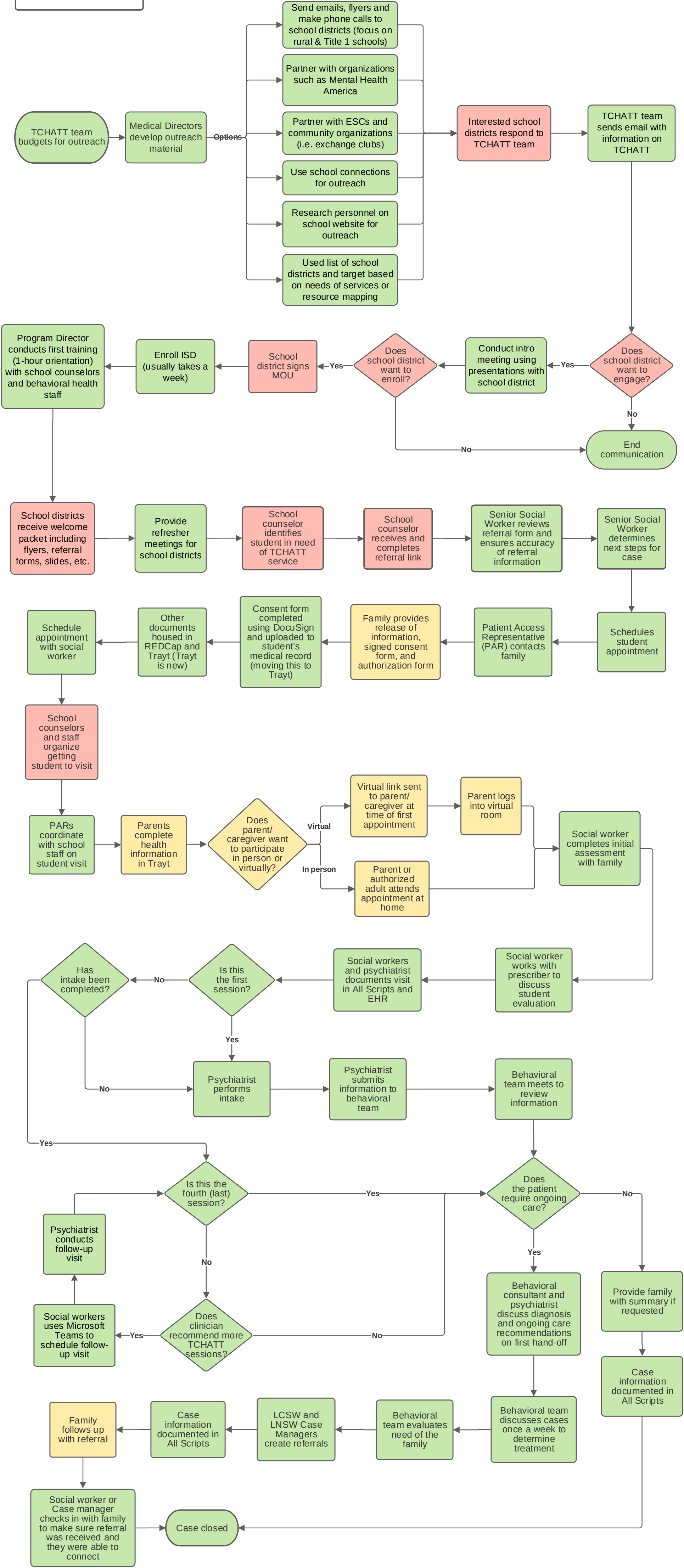






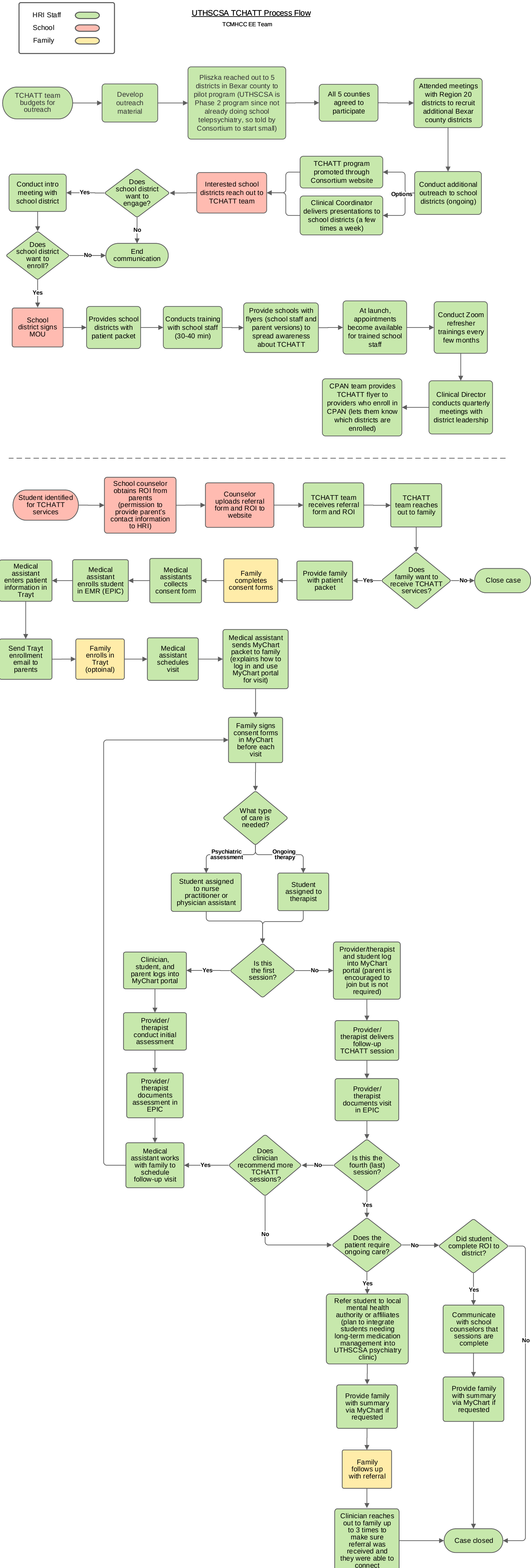
UTHSCH TCHATT Process Flow

TCMHCC EE Team



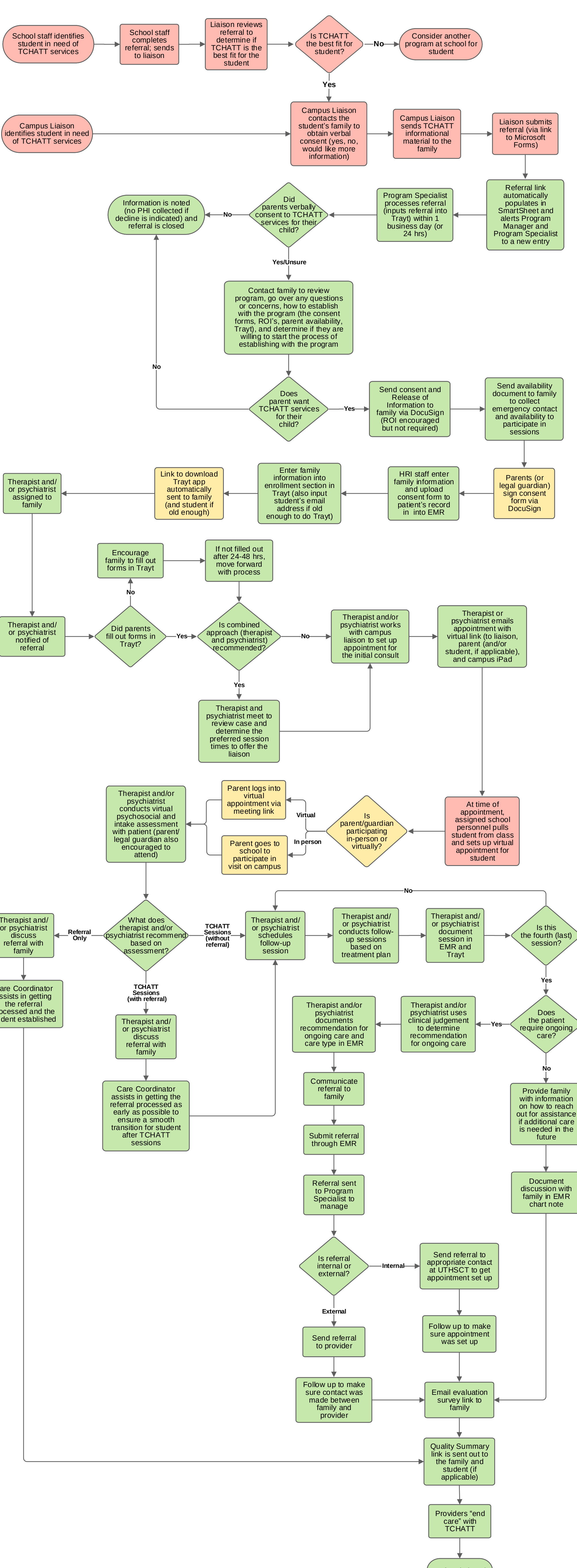
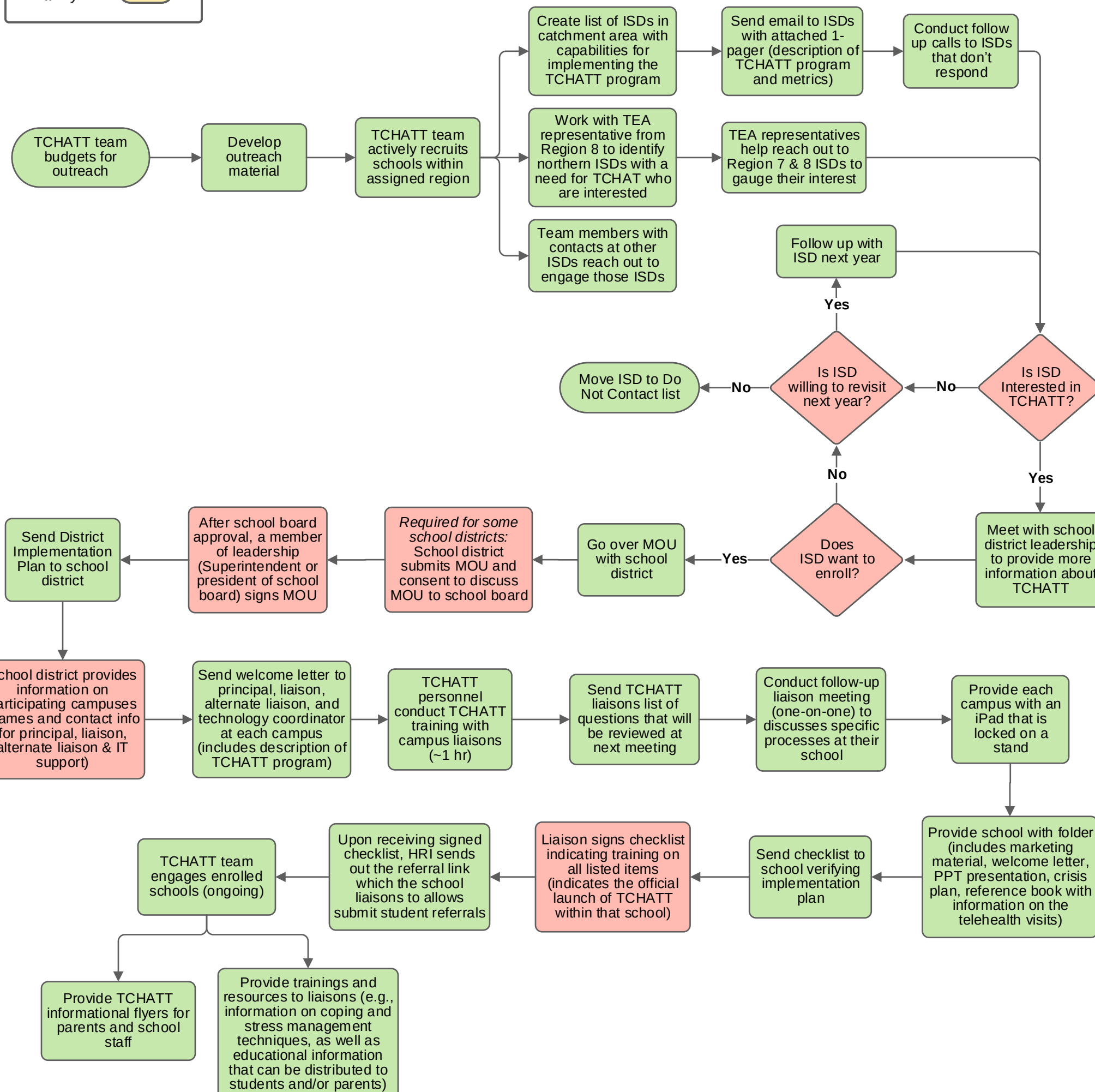
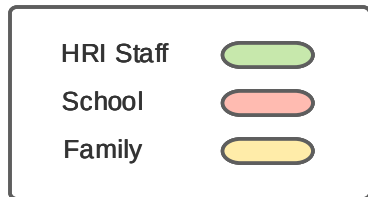
UTHSCSA TCHATT Process Flow

TCMHCC EE Team



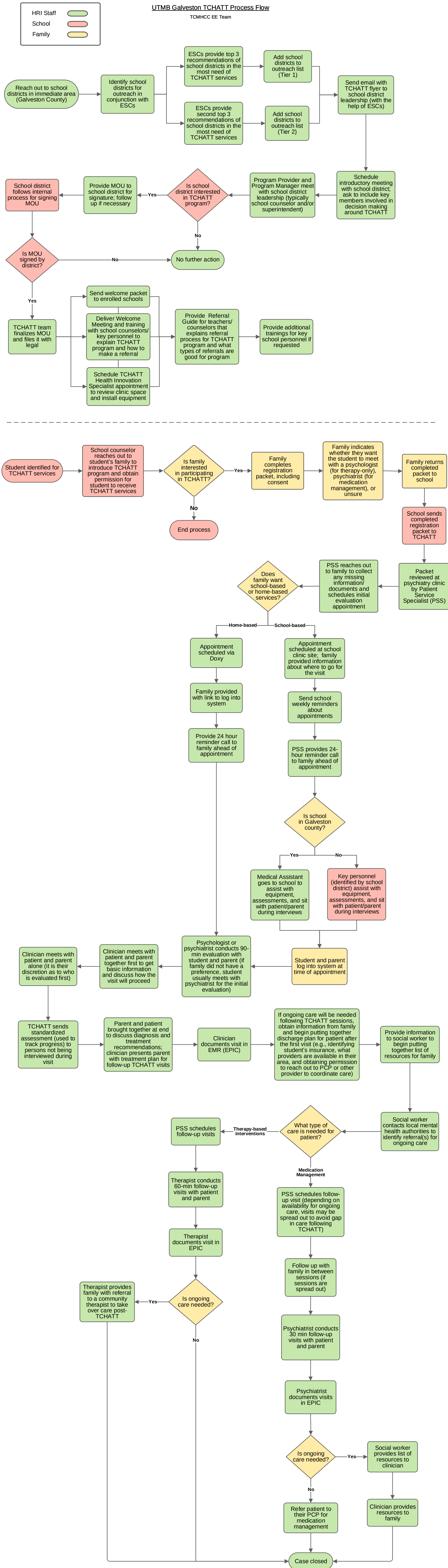
UTHSCT TCHAT Process Flow

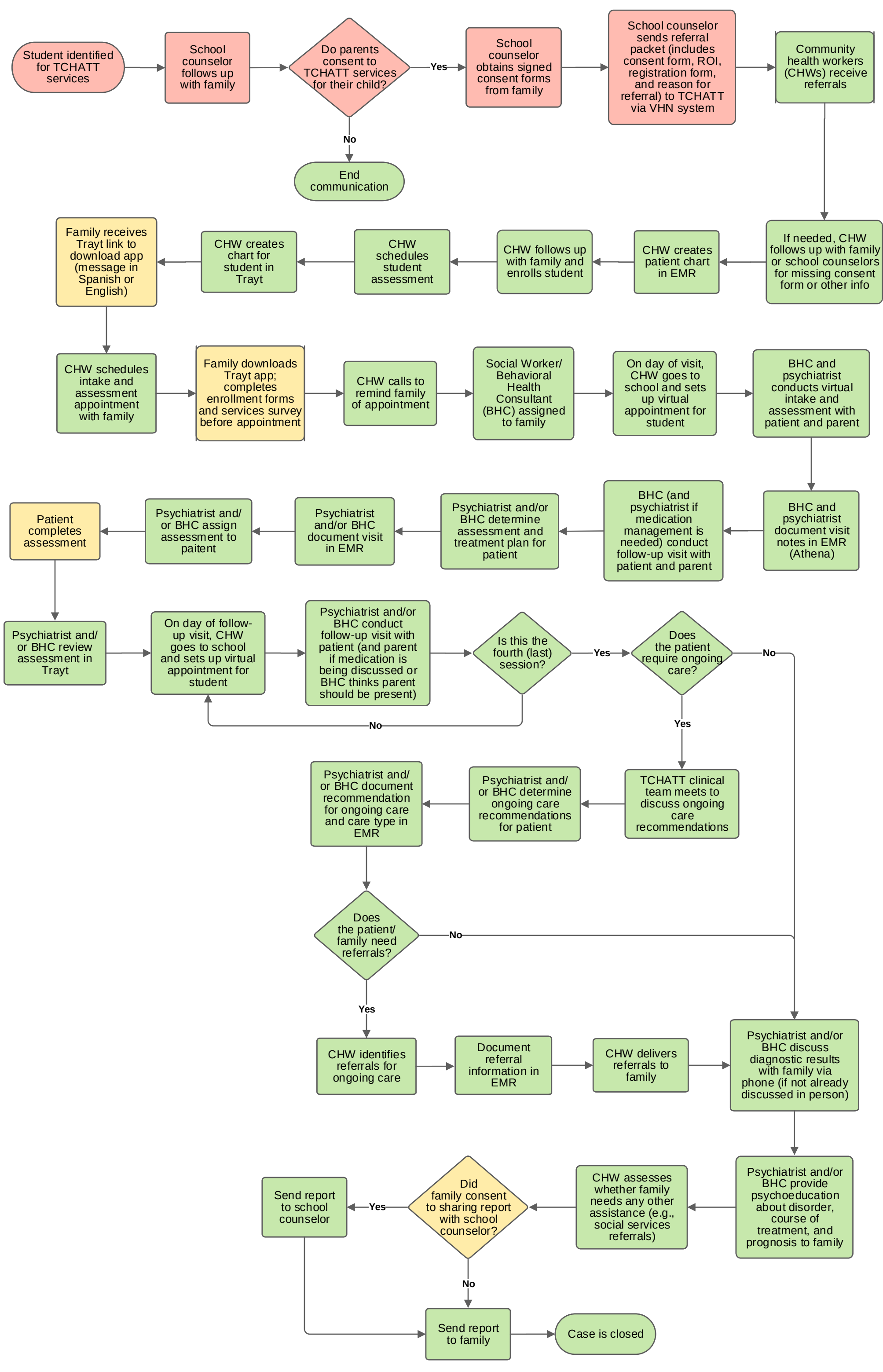
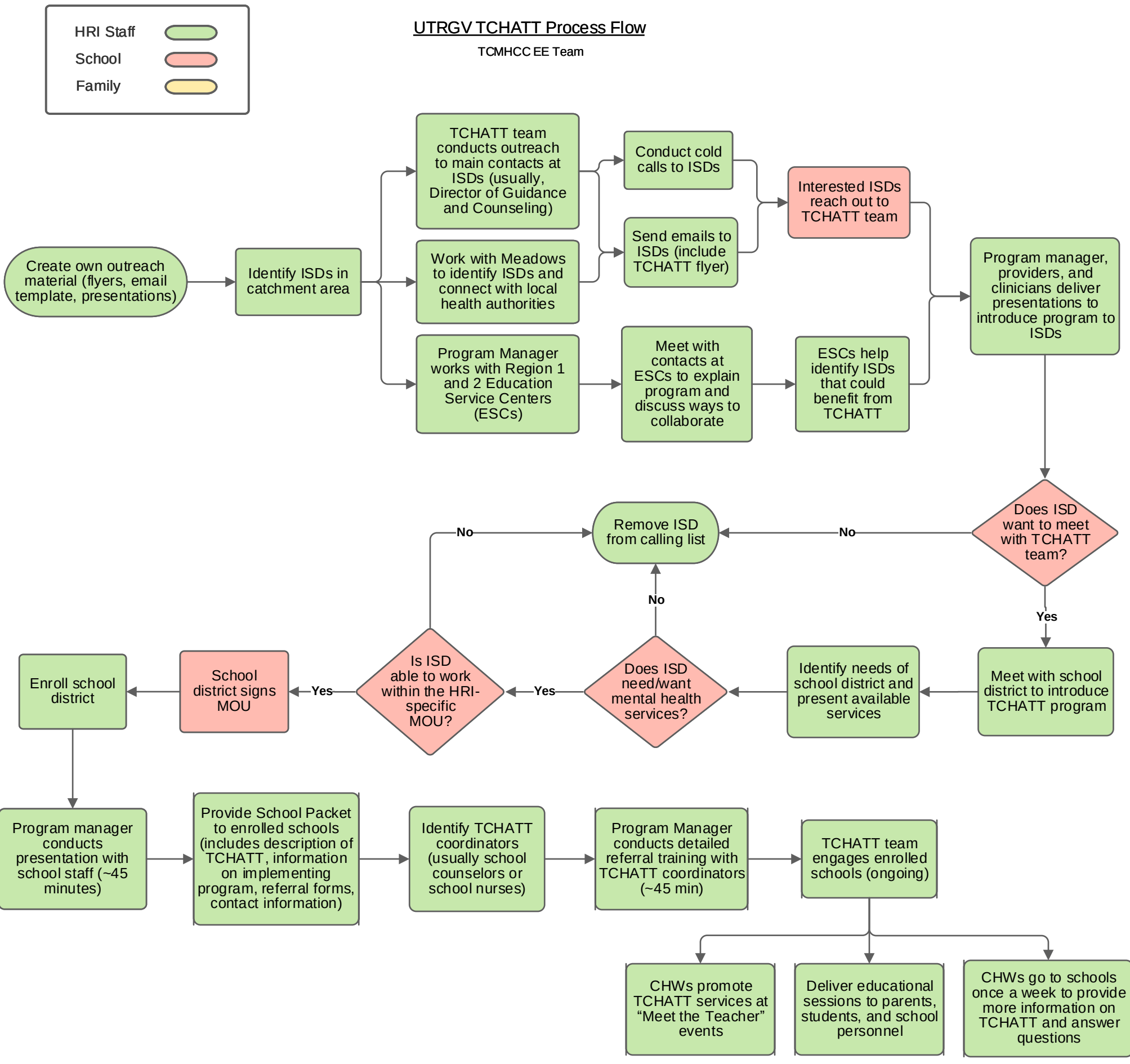
TCMHCC EE Team



UTMB Galveston TCHAT Process Flow

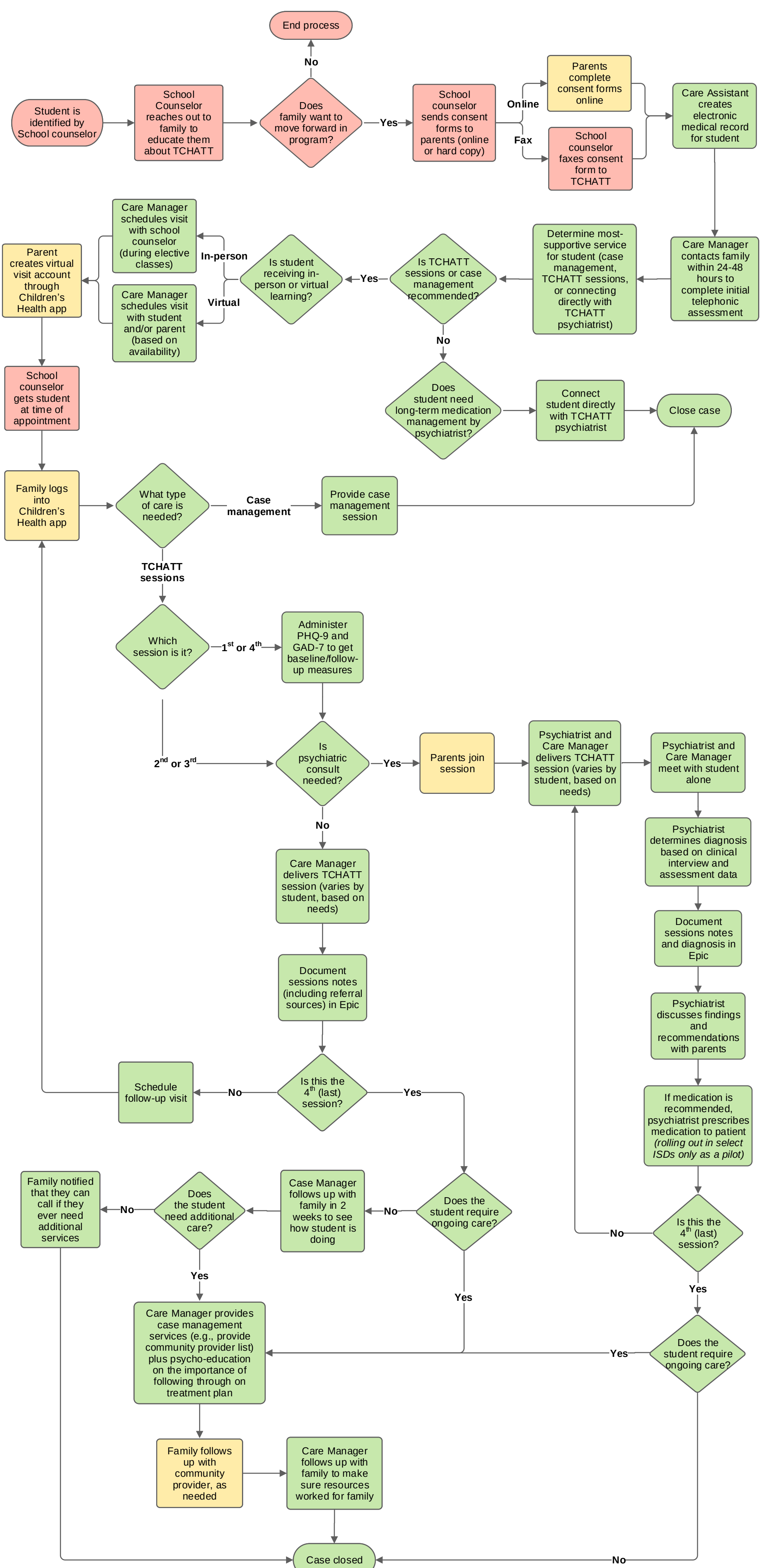
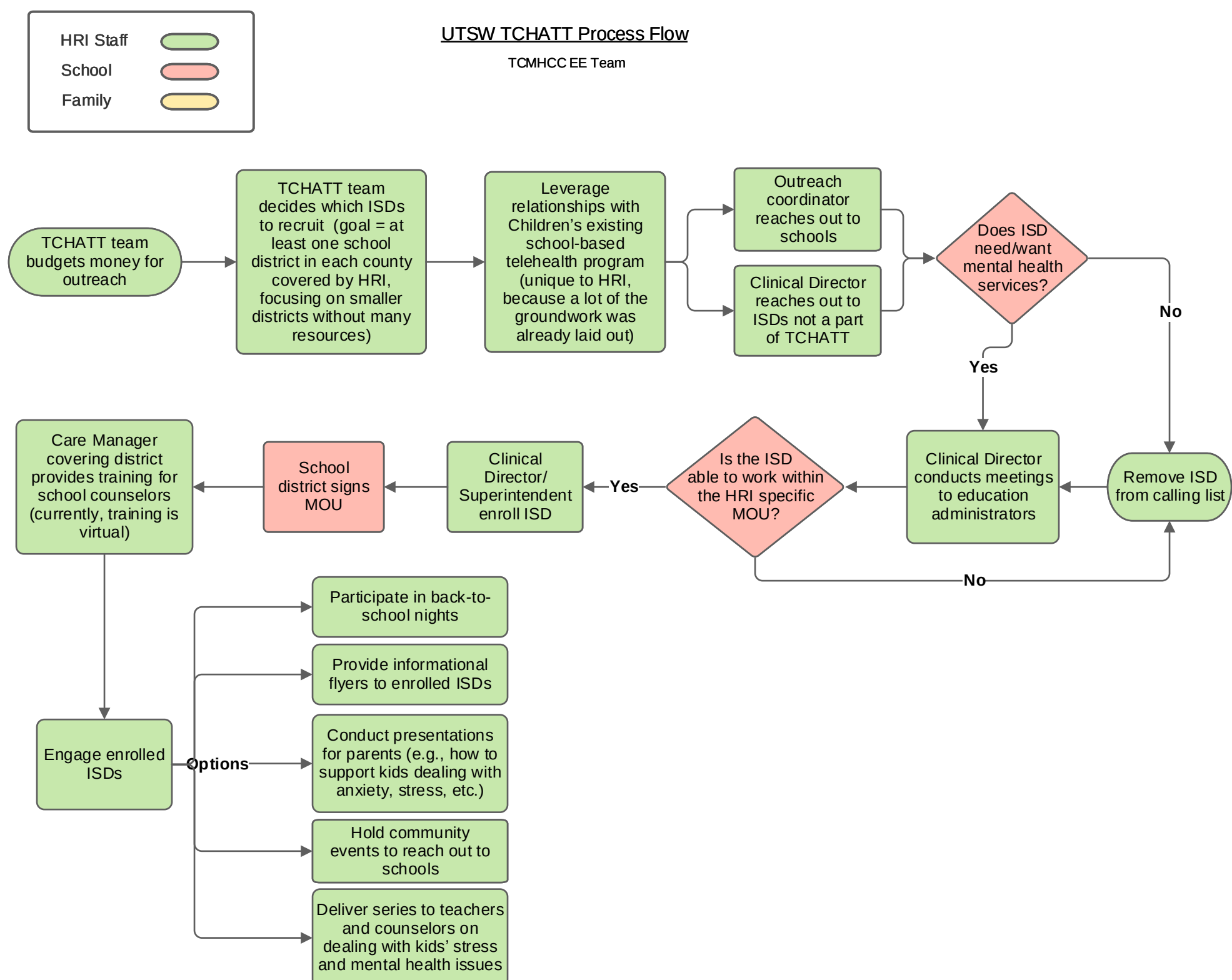
TCMHCC EE Team





UTSW TCHATT Process Flow

TCMHCC EE Team

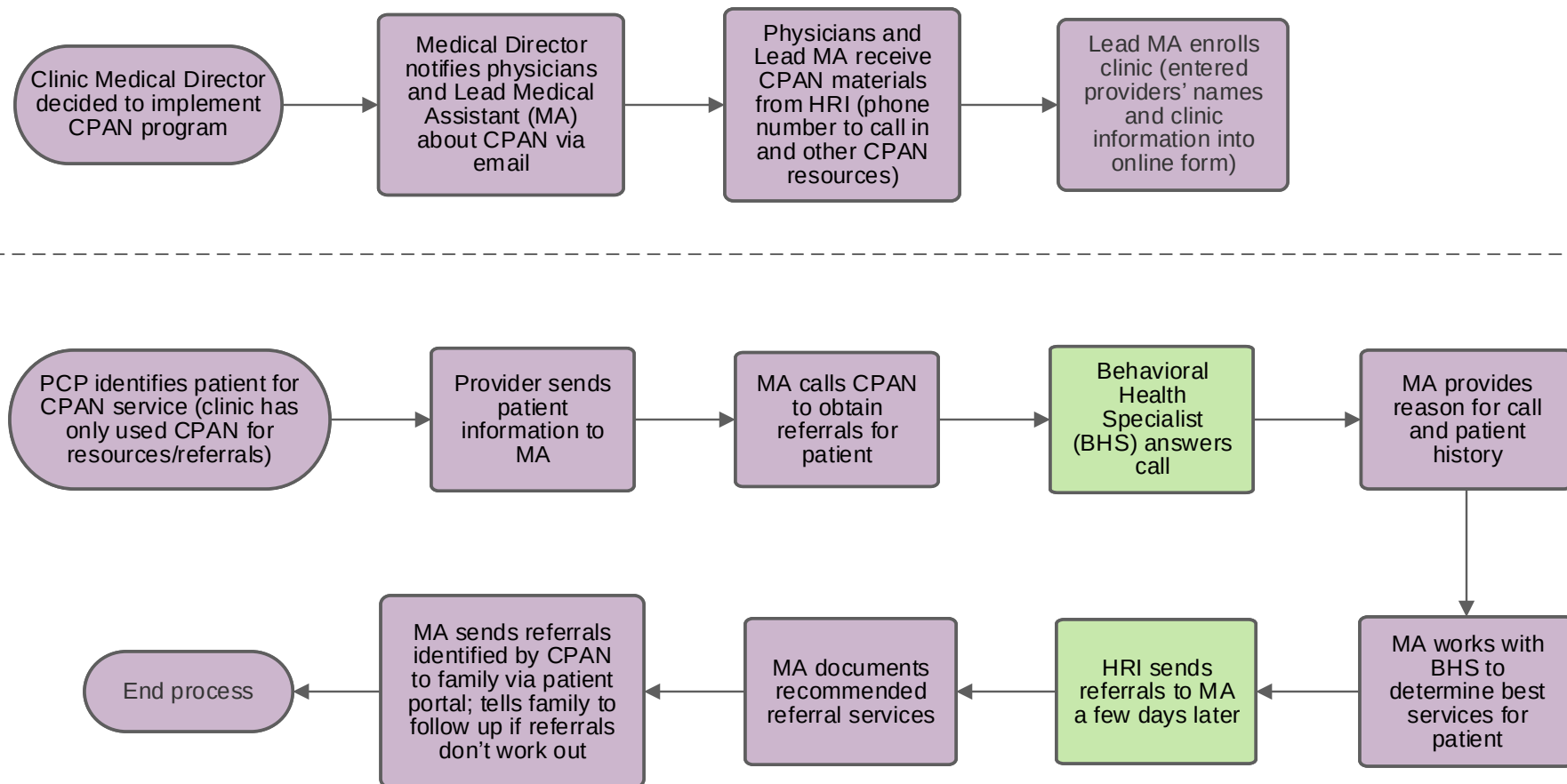


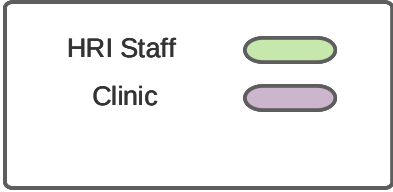
ABC Pediatric CPAN Process Flow

HRI Staff

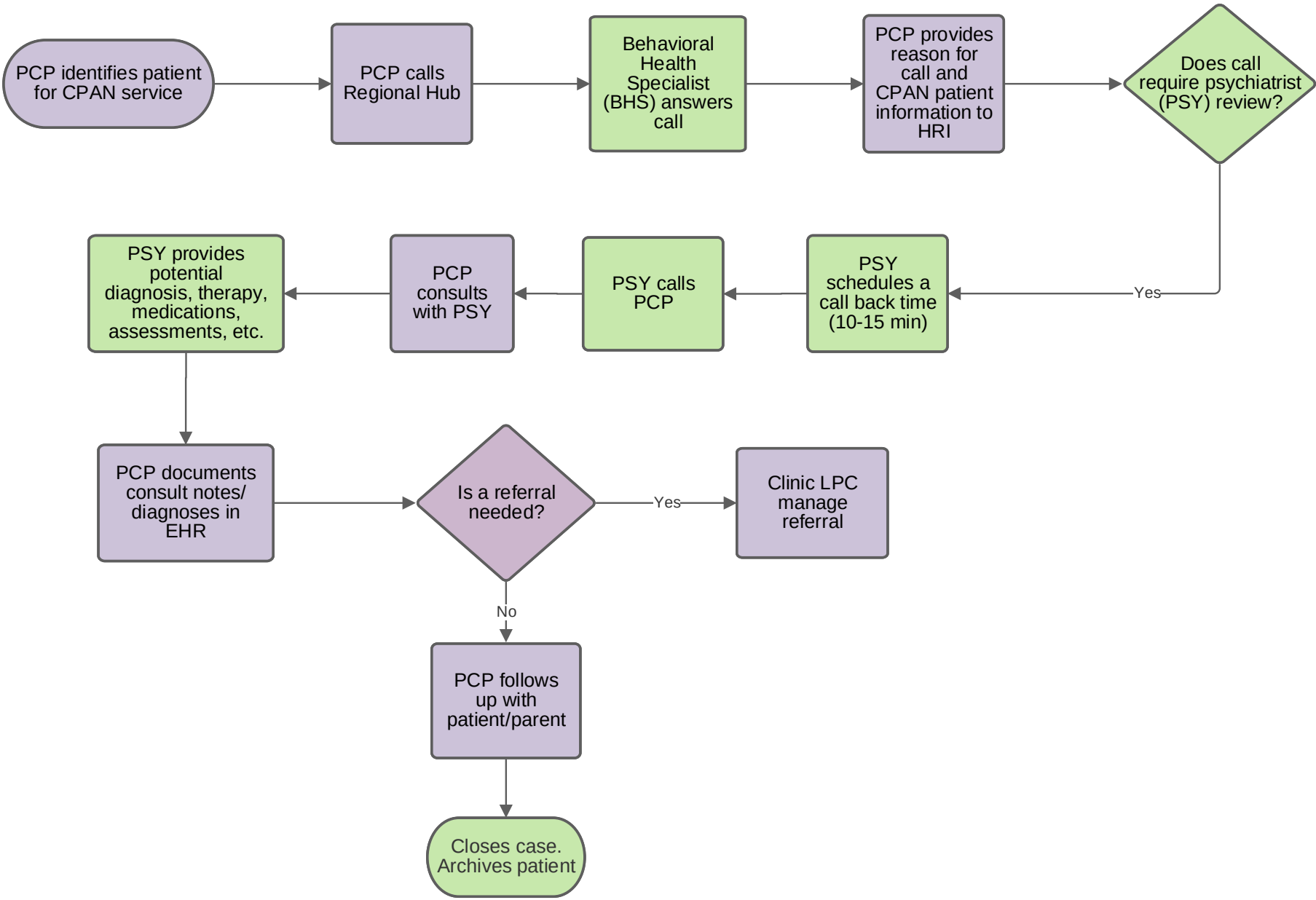
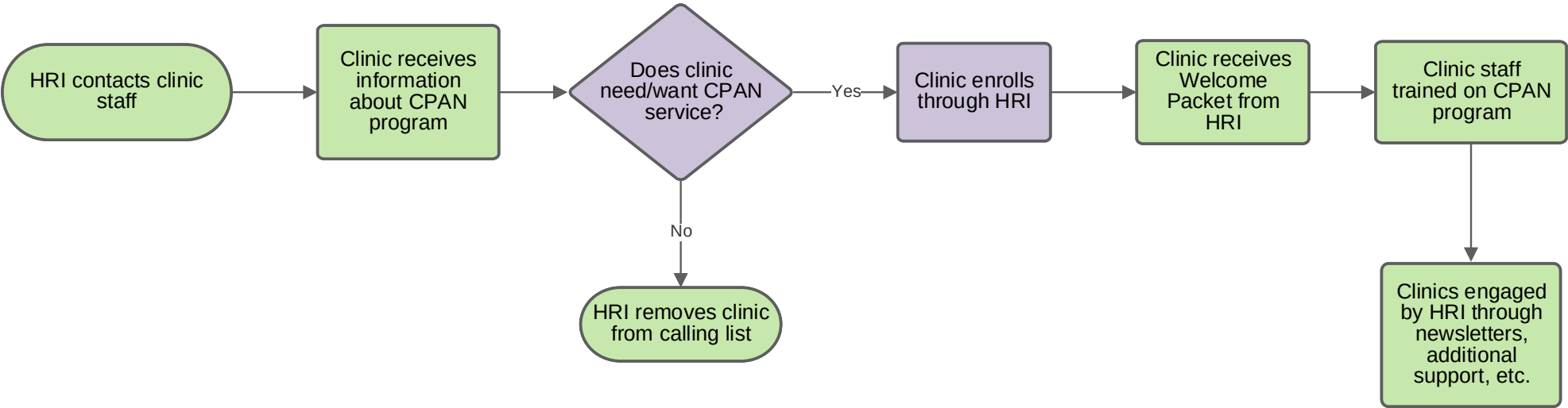


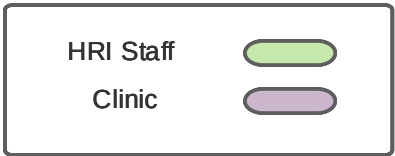
Clinic



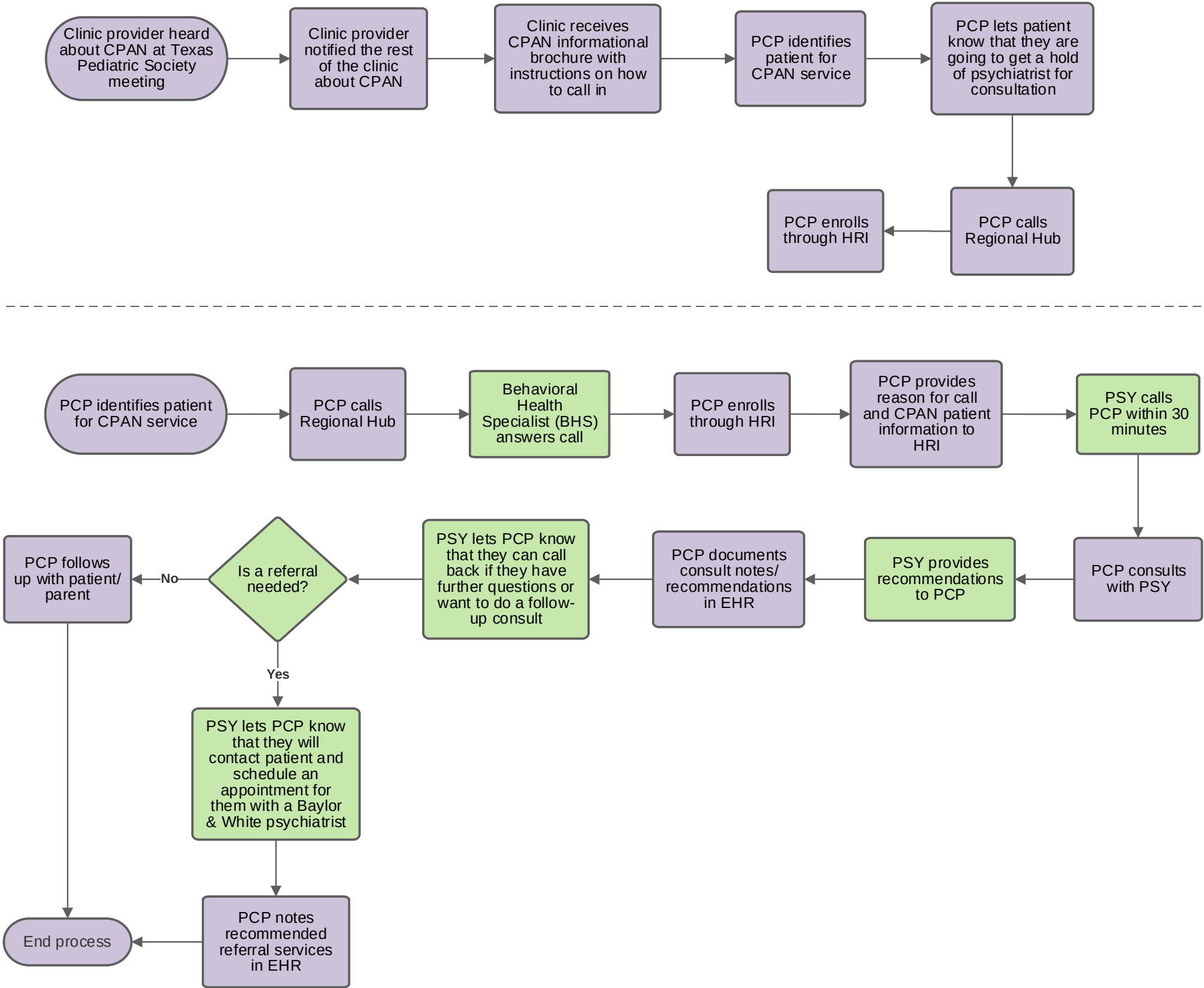


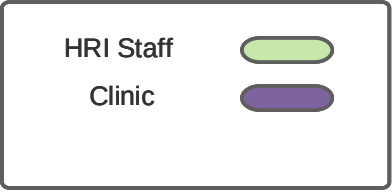
Amistad Community Health Center CPAN Process Flow



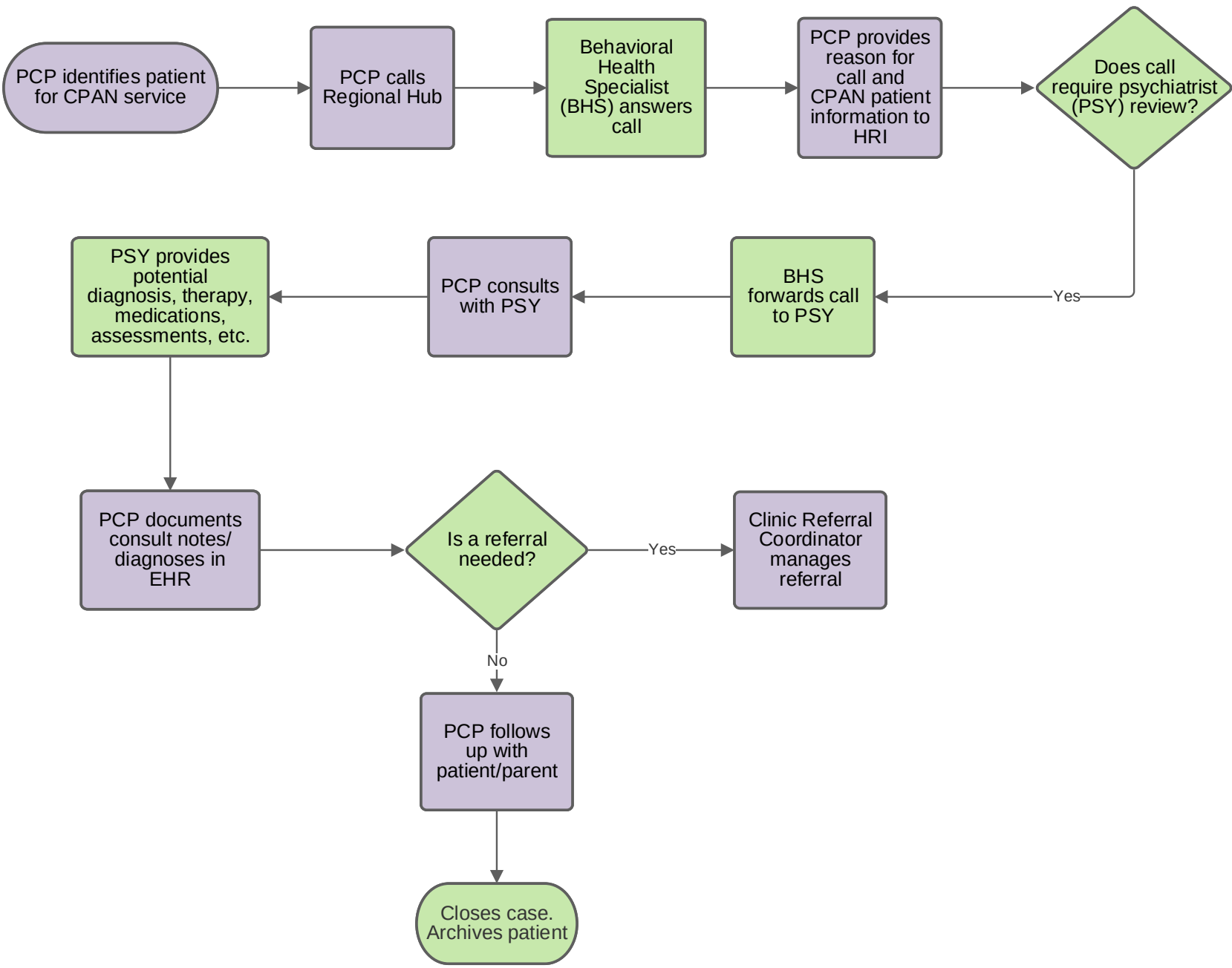
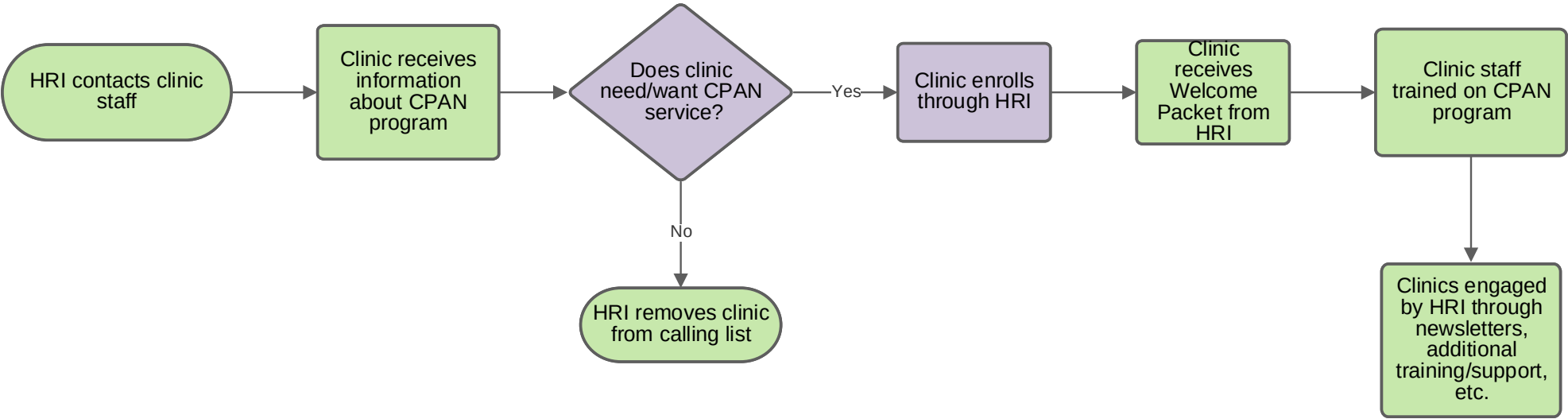


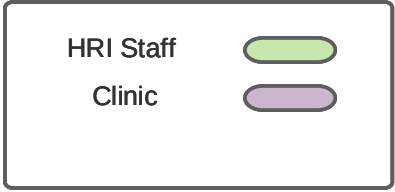
Baylor Scott & White CPAN Process Flow



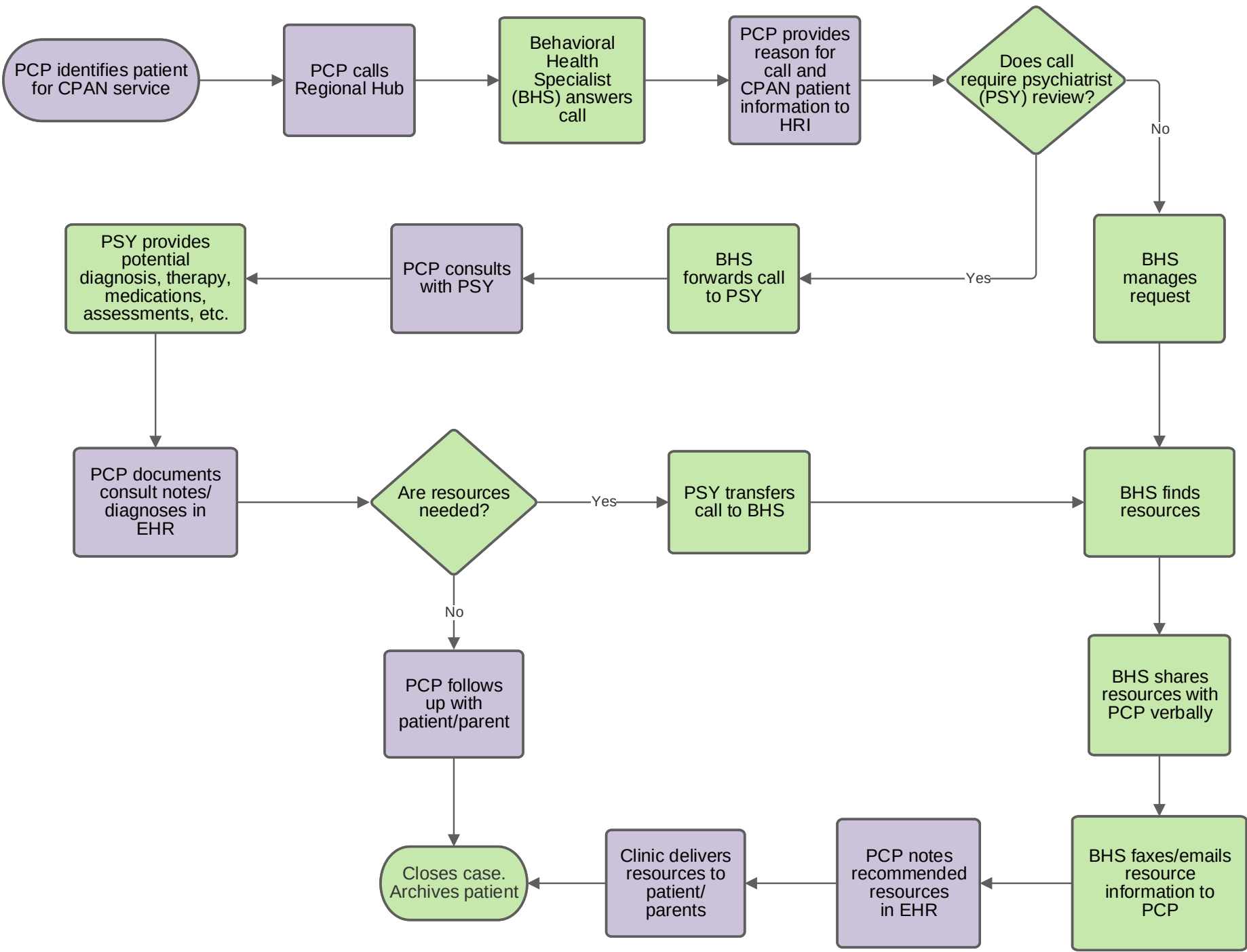
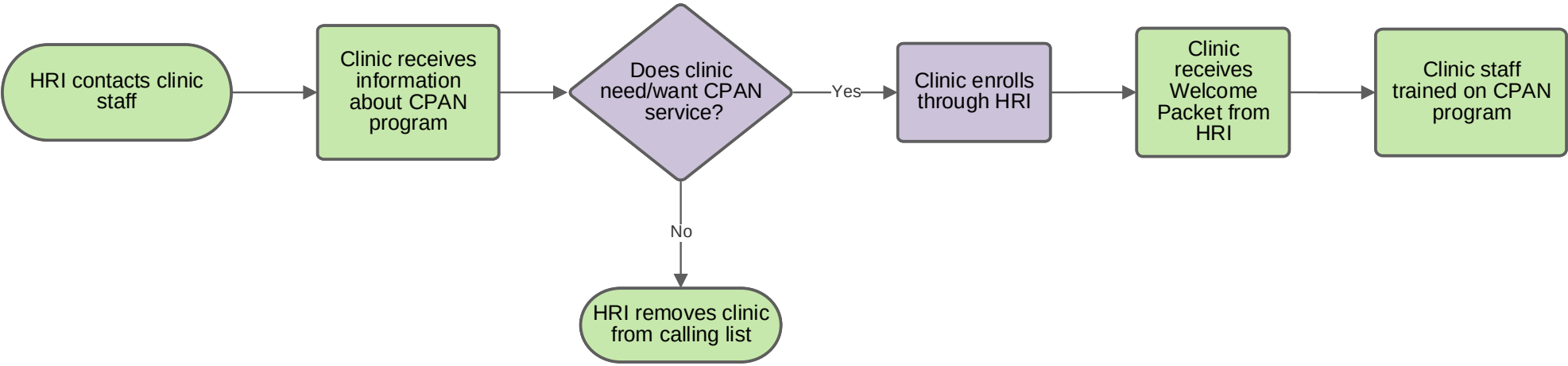


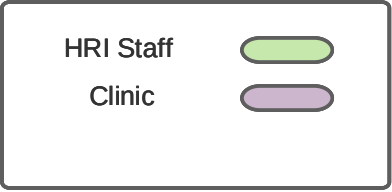
Building Blocks CPAN Process Flow



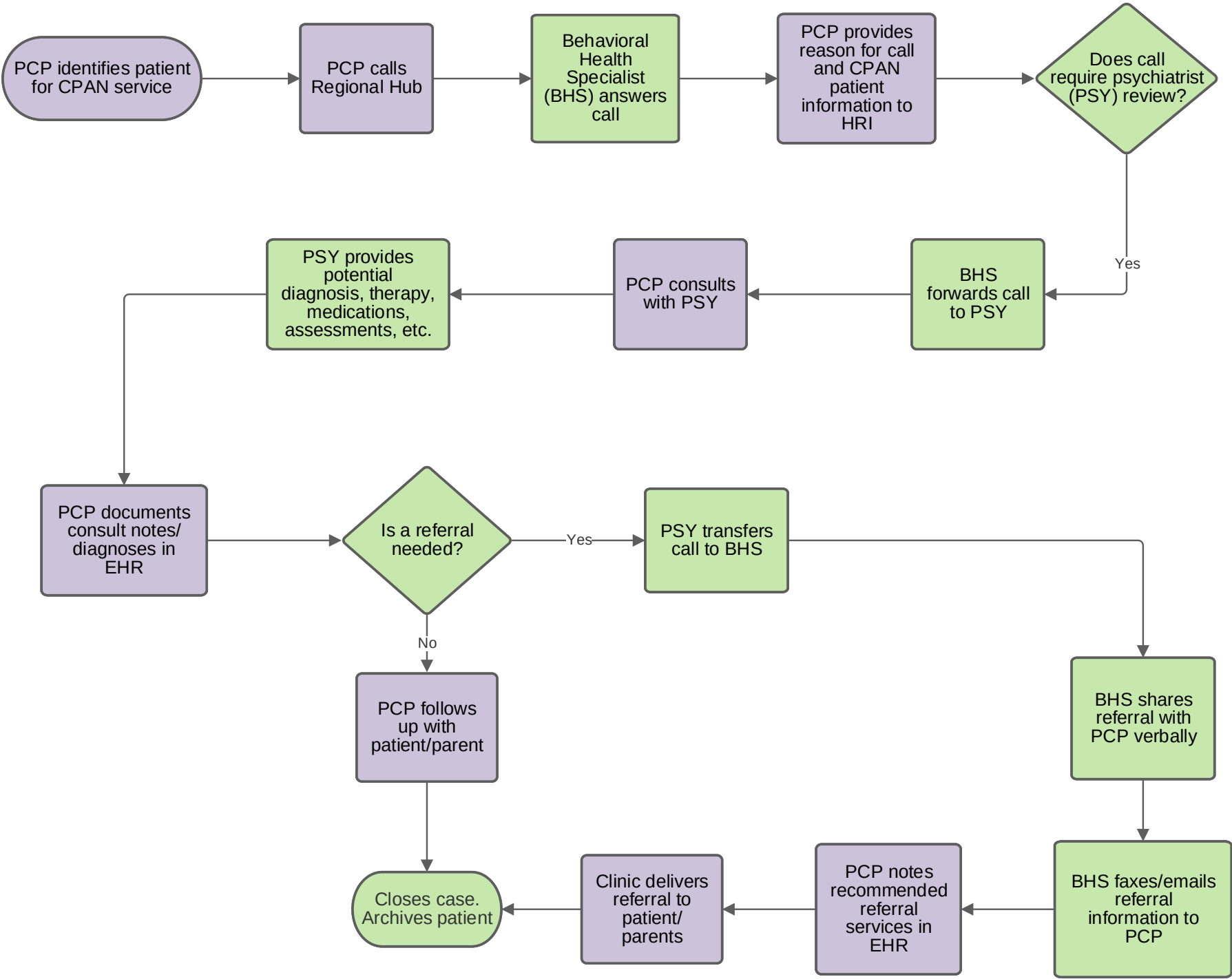
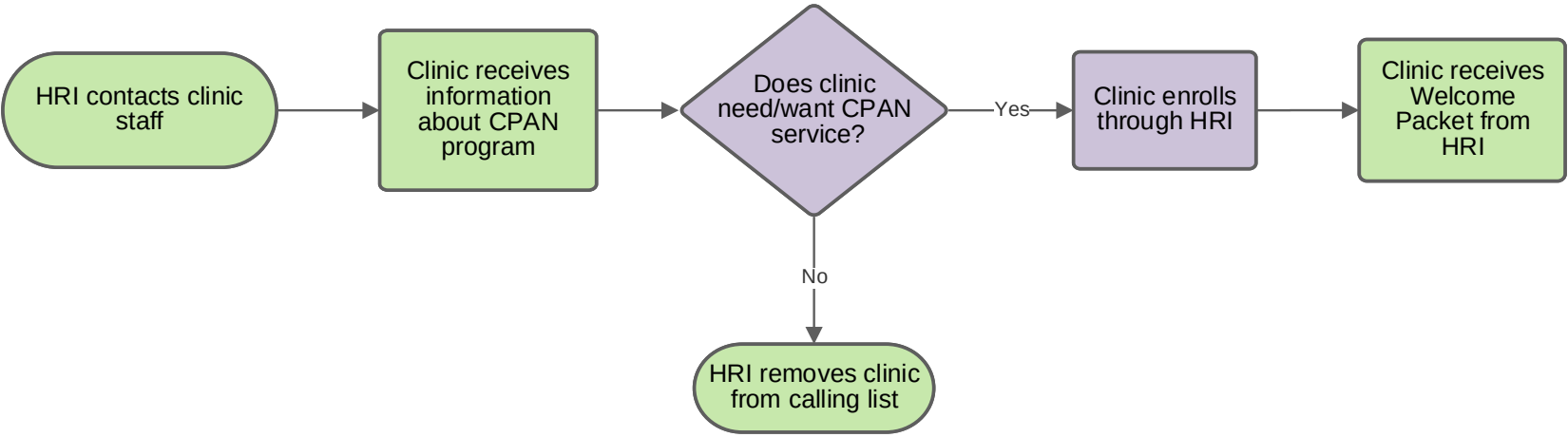


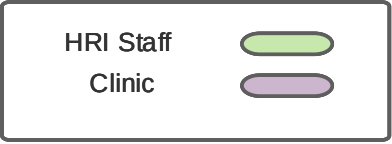
Community Health Center of Lubbock CPAN Process Flow



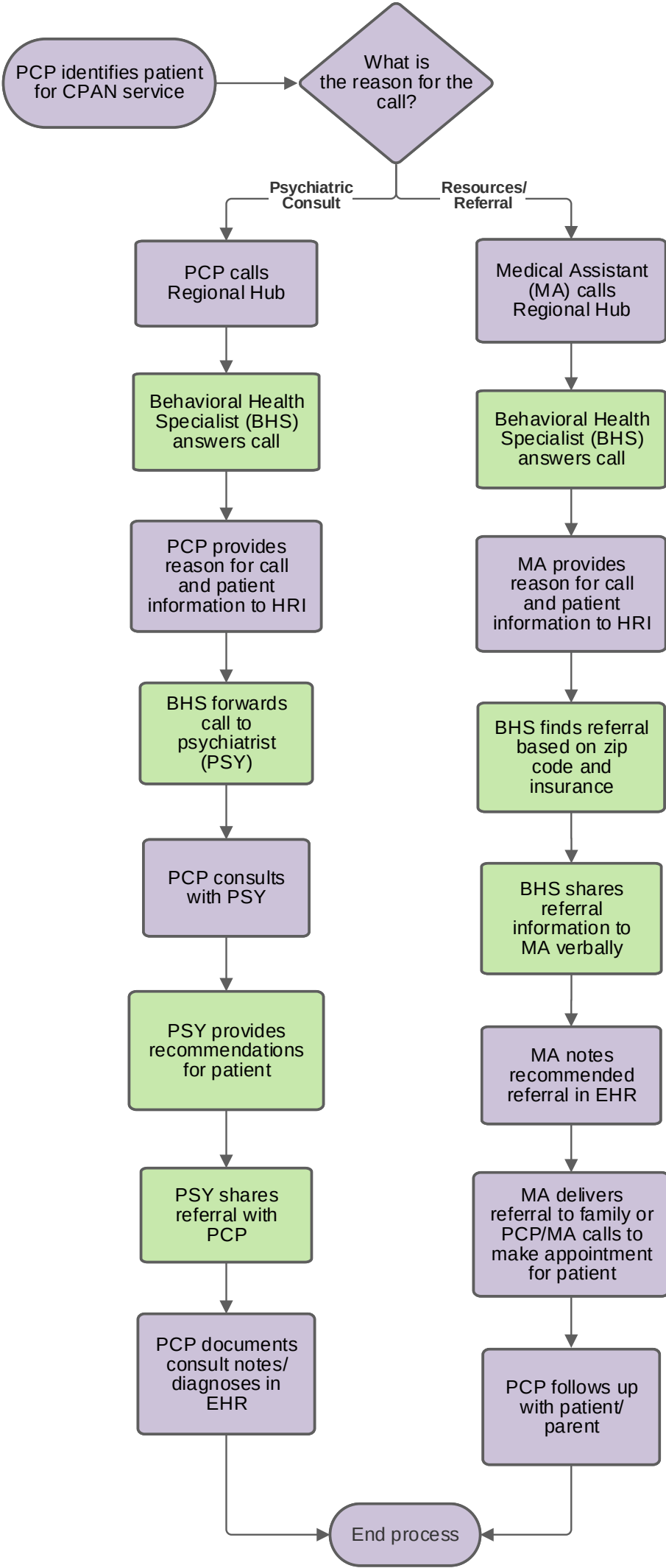
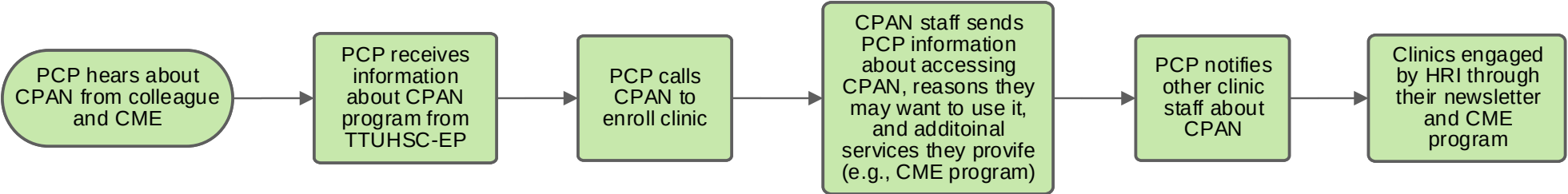


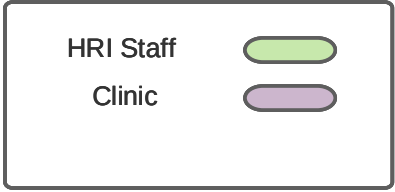
Health Services of North Texas Pediatric CPAN Process Flow



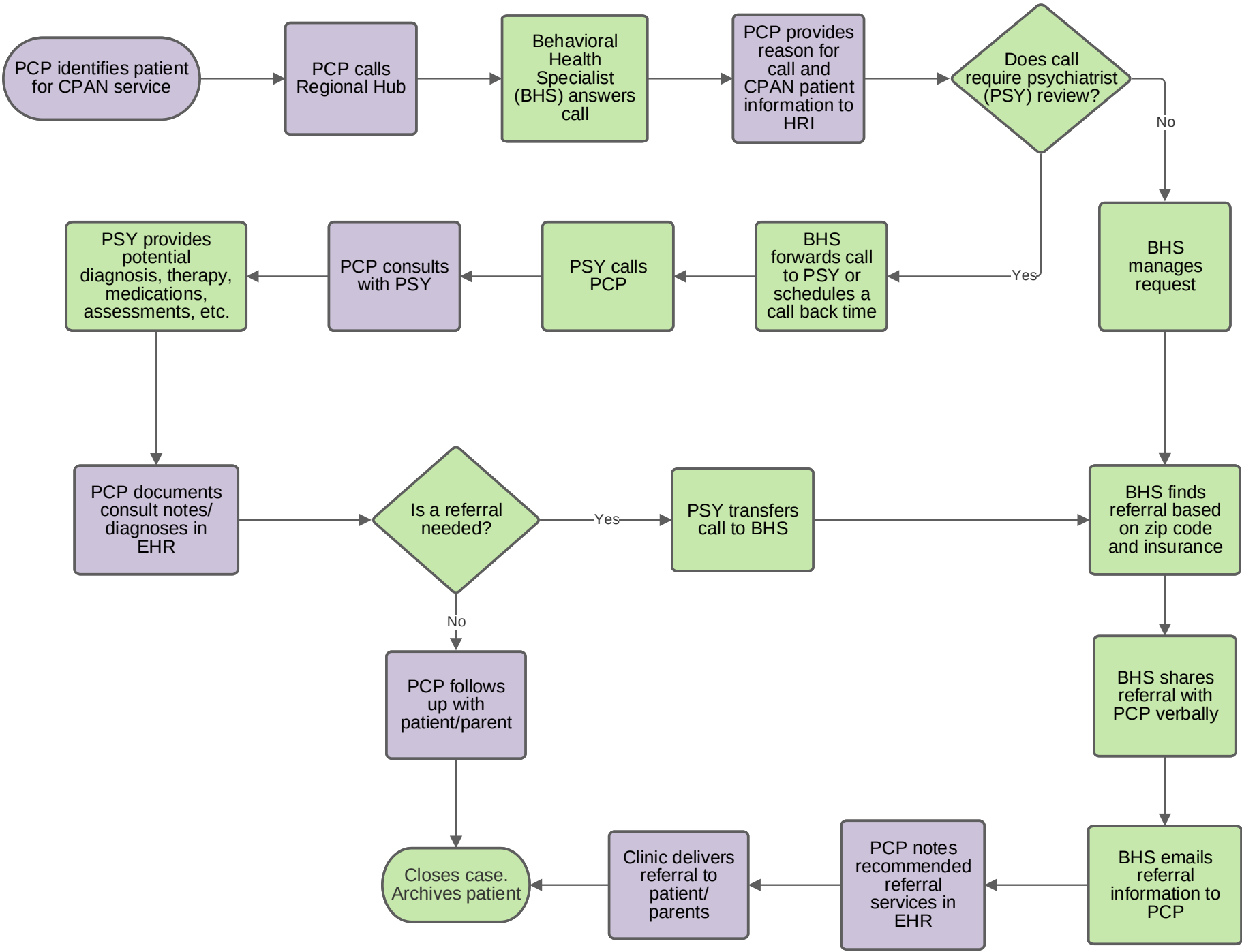
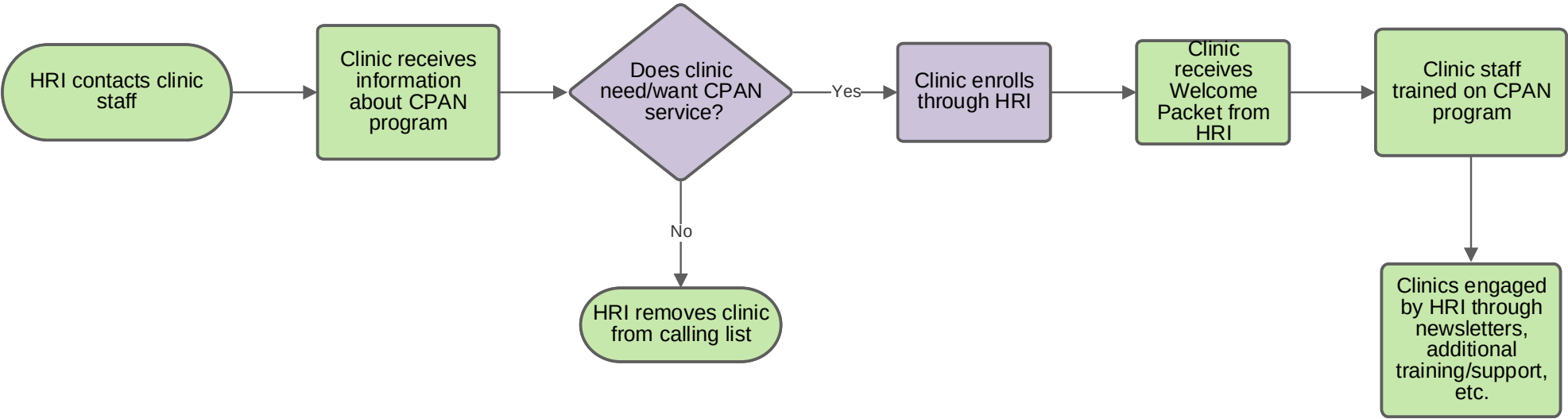


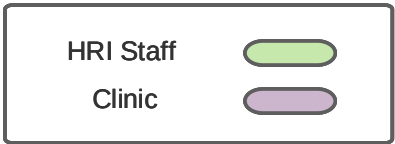
Healthy Days Pediatrics CPAN Process Flow



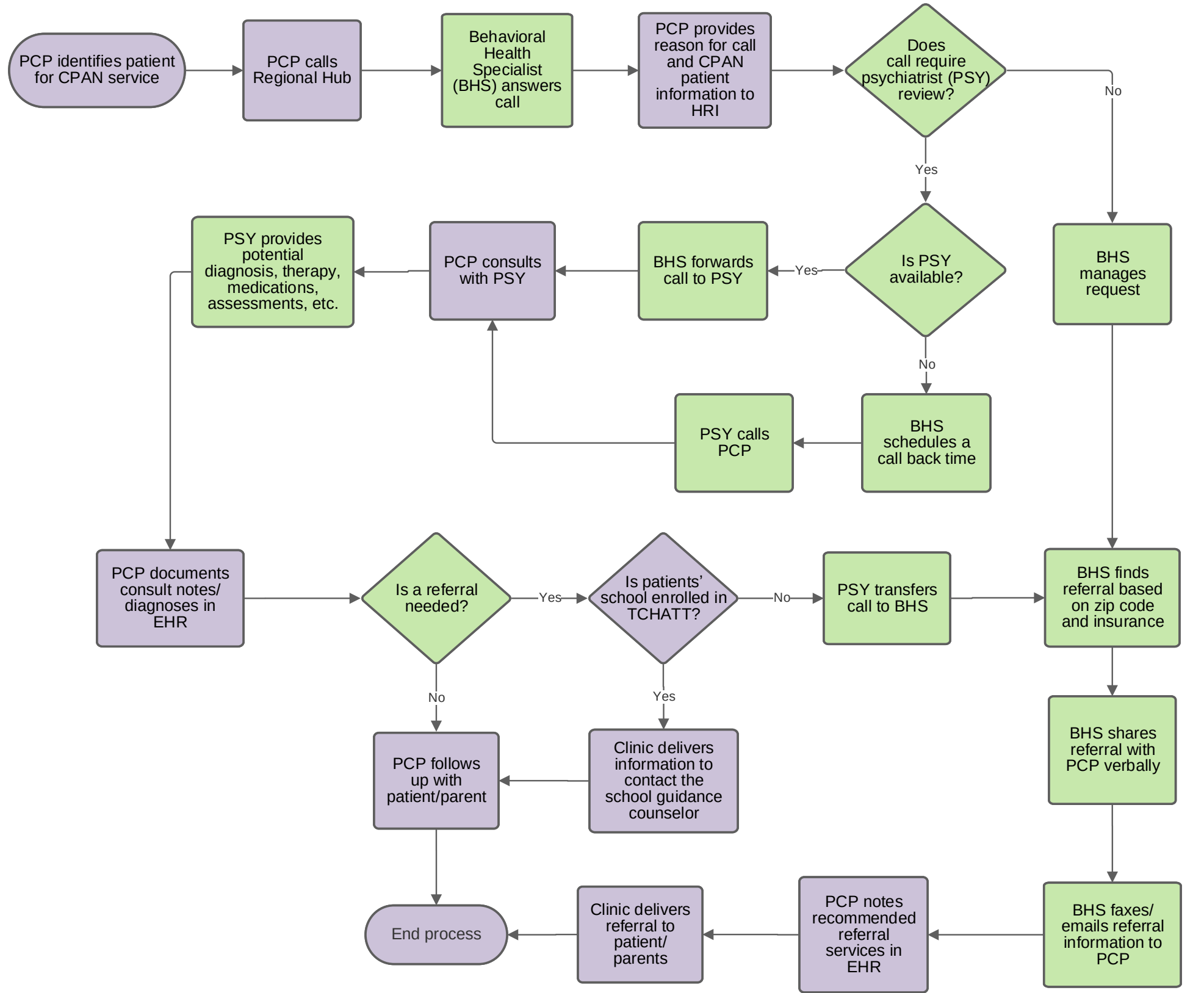
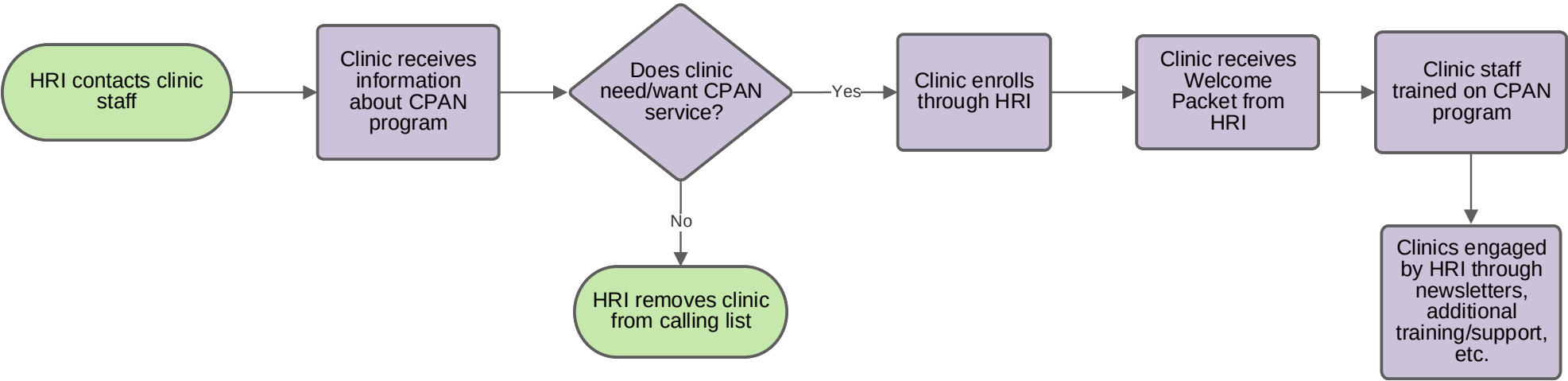


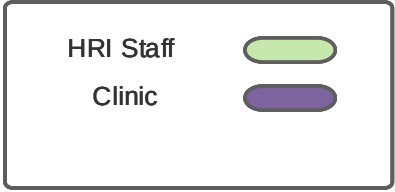
Mansfield Pediatrics CPAN Process Flow



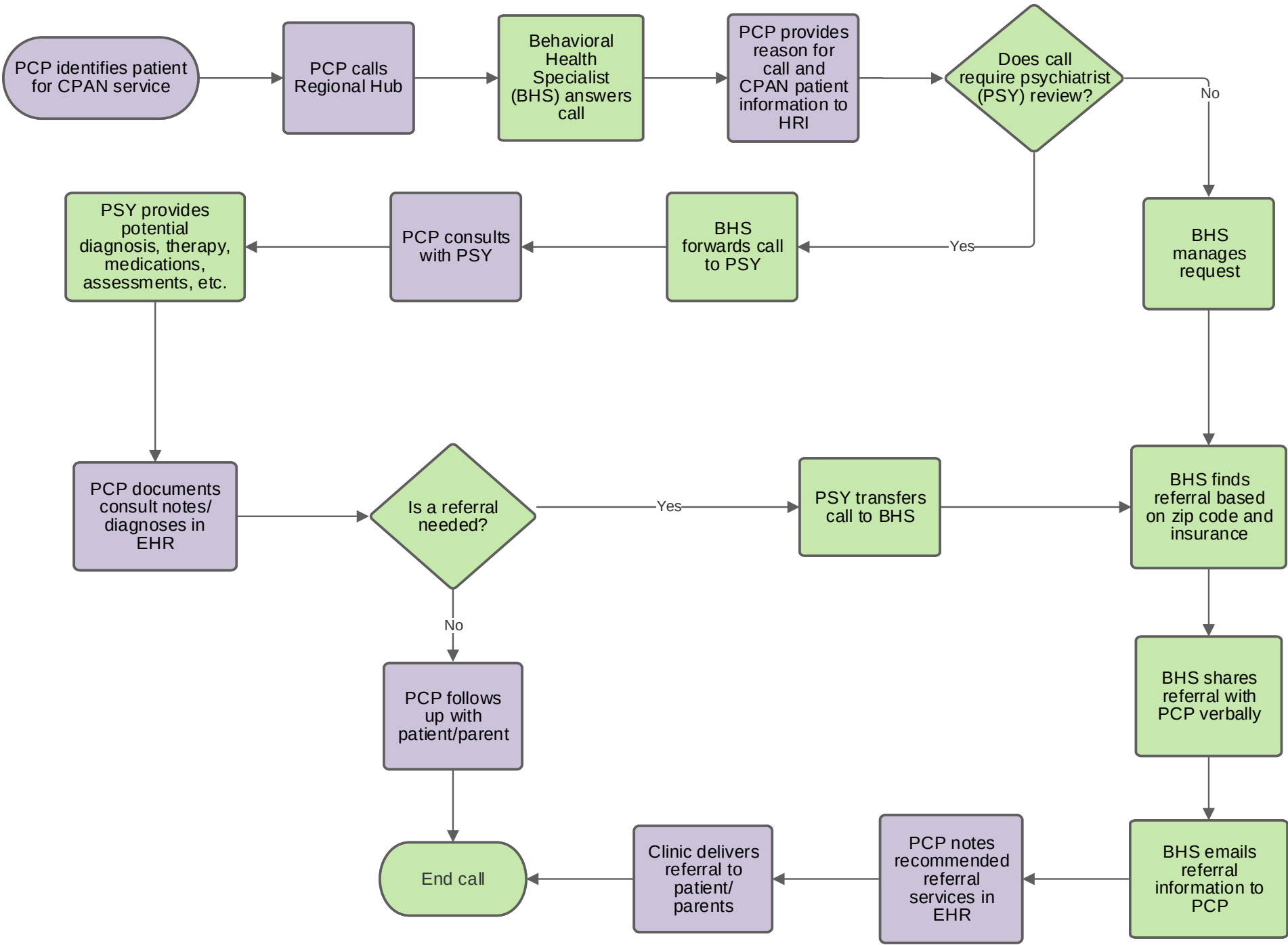
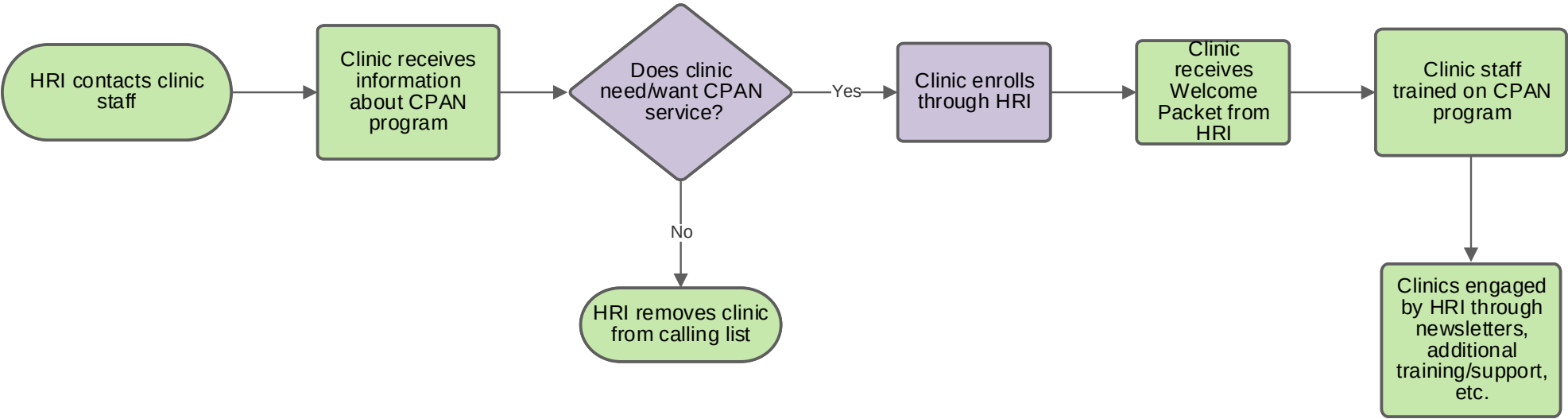


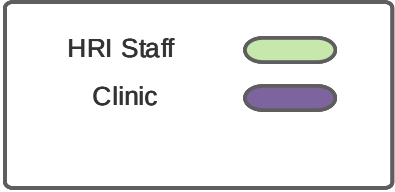
Pediatric and Adult Primary Care, Friendswood Clinic CPAN Process Flow



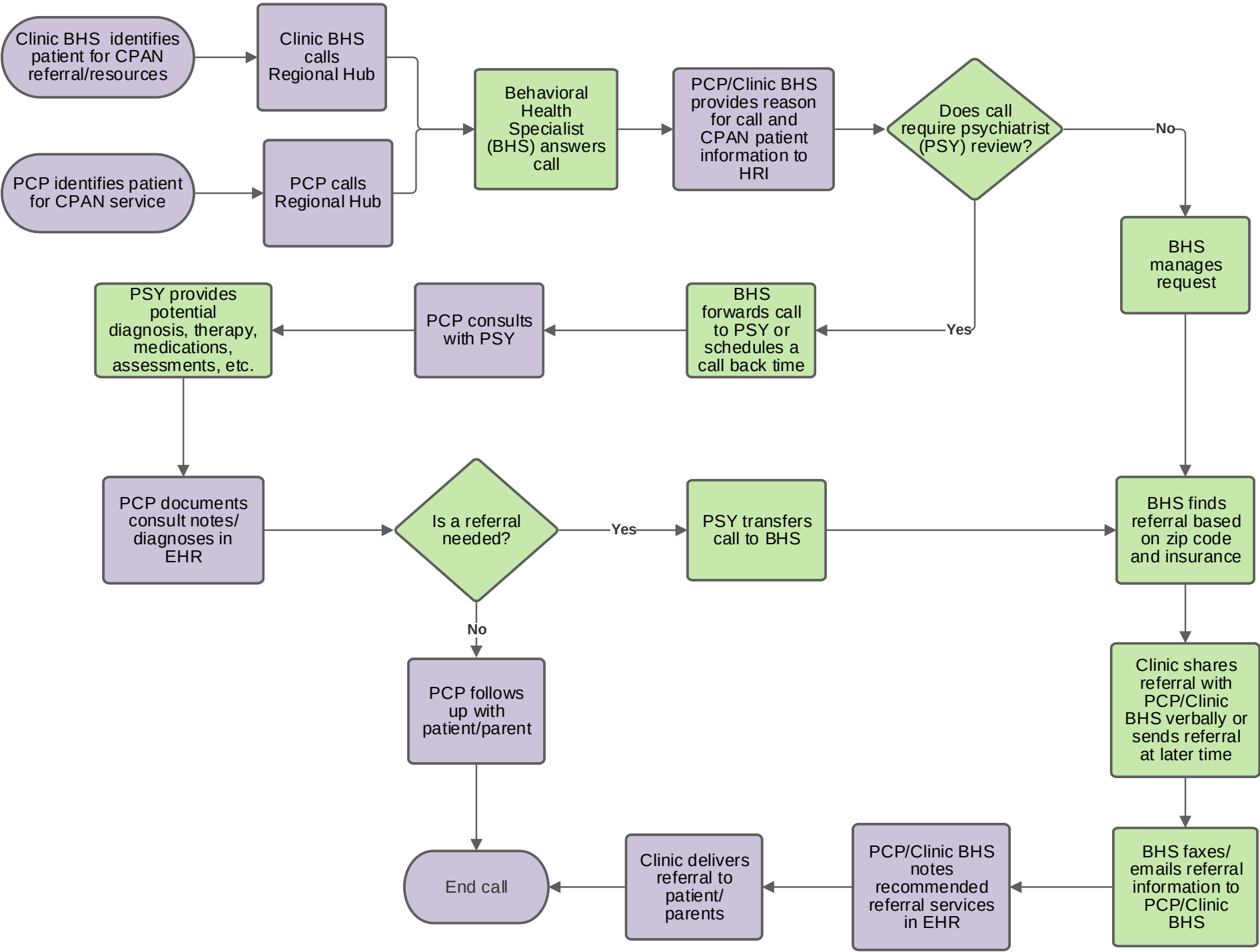
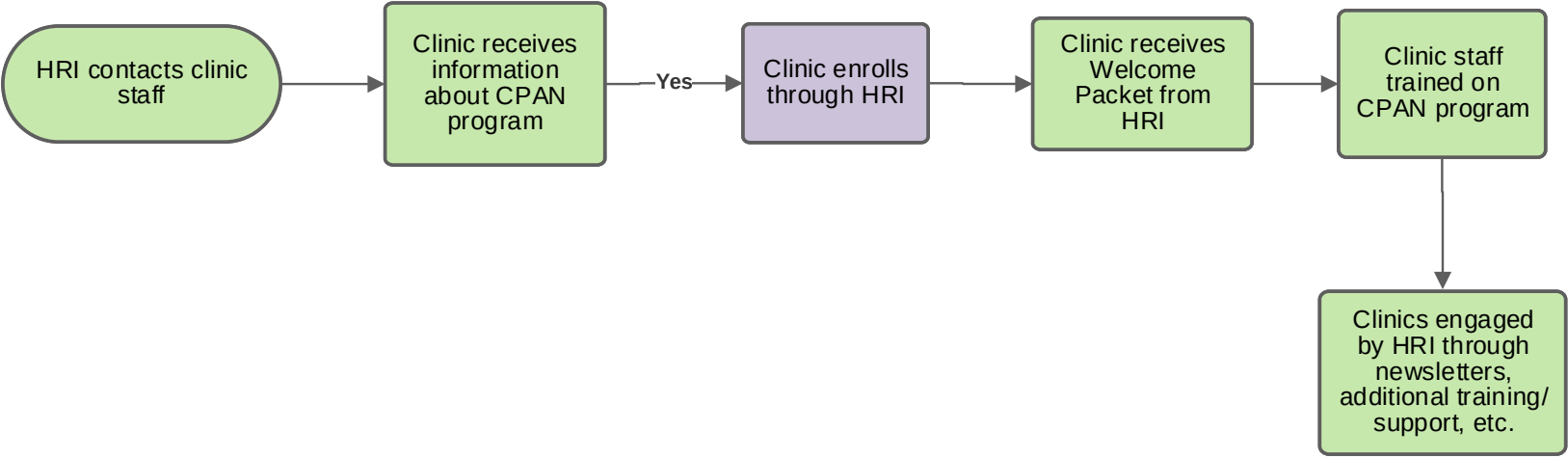


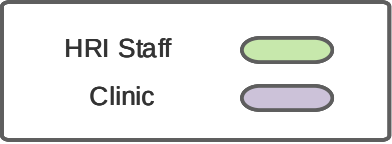
Southwest Pediatrics CPAN Process Flow



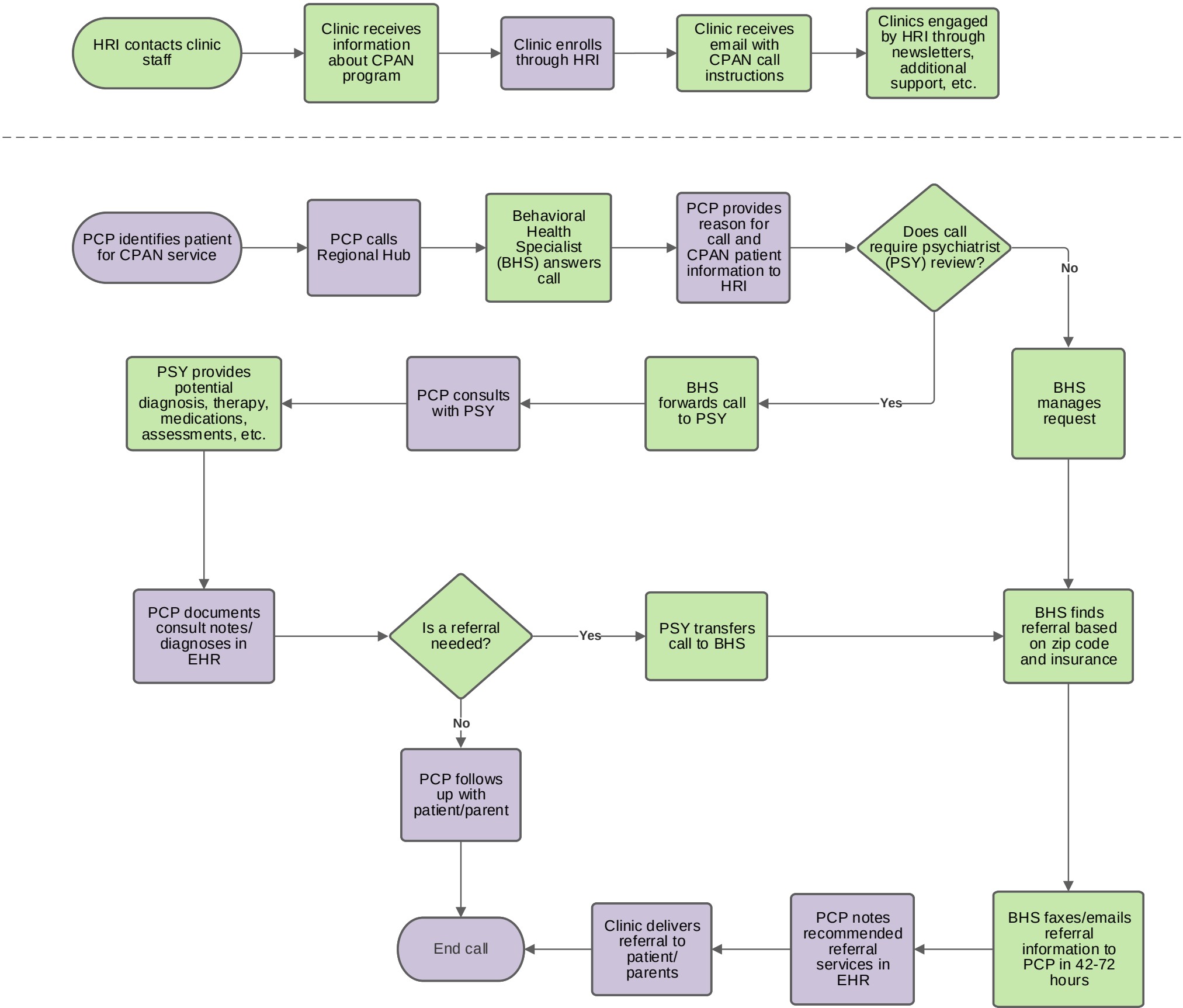


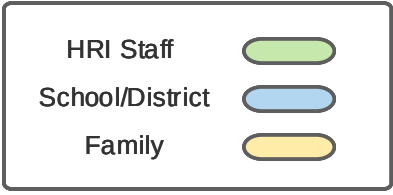
St. Paul Children's Clinic CPAN Process Flow



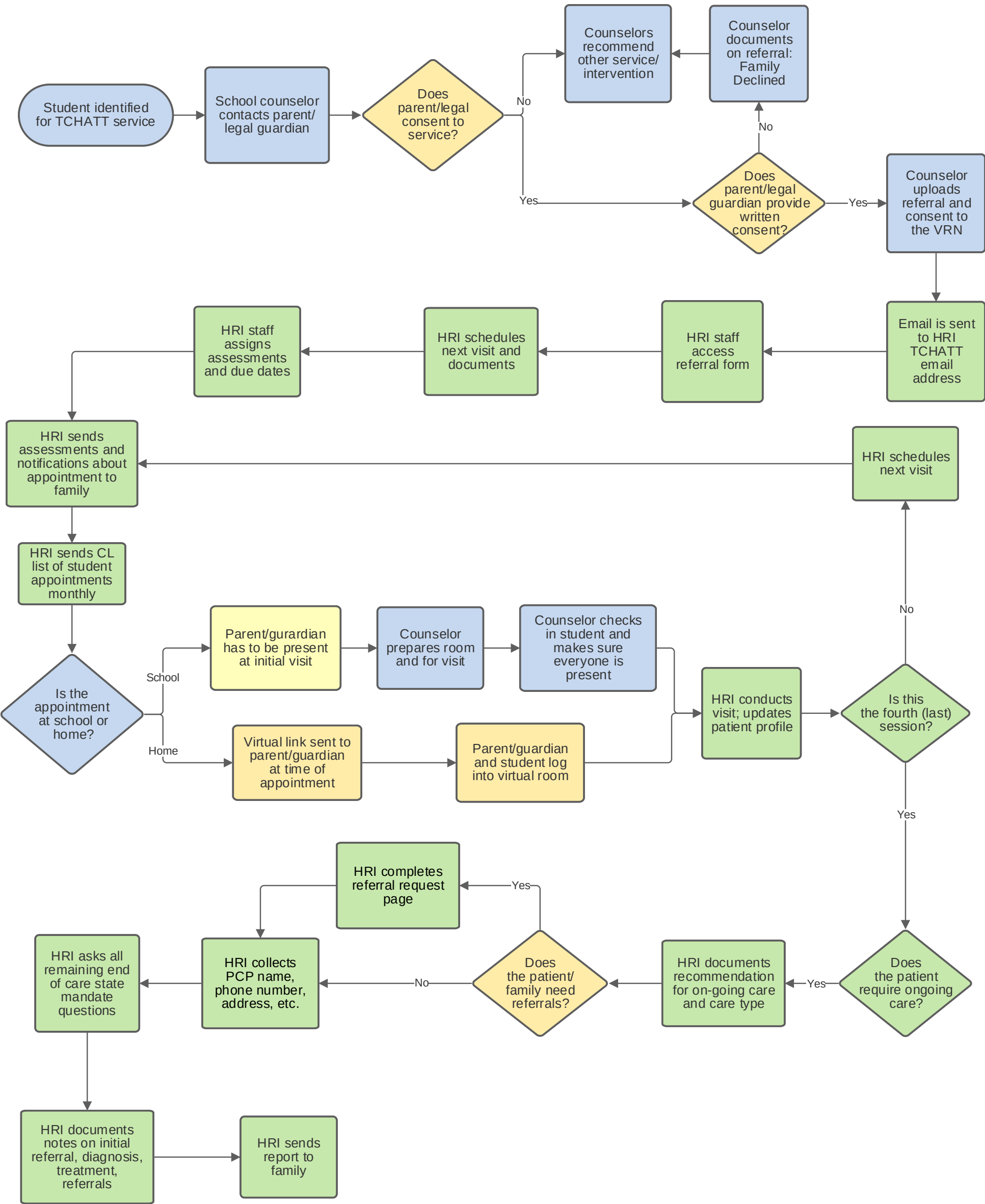
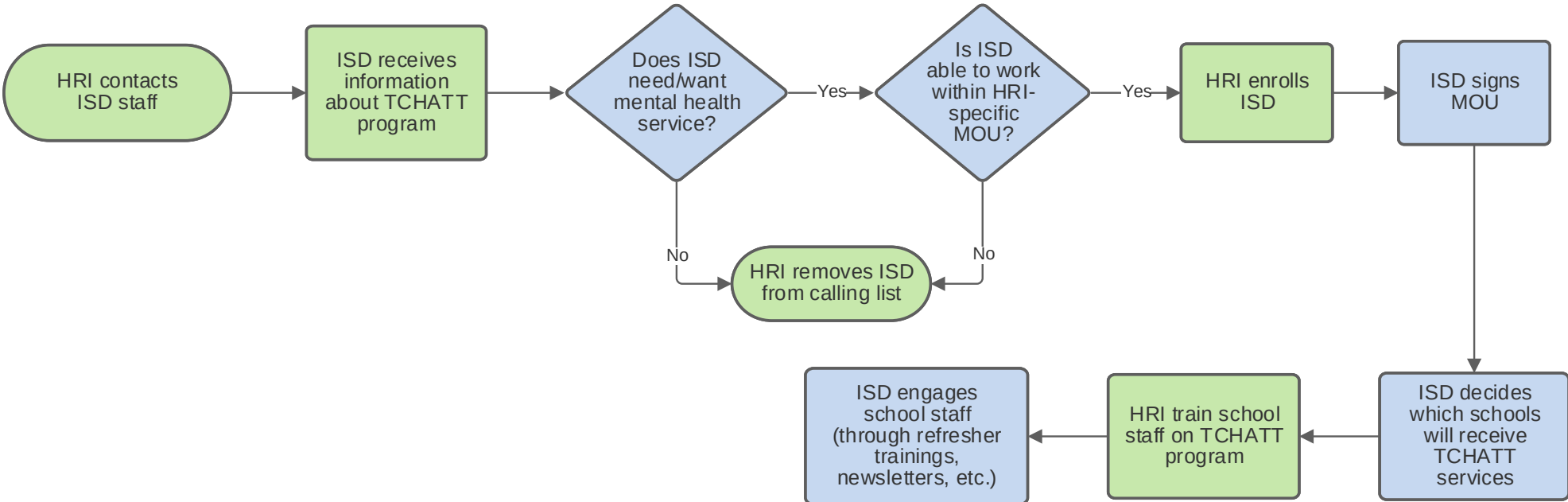


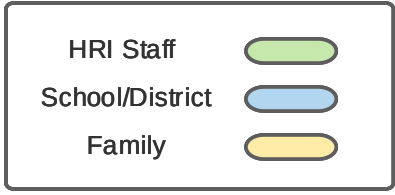
UT Physicians Pediatric Center at Bay Area CPAN Process Flow



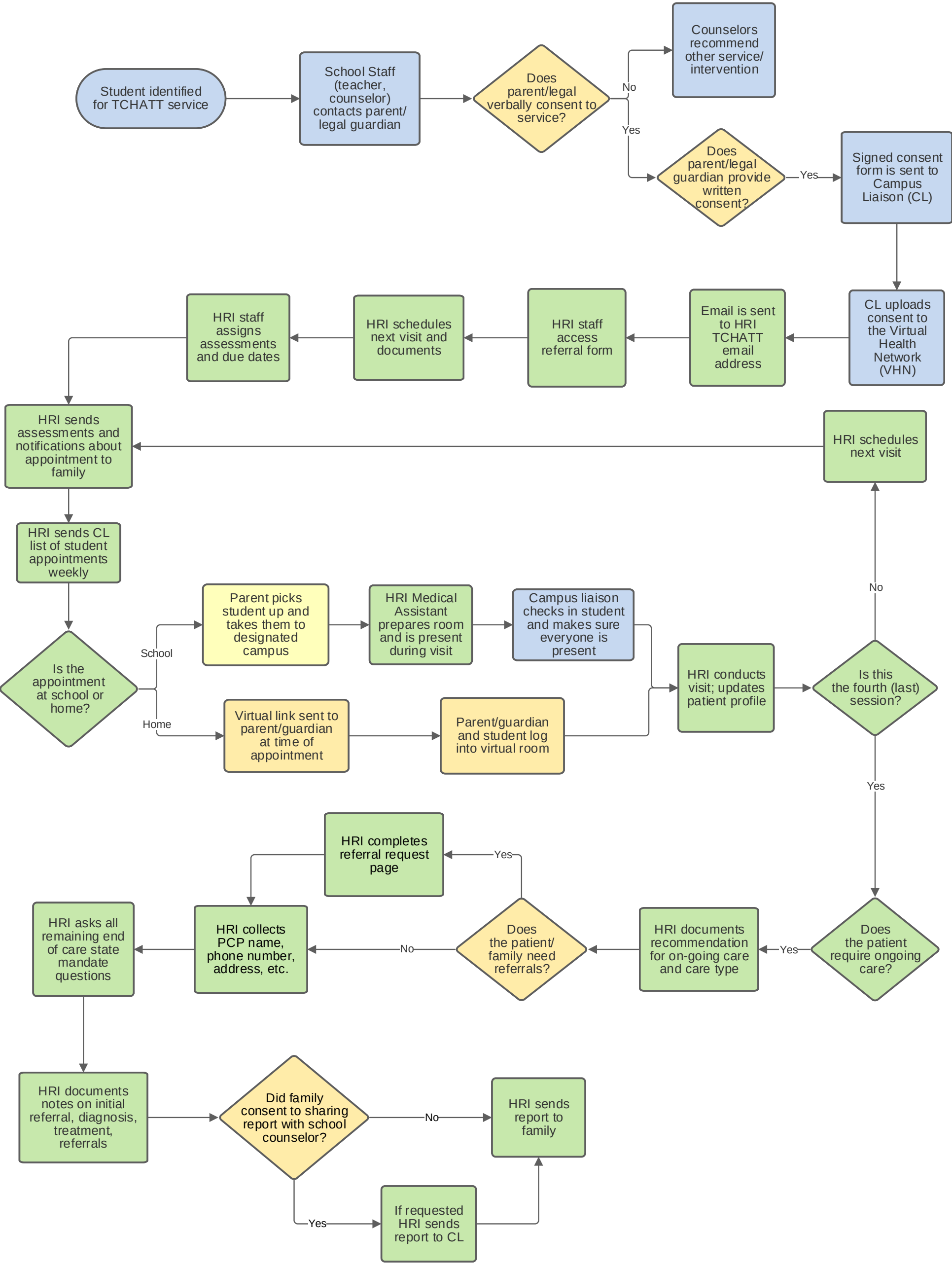
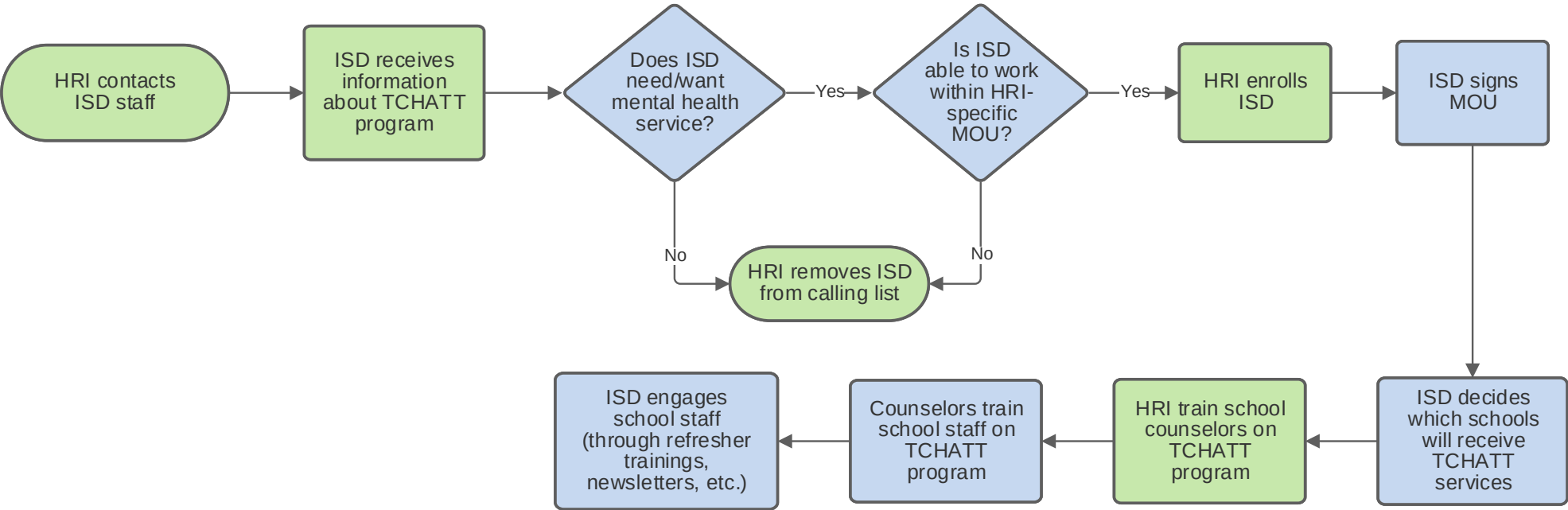


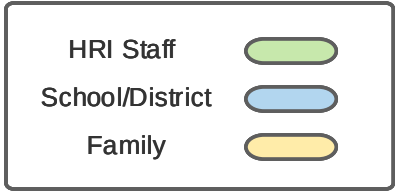
Brownsville ISD TCHATT Process Flow



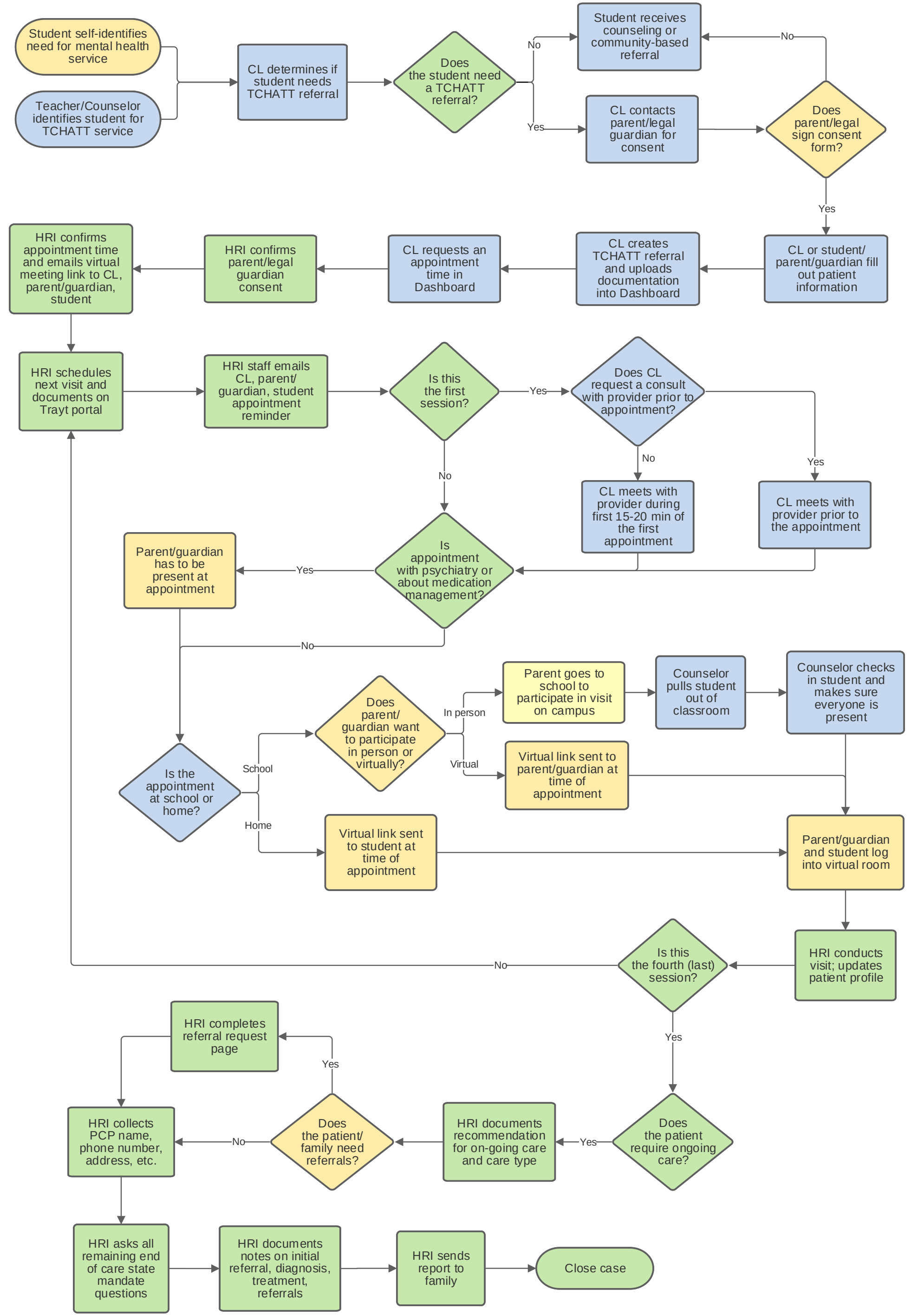
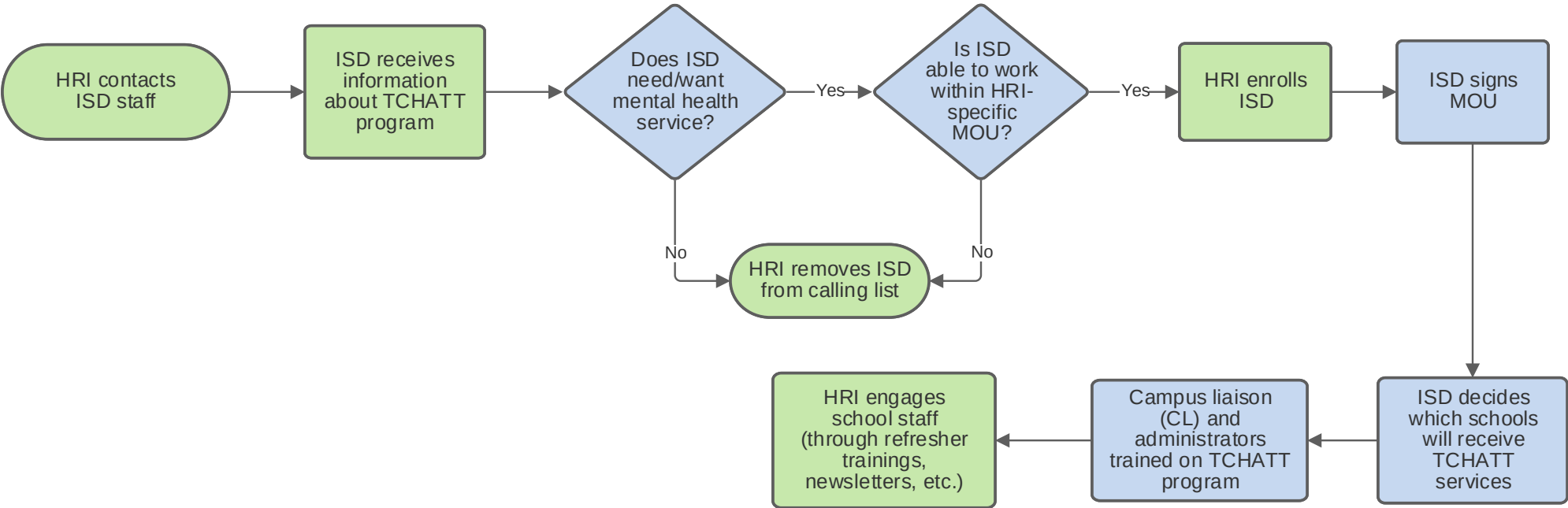


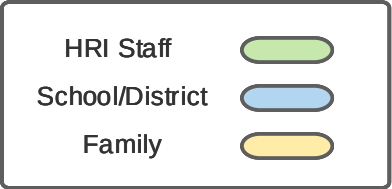
Dickinson ISD TCHATT Process Flow



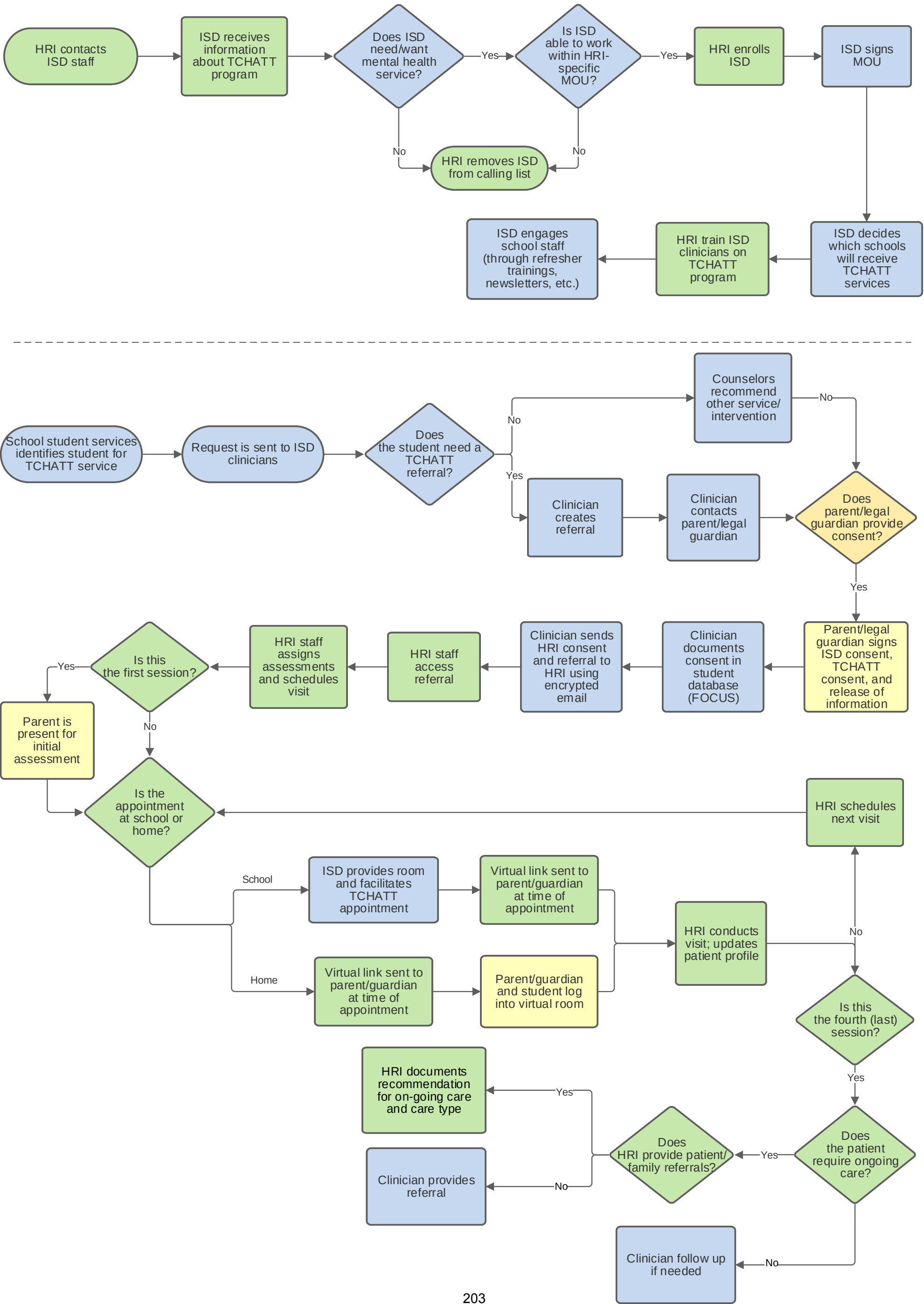


Elgin ISD TCHATT Process Flow



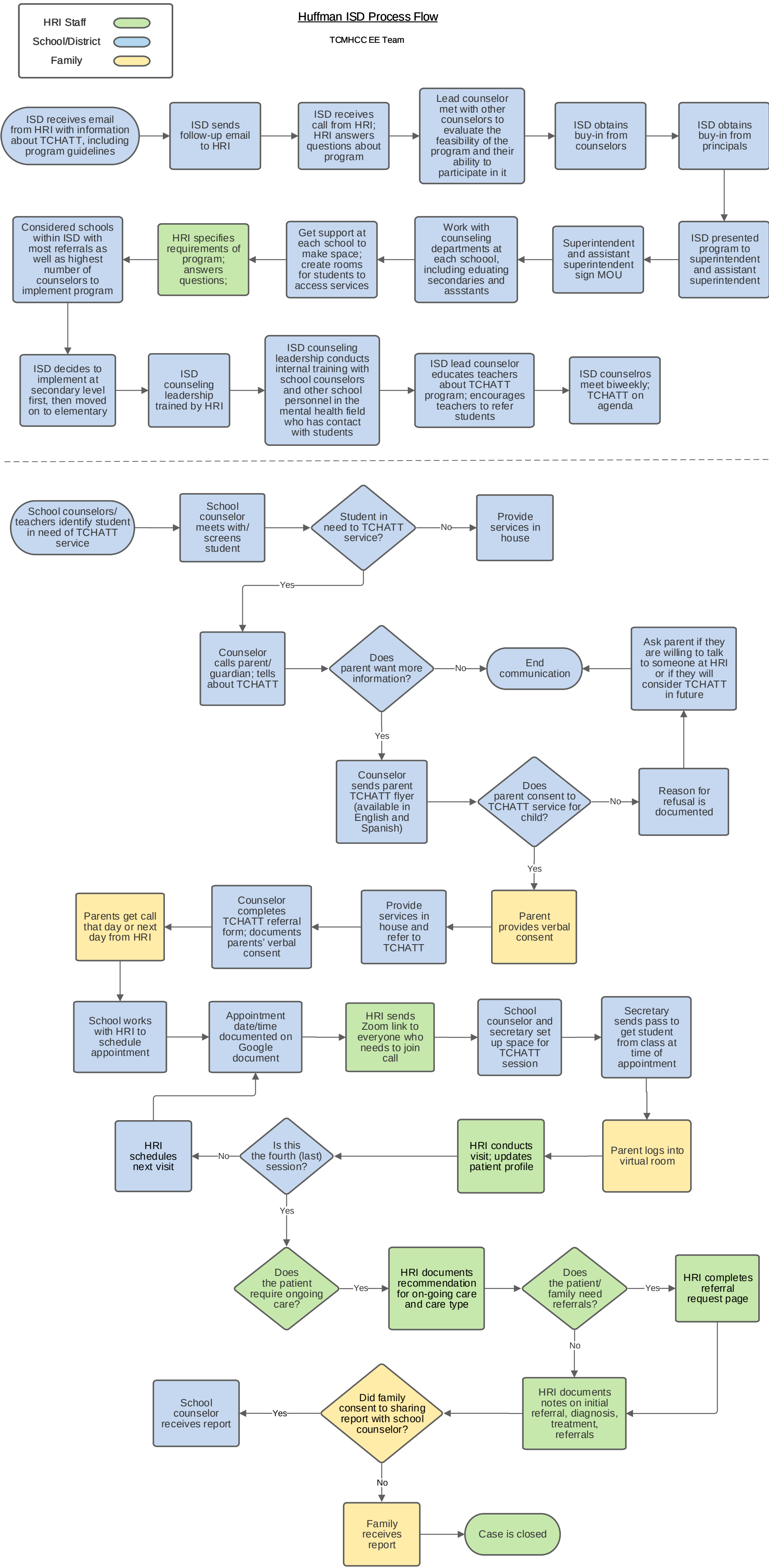


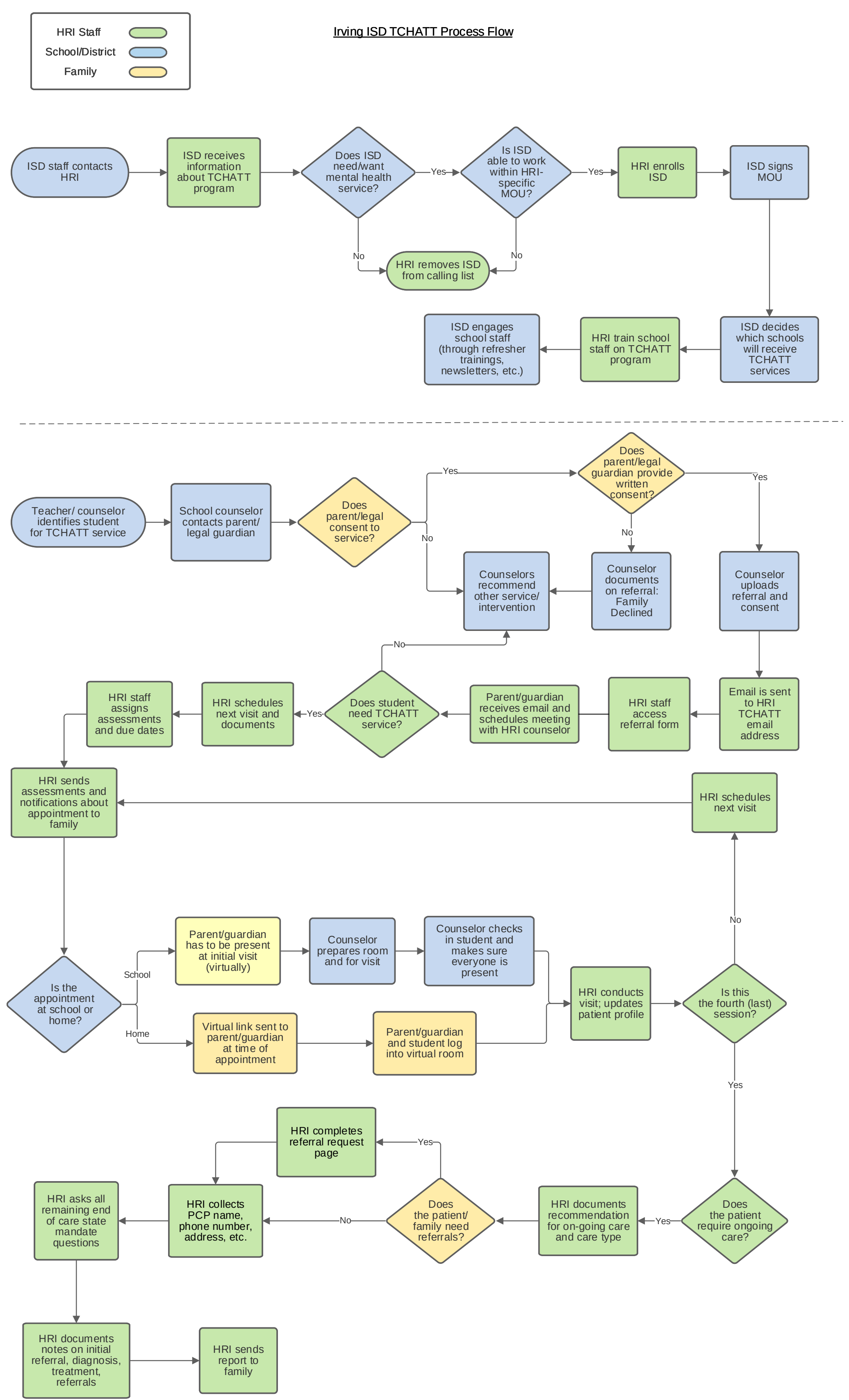
Fort Worth ISD TCHATT Process Flow

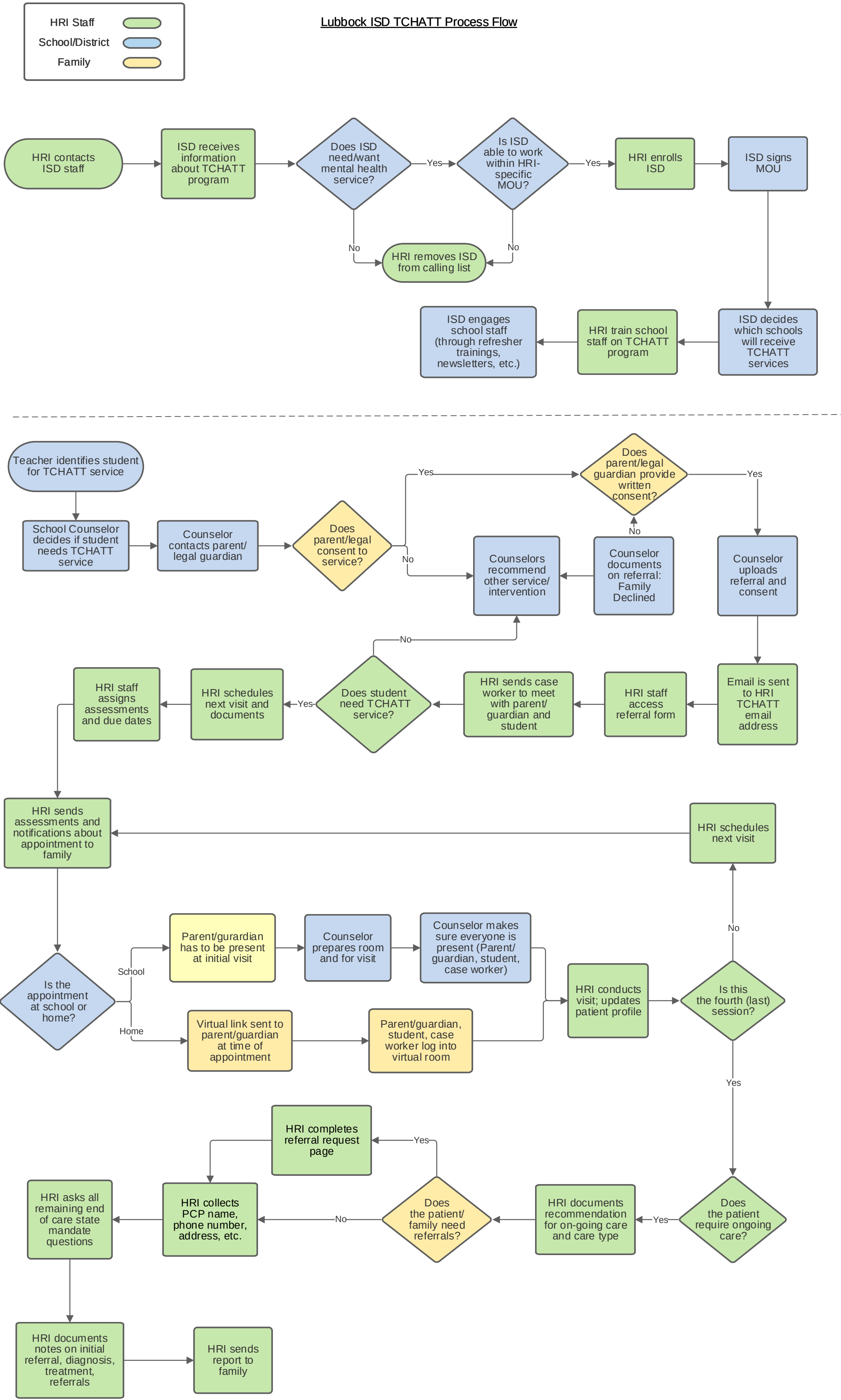


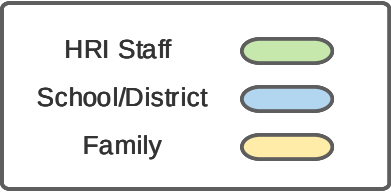
Huffman ISD Process Flow

TCMHCC EE Team

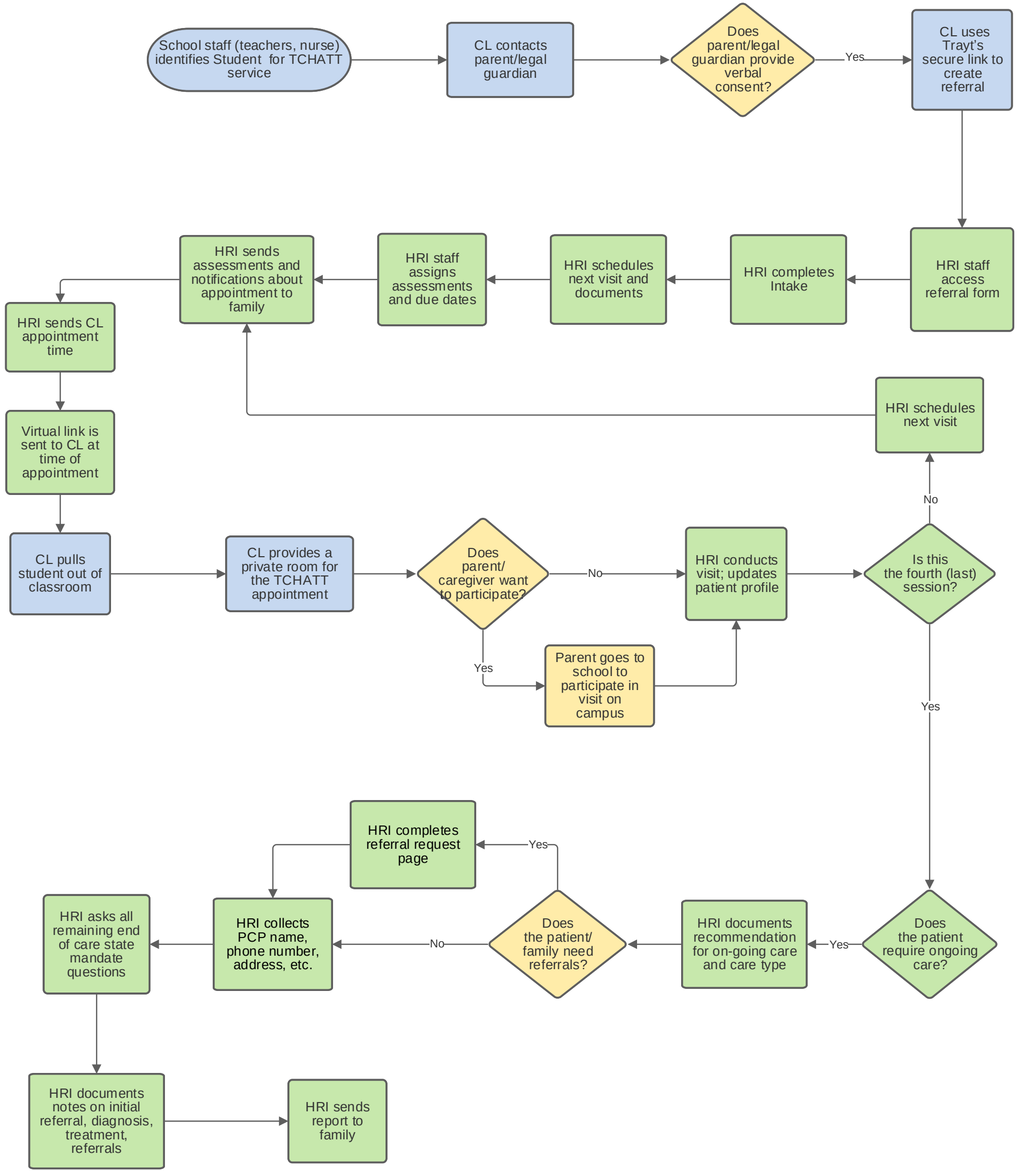
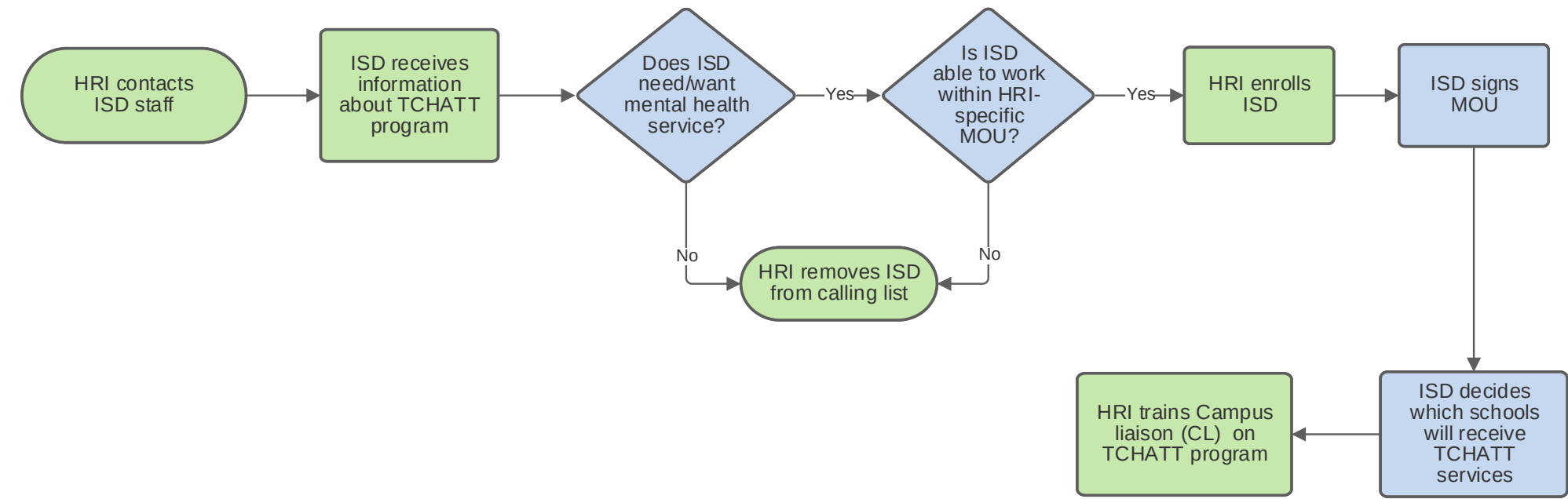


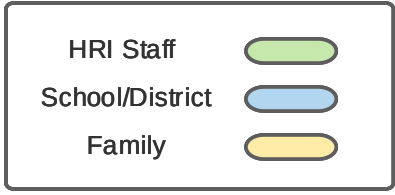




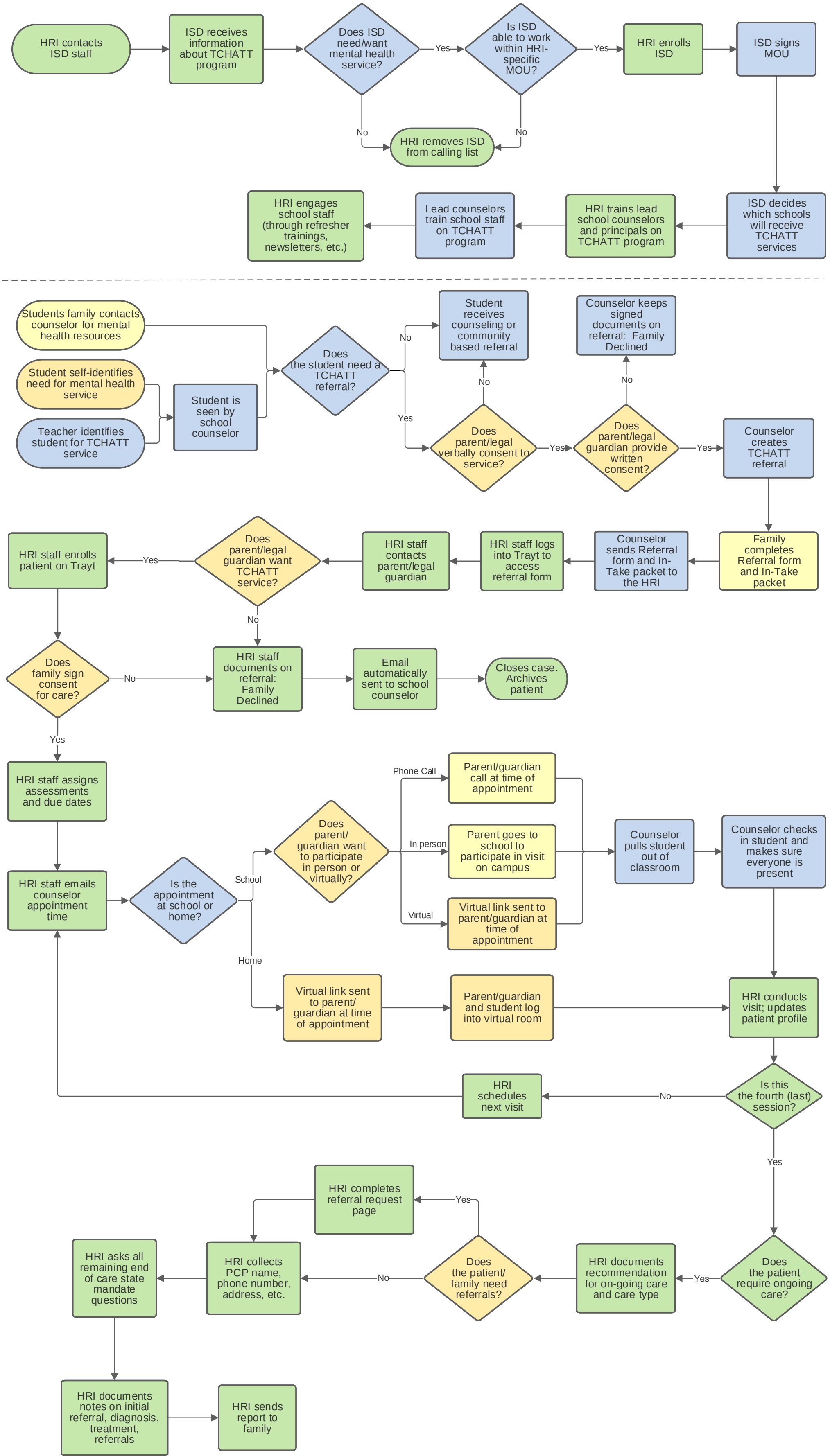


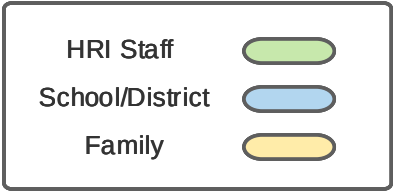
Mumford ISD TCHATT Process Flow



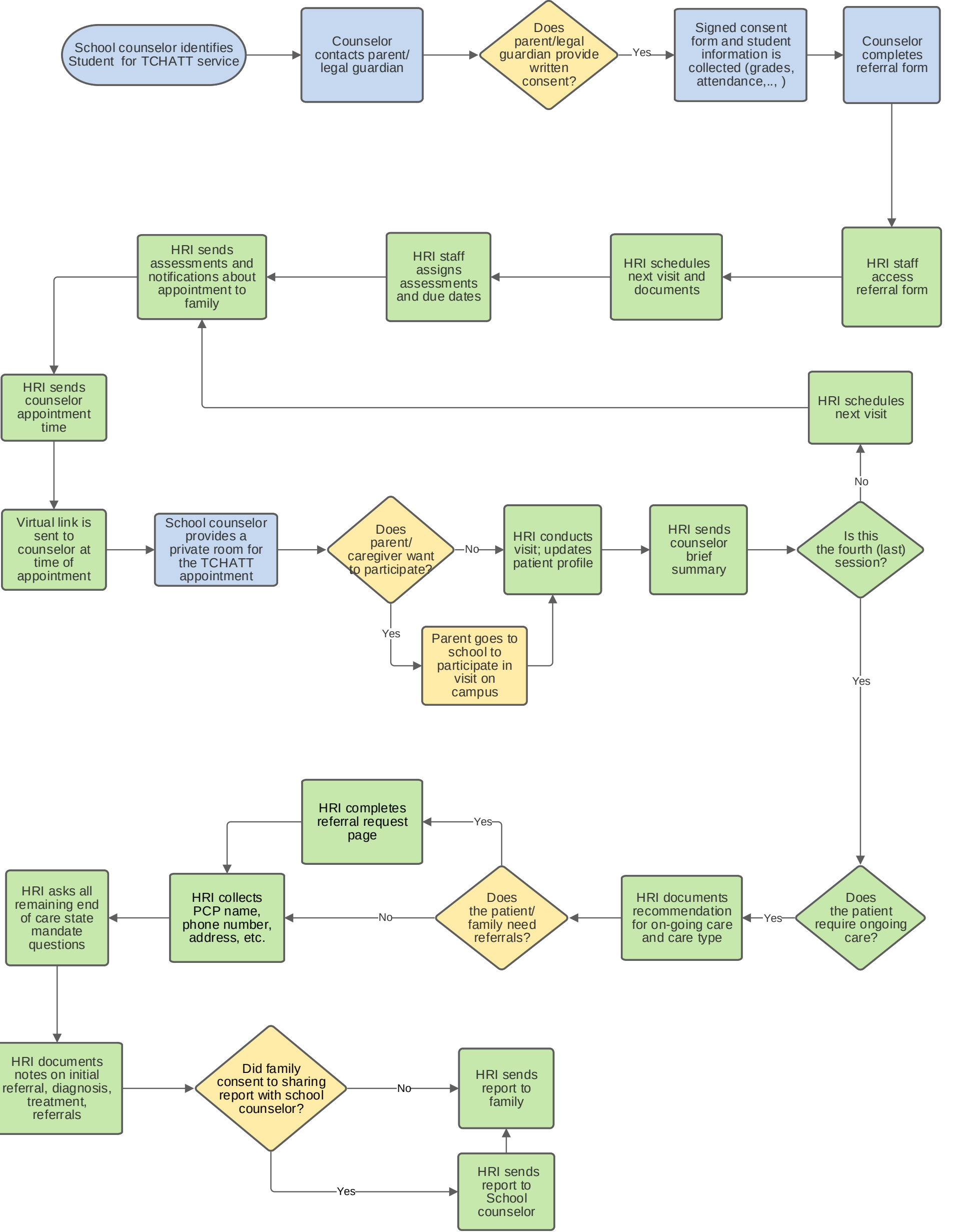
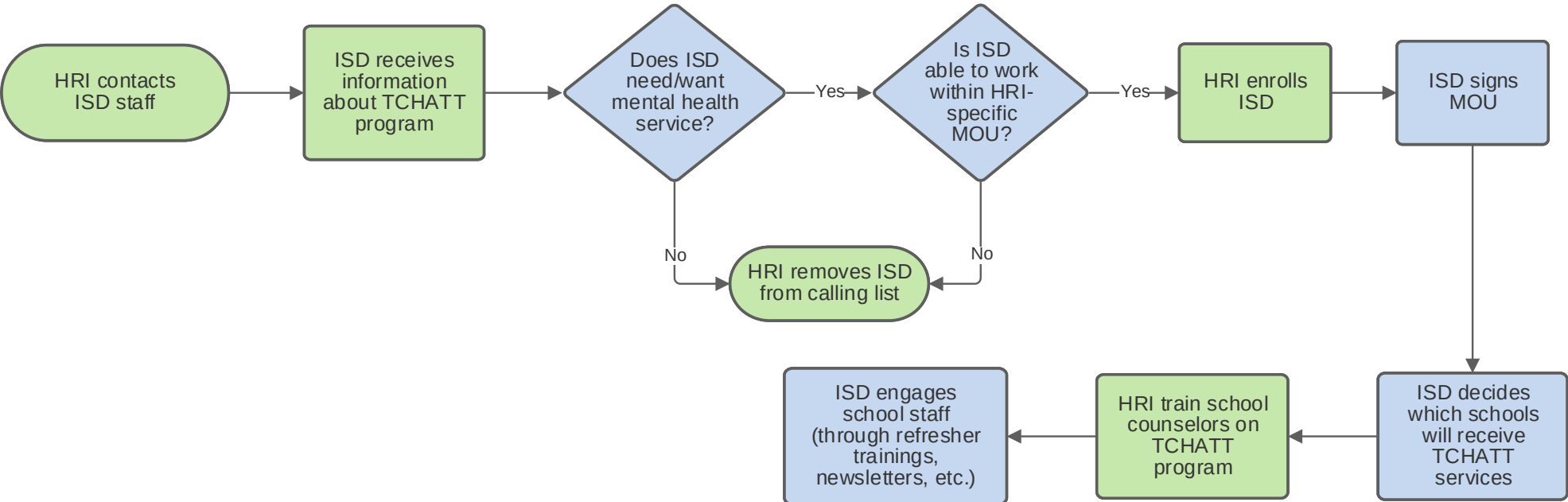


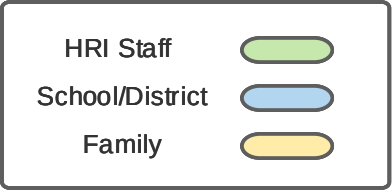
North East TCHATT Process Flow



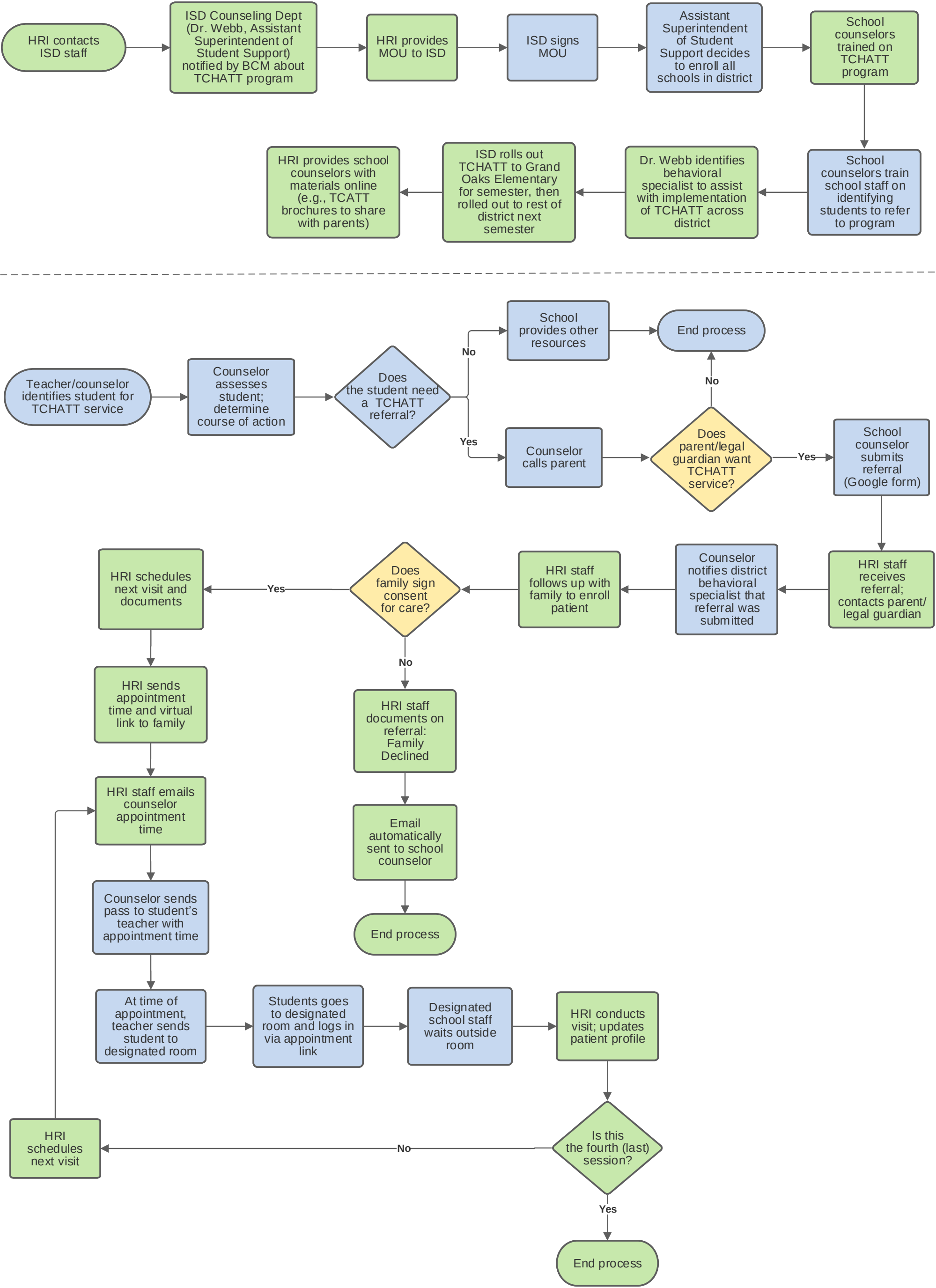


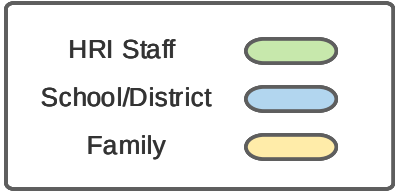
San Elizario ISD TCHATT Process Flow



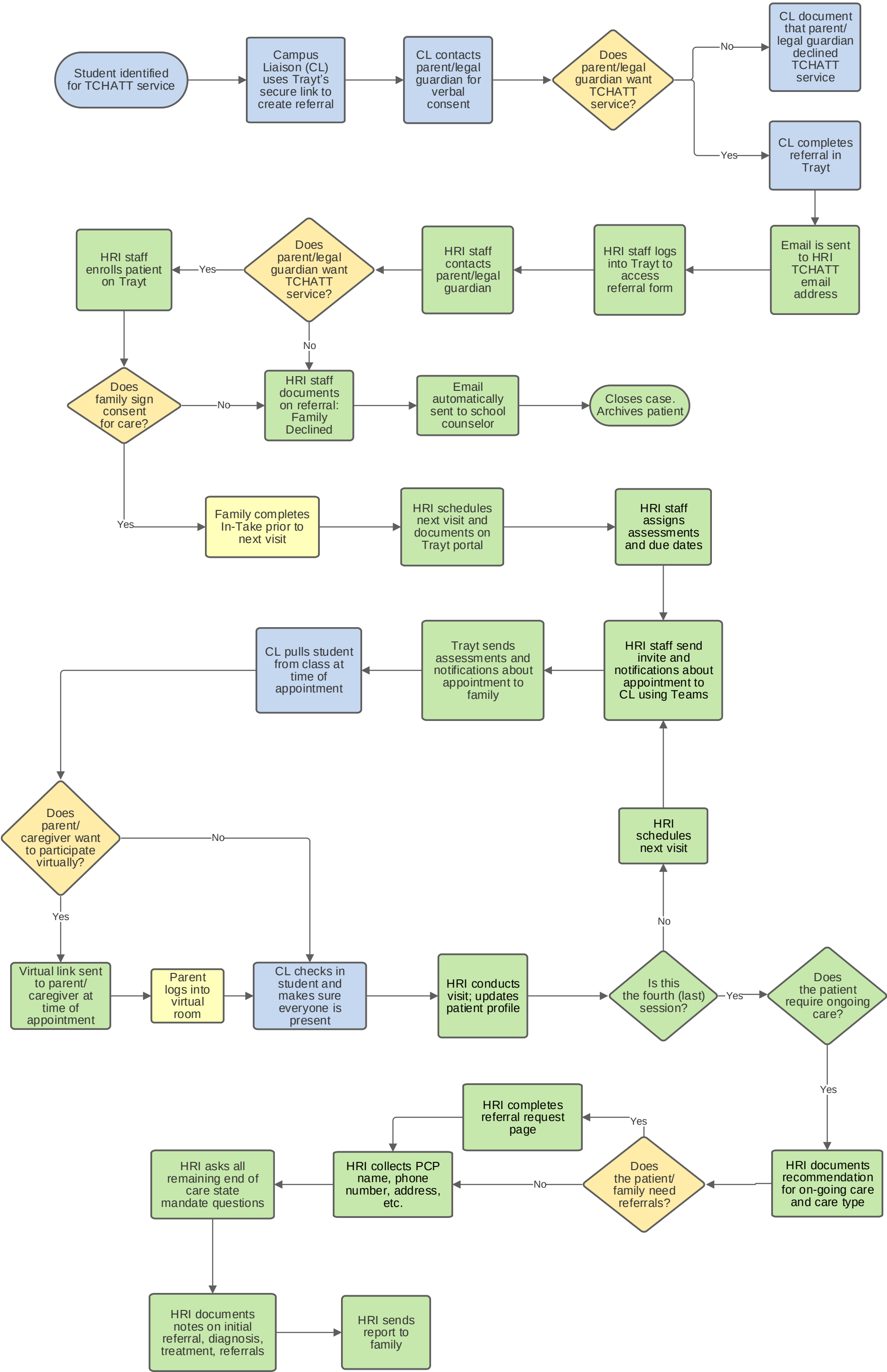
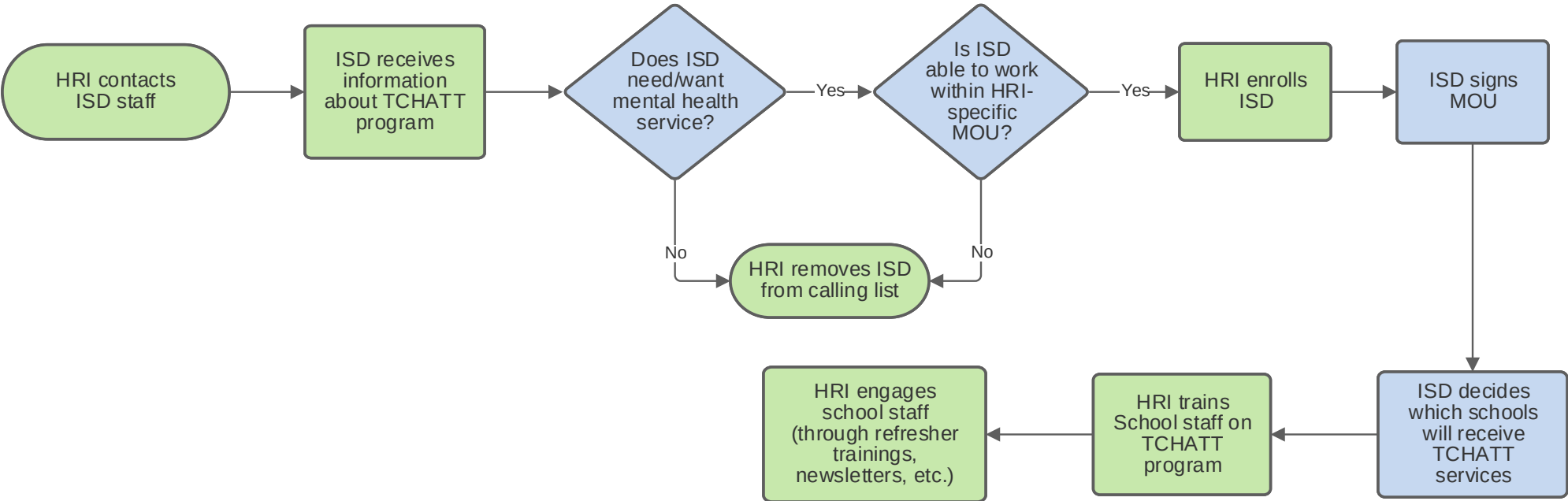


Tomball ISD TCHATT Process Flow





Tyler ISD TCHAT Process Flow



Appendix C. Logic Models

CPAN (Child Psychiatry Access Network) Logic Model

Process Evaluation CPAN			Process Evaluation CPAN		Outcomes / Effectiveness/ Cost Effectiveness		
Inputs	Implementation Activities	Implementation Outputs	Program Delivery Activities	Program Delivery Outputs	Short-Term (mid- and 1-year)	Intermediate (within 1-year)	Long-Term (3+ years)
Stakeholders - Community PCPs, psychiatrists, psychologists - Texas Legislators - Workgroups led by BCM and CPAN HRI staff - PCP engagement team - Training material - State-wide telephone system - State-wide data management system that tracks calls and responses - Marketing and direct outreach to raise awareness of CPAN services and to disseminate educational material	1) Process Mapping (Analysis and mapping of existing CPAN network process) 2) HRIs develop and use marketing strategies to develop a referral network of local therapists and connect them to PCPs 3) PCPs enroll in CPAN 4) PCPs receive educational content from HRIs on: - Assessing and managing mild to moderate behavioral health needs - Referring complex mental health (MH) disorders to psychiatrists and mental health professionals 5) HRIs track enrollment efforts, outcomes, and barriers	# of process maps completed # and type of marketing strategies developed and used by HRIs # PCPs within each region that are enrolled -# of pediatric practices enrolled # of family medicine practices enrolled (Target 75% of practices enrolled by end of 2nd year) -Documentation of reasons why practices do not utilize or unenroll # PCPs who receive educational content # and type of marketing strategies developed Robust referral network of local therapists created Barriers to participation identified	1) HRIs implement marketing strategies to promote enrollment in the program 2) HRIs provide telephone consultation services for PCPs in community settings 3) HRIs provide training on mental health assessment and treatment for PPCPs in community settings 4) PCPs complete trainings 5) PCP recognizes patient mental health needs 6) PCP obtains CPAN phone consultation 7) PCP treats or refers patient	# of enrolled practices and PCPs using consultation services at least once, by HRI and statewide # of PCP phone consultations provided # of phone calls answered, by HRI and statewide, total and w/in 5 mins. # of consultative requests responded to within 30 minutes, by team and statewide PCP satisfaction and comfort -Barriers to participation addressed <u>Patient-level metrics</u> # of unique patients who PPCPs identify for consultative requests # unique children served # of children served who are from a medically underserved and/or vulnerable population (use referral type [public or private provider] as a proxy)	<u>PCPs</u> ↑ability to manage patients with mild or moderate behavioral health needs and comfort doing so ↑ PCP knowledge in mental health care ↑ PCP confidence to provide mental health care ↑ PCP referrals among patients that need additional follow-up <u>HRIs</u> -Provide staff in accordance with implementation plan	<u>Clinic-level</u> ↑ referrals to a local child and adolescent psychiatrist and mental health professionals ↑ in PCP's management of patients with mild to moderate MH concerns ↑ referrals to higher levels of care <u>Patient-level</u> ↑ unique children/patients served by PCPs ↑ of children/patients served who are from a medically underserved and/or vulnerable population (use referral type [public or private provider] as a proxy) ↑ in children/patients with complex MH concerns served by specialists	Improved mental health outcomes among those served ↓ school violence and disciplinary referrals (e.g., fighting, bullying) ↓ substance abuse among pediatric patients served ↓ child/ adolescent ER visits related to MH ↑ success rate for high-risk patient referrals to outside mental health care providers

Key: Metrics included in Implementation Plan and/or requested in RFP are italicized; Additional metrics proposed by Evaluation Team pending data availability; BCM=Baylor College of Medicine; HRI=Higher Education Health Related Institution; MH=Mental Health

Continuous Stakeholder Engagement

TCHATT (Texas Child Health Access Through Telemedicine) Logic Model

Formative Evaluation	Process Evaluation School-Level		Process Evaluation Student-Level		Outcomes / Effectiveness/ Cost Effectiveness		
Implementation & Program Delivery Inputs	Implementation Activities	Implementation Outputs	Program Delivery Activities	Program Delivery Outputs	Short-Term (mid- and 1-year)	Intermediate (within 1-year)	Long-Term (3+ years)*
Policy Funding School Staff Training Materials Program Resources Educational and training materials for school staff to assist in assessing, supporting, and referring children and adolescents with MH needs (e.g., Tele-mental health technology/ equipment, Program Tracking System) Program Content Experts (e.g., TCHATT workgroup led by Drs. Sarah Wakefield at Texas Tech and Alex Vo at UTMB, Executive Committee, National Alliance on Mental Illness) -School Personnel (nurses or school counselors designated to implement referral program; program director, principals, teachers) Stakeholders (Students, Parents, Teachers, Health Care Professionals, TX Legislators, Education Service Centers)	1) Process Mapping -Analysis and mapping of existing telemedicine and telehealth programs 2) School personnel receive training on program goals, tracking system, referral guidelines, follow-up with families. 3) School personnel receive program policy guide/orientation 4) HRIs partner with schools and ensure technological capabilities are in place 5) HRIs develop their telehealth providers and support staff	# process maps created # and names of schools served (including characteristics) # of school staff aware of program # of school counselors trained to implement student referrals to 1) existing telehealth providers, 2) CPAN networks # (and type) of program resources/guides distributed to implementers	1) Campus Liaisons (CLs) recognize student need for TCHATT referral and obtain consent 2) CL complete referral form and send to TCHATT 3) TCHATT reaches out to family to schedule initial session after receiving school referral 4) TCHATT team assesses child and determines appropriate course of action (for up to 2 mos; 2-4 visits) 5) School personnel verifies TCHATT assessment among referred students 6) School personnel meet with parents to facilitate TCHATT assessments among non-completers 7) TCHATT makes referrals for children that need ongoing care 8) Barriers to participation are identified and plans to overcome are developed	# (%) students able to access care (covered lives-eligible for referrals & services) # (%) of students referred to the TCHATT program # of parental consent forms received by parents/guardians # (%) of students served (with tele-MH services) # (%) of students served by tele-MH services from underserved and/or vulnerable populations (use referral type [public or private provider] as a proxy) # (%) of encounters by provider type # (%) of students referred for ongoing services following TCHATT (e.g., CPAN pediatrician, LMHA) # (%) of students with no immediate referral source available	↑ in HRI-Schools with MOUs and operating programs ↑ school staff Knowledge, skills, and favorable attitudes related to TCHATT ↑ school staff capacity to meet non-educational needs of students	↑ students served ↑ students served by provider type (tele-MH evaluations) ↑ in students from medically underserved and/or vulnerable populations (use referral type [public or private provider] as a proxy)	Improved mental health outcomes among those served ↑ involvement in school ↑ school attendance ↑ grades at school ↓ school violence and disciplinary referrals (e.g., fighting, bullying) ↓ substance abuse among students and pediatric patients served ↓ child/ adolescent ER visits related to MH

Key: Metrics included in Implementation Plan and/or requested in RFP are italicized; *Additional metrics proposed by Evaluation Team pending data availability

Continuous Stakeholder Engagement

Psychiatry Workforce Expansion (CPWE & CAP) Logic Model

Formative Evaluation	Process Evaluation		Outcomes / Effectiveness/ Cost Effectiveness		
Implementation and Program Delivery Inputs	Implementation Activities	Implementation Outputs	Short-Term (mid- and 1-year)	Intermediate (within 1-year)	Long-Term (within 3 years) (pending data availability)
• Policy • Funding Program Content Experts • CPWE work group led by Dr. Steven Pliszka (UTHealth-San Antonio) and Danette Castle (TX Council of Community Centers) • CAP fellowship work group led by Dr. Elizabeth Newlin (UTHealth-Houston) and Laurel Williams (BCM) • Successful graduate medical education approval of new fellowship programs • TCMHCC Executive Committee • Community local MH providers and authorities (LMHA) in TX Stakeholders • Psychiatry residents • Psychiatry fellows • Academic faculty • Community MH providers • Texas Legislators	CPWE 1) Establish full-time psychiatrists to serve as academic medical directors at LMHA 2) Assign faculty and psychiatric residents to the LMHA CAP 1) Additional fellowship positions in child and adolescent psychiatry are available at state-funded institutions	CPWE # of faculty and psychiatric residents assigned to LMHAs # of LMHAs hosting faculty and psychiatric residents CAP # of child and adolescent psychiatry fellowship positions open per institution # of child and adolescent psychiatry fellowship positions filled per institution # of child and adolescent psychiatry fellowship positions open and filled in TX	CPWE ↑ number of psychiatry residents trained in the community New psychiatry resident rotations at community Full-time psychiatrists serve as academic medical directors at LMHA ↑ number of child and adolescent patients with MH concerns receiving MH care at LMHAs ↑ ratio of children to total patients seen for MH services at LMHAs ↑ patients seen that were initially contacted through CPAN or TCHATT ↓ child/adolescent wait lists to obtain services CAP ↑ of child and adolescent patients seen in CAP <u>open and filled</u> institutions in TX ↑ of child and adolescent patients from vulnerable and/or underserved populations seen in CAP <u>open and filled</u> institutions in TX (use referral type [public or private provider] as proxy)	CPWE ↑ unique patients seen at LMHAs ↑ child/ adolescent mental health patient visits per quarter in participating LMHA ↑ unique patients from vulnerable and/or underserved populations seen at LMHAs CAP ↑ of child and adolescent patients seen in CAP <u>open and filled</u> institutions in TX ↑ of child and adolescent patients from vulnerable and/or underserved populations seen in CAP <u>open and filled</u> institutions in TX (use referral type [public or private provider] as a proxy)	CPWE ↑ of residents who rotate through a LMHA who work in the public MH system after completing their residencies Increase number of psychiatrists who practice in the community LMHA Clinical outcome measures (rating scales) showing improvement in clients CAP ↑ fellowship positions in child and adolescent psychiatry are available at state-funded institutions ↑ of psychiatrists who specialize in child and adolescents ↑ fellowship graduates that remain in TX upon completion of their fellowship training

Key: *Metrics included in Implementation Plan and/or requested in RFP are italicized*; Additional metrics proposed by Evaluation Team pending data availability; LMHA=community mental health providers and local mental health authorities; MH=mental health

Continuous Stakeholder Engagement

Appendix D. Constructs and Metrics Tables

CPAN Constructs and Metrics Table

	Metric/Construct (Proposal)	Numerator	Denominator	Source
1) Primary Outcome (Reach-patients) :				
a. Among all patients seen in the clinical practices enrolled in CPAN, what percent receive consultations in the CPAN program (in total and by geographic region)? Equity—are vulnerable patients (insurance status, race/ethnicity) seen at an equal or greater proportion based on clinic distribution of patient demographics?	# of phone consultations provided	Number of phone calls resulting in documentation of specialty mental health care consultation within the time period.		Trayt
	# (%) of unique patients who PPCPs identify for consultative requests	Number of unique patients identified, who are called about for the first time.	Number of patients served by the PCPs (estimate of who in the state is being served)	Trayt
	# (%) of unique children/patients served by phone consultations	Number of unique patients identified for consultation	Number of patients served/identified by the PCPs (estimate of who in the state is being served)	Trayt
b. What percent of patients referred are from a medically underserved and/or vulnerable population (racial/ethnic or linguistic minorities, as well as by rural/non-rural groups)? How do the characteristics of those patients served compare to the expected proportion of children with mental health needs in the corresponding geographic area?	# of children served who are from a medically underserved and/or vulnerable populations	Number of children served from medically underserved and/or vulnerable population		HRSA: MUA/P CDC: SVI
	Clinic Characteristics Barriers and Facilitators: Patient demographics, personnel roles, practice type, payment method, electronic resources			Trayt / Practice manager survey
c. What percent of patients were referred for complex mental health concerns? (Reach and Effectiveness) What percent of complex MH concerns were from vulnerable communities?	# (%) children/patients with complex MH concerns served by specialists	Number of consultations where a complex MH concern is identified and a referral is made to a specialist	Number of consultations where a complex MH concern is identified.	Trayt
d. What percent of patients served by CPAN (across socio-demographic characteristics) are: Referred to a local child and adolescent psychiatrist	# (%) PCP referrals to a local child and adolescent psychiatrist	Number of consultative calls resulting in a referral to local CAP during the reporting period	Number of unique consultations.	Trayt
	# (%) of patients managed by PCP	Number of consultative calls resulting in no referral for specialty	Number of unique consultations.	Trayt

	Metric/Construct (Proposal)	Numerator	Denominator	Source
- Managed by PCP - Referred to local therapist - Referred to higher level of care		mental health care during the reporting period.		
	# (%) of referrals to a local therapist	Number of consultative calls resulting in a referral to a licensed mental health clinician (LP, LPC, LCSW, LMFT) during the reporting period	Number of unique consultations.	Trayt
	# (%) of referrals to a higher level of care	Number of consultative calls resulting in referral to Local Mental Health Authority, specialty care program, intensive outpatient program, day treatment program, residential care program, or inpatient psychiatric care during the reporting period	Number of unique consultations.	Trayt
	# of high-risk patients for whom an immediate referral source was not available	Number of encounters with 5 or more episodes of care (extension of care)	Number of unique consultations.	Trayt
2) Reach-Clinics and PCPs :				
a. What percent of eligible practices (pediatric and family) and primary care physicians (PCPs) are enrolled in the CPAN program?	# (%) of practices participating in the CPAN program among those eligible	Number of unique clinics enrolled.	Number of all clinics in TX (eligible for enrollment in CPAN)	Trayt
What are the reasons why practices and PCPs do not enroll?	# (%) of family medicine practices enrolled	Number of active family medicine practices with a unique physical address enrolled in the network during the reporting period.	Number of all clinics in TX (eligible for enrollment in CPAN) & Number of all family medicine clinics in TX (eligible for enrollment in CPAN)	Trayt
How do these percentages vary by size of practice and socio-demographic characteristics? (Reach)	# (%) of pediatric practices enrolled	Number of active pediatric practices with a unique physical address enrolled in the network during the reporting period.	Number of all clinics in TX (eligible for enrollment in CPAN) & Number of all pediatric practices in TX (eligible for enrollment in CPAN)	Trayt

	Metric/Construct (Proposal)	Numerator	Denominator	Source
	Documentation of reasons why practices do not utilize or unenroll	Percent of providers who withdraw from the CPAN and report the reason for disenrollment as (a) practice has moved; (b) no longer in practice; (c) dissatisfied with CPAN; (d) consultative services no longer needed; (e) requires too much time; (f) other.		Implementation/ Outcome survey
	# (%) PCPs within each region that are enrolled	Number of licensed pediatricians, family physicians, nurse practitioners (NP) and physician assistants (PA) enrolled in CPAN.	Number of licensed pediatricians, family physicians, and NP and PA operating under the supervision of a pediatrician or family physician	Trayt
	# of PCPs who receive educational content	Number of PCPs (defined by DG) who receive educational content.		COSH
	# (%) of Popups who receive educational content	Number of Popups who receive educational content	Number of all Popups in TX	COSH
	# and type of marketing strategies developed	Number of marketing strategies developed.		Process mapping interviews
b. What percent of PCPs use consultation services at least once, by HRI and statewide? How do these percentages vary by size of practice and socio-demographic characteristics?	# (%) of enrolled practices and PCPs using consultation services at least once, by HRI and statewide	Number of enrolled PCPs who contacted the CPAN for consultation or referral support since initiation of the service.	Number of PCPs enrolled in CPAN for at least 3 months by the end of the reporting period."	Trayt
3) Implementation (Description of Characteristics of Services Delivered) :				
a. Characterize disorders discussed in telephone consults.	No metric, but this information is included from Trayt			Trayt
b. Characterize medications prescribed by providers or recommended during telephone consults.	No metric, but this information is included from Trayt			Trayt
c. What percent of PCP calls are resource or referral requests?	# (%) of calls that are resource or referral requests	Number of consultative calls in which the presenting problem	Number of unique consultations	Trayt

	Metric/Construct (Proposal)	Numerator	Denominator	Source
What percent of total resource or referral calls are from underserved areas?		includes referral assistance during the reporting period.		
d. What percent of PCP calls are medication related? What is the racial/ethnic breakdown of medication-related calls? How do these above vary patient socio-demographic characteristics? How do the above compare with other CPAN programs?	# (%) of calls that are medication-related	Number of consultative calls in which the presenting problem includes medication management.	Number of unique consultations.	Trayt
4) Implementation (Fidelity):				
a. What percent of phone calls are answered, by HRI and statewide, within 5 minutes and 30 minutes? Is there any difference in HRI response by demographics of clinics?	# (%) of phone calls answered, by HRI and statewide, total and w/in 5 mins.	Number of phone calls answered by a mental health specialist within 5 minutes of receipt of the call.	Number of unique phone calls received by the CPAN during the time period.	Trayt
b. What percent of consultative requests are responded to within 30 minutes, by team and statewide? Is there any difference in HRI response by demographics of clinics?	# (%) of consultative requests responded to within 30 minutes, by team and statewide	Number of phone calls requesting psychiatric consultation with start time 30 minutes or less from initial call log time.	Number of unique phone calls received by the CPAN during the time period.	Trayt
c. To what extent was the CPAN program implemented as it was intended to be implemented (with fidelity) (need to create fidelity index based on standards)? - Each HRI created infrastructure to serve as hub - Are PCPs making referrals to local child and adolescent psychiatrist? - Appropriate staffing? - Need to investigate further	Barriers to participation identified			Implementation/ Outcome survey
	# (%) of implementation steps have been carried out	Implementation steps that have been completed.	Number of implementation steps identified.	Implementation/ Outcome survey
	Frequencies and proportion of PPCPs performing the required behaviors CPAN Fidelity index based in aggregated collected data (Delivery of 3 core program elements) Providers' perceptions of implementation			Implementation/ Outcome survey
5) Implementation (Satisfaction):				
a. What level of satisfaction and comfort do PCPs have with the CPAN program?	PCP satisfaction	Number of PCPs who complete a survey who report overall satisfaction as "satisfied" or "very satisfied".	Number of PCPs who complete a satisfaction survey during the time period	CPAN PCP Surveys

	Metric/Construct (Proposal)	Numerator	Denominator	Source
Are there differences based on primary population clinic serves?	PCP comfort score	Number of PCPs who complete a survey who report comfort managing client after consultation as “comfortable” or “very comfortable”.	Number of PCPs who complete a satisfaction survey during the time period.	CPAN PCP Surveys
	Knowledge, Skills and Attitudes about CPAN: Knowledge, skills, attitude relating to managing patients with mild or moderate behavioral needs			CPAN PCP Surveys Implementation/ Outcome survey
6) Factors Influencing Implementation :				
a. What individual- (e.g., patient characteristics) and organizational-level (e.g., at clinic and clinic staff levels) factors are associated with different levels of CPAN implementation? b. Are there regional or demographic variances?	Maintenance: Extent to which CPAN implementation becomes routine & part of the clinic's everyday practice	.		Implementation/ Outcome survey
	Maintenance Intention: Intention to implement the program in the next 6 months			Implementation/ Outcome survey
	Stakeholder's Perception of Intervention Characteristics: Relative advantage complexity, observability & compatibility			Implementation/ Outcome survey
	Motivation: Relative advantage, compatibility, complexity, trialability, observability, priority			Implementation/ Outcome survey
	General Capacity: Culture, climate, structure, organizational innovativeness, resource, utilization, leadership, staff capacity			Implementation/ Outcome survey
	Innovation-specific Capacity: Knowledge/skills/abilities, program champion, supportive climate, inter-organizational relationships			Implementation/ Outcome survey
c. How do infrastructure of hubs compare to other CPAN programs? Staffing structures (see Andy Keller's documents) How do service delivery features influence CPAN implementation?	[Pending review of potential comparisons to other state CPAN programs]	[Pending review of potential comparisons to other state CPAN programs]	[Pending review of potential comparisons to other state CPAN programs]	

TCHATT Constructs and Metrics Table

	Metric/Construct (Proposal)	Numerator	Denominator	Source
1) Primary Outcome (Reach-students):				
a. Among all students referred from TCHATT school districts, what percent of students have been referred to TCHATT (in total and by geographic region)?	# (%) of students referred to the TCHATT program	Total unique number of students served by at least one TCHATT encounter during the reporting period.	Total students in Texas & Total students at schools with MOUs	TEA school census (External) Trayt
	# (%) students able to access care (covered lives eligible for referrals & services)	Number of students enrolled in participating school campuses based on current agreements	Total state-wide student enrollment	TEA school census (External)
b. What percent of students have participated in at least one tele-health TCHATT session?	# (%) of students served (with telemed Mental Health services)	Students received parental consents and had at least one encounter with Trayt.	Number of students referred to Trayt by counselor.	Trayt
c. What are the percentage of students referred and served who are from medically underserved and/or vulnerable populations (racial/ethnic or linguistic minorities, as well as by rural/non-rural groups and free/reduced lunch status)?	# (%) of students served by tele-MH services from underserved and/or vulnerable populations	Students received parental consents and had at least one encounter with Trayt from "underserved" populations.	Students received parental consents and had at least one encounter with Trayt & Total students at enrolled schools & Total students in TX	Trayt
d. How do the characteristics of those students served by TCHATT compare to the expected proportion of students with mental health needs in the corresponding geographic area?	Barriers and Facilitators: social vulnerability index (SVI) score			CDC
e. What percent of students were referred for trauma-related consults?	No metric, but this information is included from Trayt			Trayt
f. Of students referred for TCHATT, what is the percent of students whose parents	# of parental consent forms received by parents/guardians	Number of unique parental consents for TCHATT.		Trayt

	Metric/Construct (Proposal)	Numerator	Denominator	Source
provide permission for them to participate in TCHAT? How does parent consent vary by characteristic of the school or district? What are the socio-demographic characteristics of referred students who do and do not receive parental permission?	# (%) of students whose parents provide permission for their children to receive TCHAT services; characteristics of students whose parents provide permission	Students received parental consents	Number of students referred to Trayt by counselor.	Trayt
d. Of students who complete the TCHAT tele-health sessions, what percent of students (across socio-demographic characteristics) are: - Referred for ongoing services following TCHAT? - Unable to be referred because there was not an immediate referral source available?	# (%) of students who are referred for ongoing services following TCHAT ; characteristics of students who are referred	Number of unique students who complete TCHAT and receive a referral for specialty mental health services within the reporting period by: (a) LMHA; (b) medical mental health provider (prescriber); (c) non-medical mental health provider; (d) other.	Number of unique students who complete TCHAT	Trayt
	# (%) of students for whom an immediate referral source was not available; characteristics of students	Number of students exceeding the four TCHAT sessions due to a lack of adequate referral within the reporting period.	Number of unique students who complete TCHAT.	Trayt
2) Reach-School Districts (and Schools?) and their staff				
a. What percent of school districts (and schools) in Texas have received outreach related to TCHAT?	# of schools recruited by community outreach strategies and screened for need (eligible) for the program;	Number of schools who were contacted by HRIs to join TCHAT.		Process mapping interviews
	# (and type) of program resources/ guides distributed to implementers	Number of resources/ guides sent to school campuses.		Implementation/ Outcome survey
b. What percent of school districts (and schools) in Texas are enrolled in TCHAT?	# and names of schools served (including characteristics)	Number and name of school campuses with a formal agreement to participate in TCHAT services (current). School campus is defined as having a unique TEA identifier.		Trayt

	Metric/Construct (Proposal)	Numerator	Denominator	Source
c. Among school districts that are enrolled in TCHAT, what percent of school staff have received training on TCHAT? What are the characteristics of those school staff?	# (%) of school staff aware of program	Number of school staff who has heard of TCHAT.	Number of school staff in survey sample	Process mapping interviews Implementation/ Outcome survey
	# of current school staff identified within the school and eligible to receive training; characteristics of current school staff eligible to be trained	Number of school staff eligible to receive TCHAT training.		Process mapping interviews Implementation/ Outcome survey
	# (%) of school staff who receive training; characteristics if school staff participants	Staff that received training.	Number of school staff eligible to receive TCHAT training.	Training attendance form (internal evaluation team) Implementation/ Outcome survey
	# of school counselors trained to implement student referrals to 1) Existing telehealth providers 2) CPAN networks	Number of school counselors who received either existing telehealth training or CPAN training.		Process mapping interviews Implementation/ Outcome survey
3) Implementation (Description of Characteristics of Services Delivered)				
a. Characterize disorders discussed in tele-health visits.	No metric, but this information is included from Trayt			Trayt
b. Characterize average number of tele-health visits provided (up to 4 allowed)	No metric, but this information is included from Trayt			Trayt
c. Characterize the types of providers that participated in student encounters. How does this differ by school demographics? How do these above vary patient socio-demographic characteristics?	# (%) of student encounters by provider type; characteristics of students	Number of TCHAT encounters provided by (a) child psychiatrist; (b) child psychologist; (c) licensed social worker; licensed professional counselor; (d) other.	Number of TCHAT encounters	Trayt
4) Implementation (Fidelity):				
a. To what extent was the TCHAT program implemented as it was intended to be implemented (with fidelity)?	# of implementation steps that have been carried out	Implementation steps that have been completed	Number of implementation steps identified	Process mapping interviews Implementation/ Outcome survey

	Metric/Construct (Proposal)	Numerator	Denominator	Source
Need to create fidelity index based on standard (see also metrics table)	Degree to which TCHATT mental health tele-health services between higher education health related institutions and schools was implemented as planned: 1) Extent of implementation by each school staff member; #of school staff performing required behavior 2) Extent of implementation by TCHATT team; # of TCHATT team performing the required behavior			Process mapping interviews Implementation/ Outcome survey
5) Implementation (Satisfaction):				
a. What level of satisfaction and comfort do school staff have with the TCHATT program?	Perceived satisfaction of school staff, parents, youth, and TCHATT team members with TCHATT delivery and program activities	We can define this when we better understand the survey being administered by COSH		
Differences in satisfaction based on % of free and reduced lunch?	Knowledge, skills, attitude relating to managing patients with mild or moderate behavioral needs	We can define this when we better understand the survey being administered by COSH		COSH TCHATT Surveys
6) Factors Influencing Implementation				
a. What individual (e.g., student and parent characteristics) and organizational (school district and school) level factors are associated with different levels of TCHATT implementation?	Maintenance: Extent to which TCHATT implementation becomes routine & part of the clinic's everyday practice			Implementation/ Outcome survey
	Maintenance Intention: Intention to implement the program in the next 6 months			Implementation/ Outcome survey
	Motivation: Relative advantage, compatibility, complexity, trialability, observability, priority			Implementation/ Outcome survey
	General Capacity: Culture, climate, structure, organizational innovativeness, resource, utilization, leadership, staff capacity			Implementation/ Outcome survey
	Innovation-specific Capacity: Knowledge/skills/abilities, program champion, supportive climate, inter-organizational relationships			Implementation/ Outcome survey
	Stakeholder's Perception of Intervention Characteristics: Relative advantage complexity, observability & compatibility			Implementation/ Outcome survey

Community Psychiatry Workforce Expansion (CPWE) Constructs and Metrics Table

	Metric/Construct (Proposal)	Numerator	Denominator	Source
1) Primary Outcome (Reach-patients):				
a. How many unique child/adolescent mental health patients are LMHAS serving per quarter?	# of child/adolescent mental health patients visits per quarter in participating LMHAS	Total number of service encounters provided by faculty members (academic medical directors) or psychiatric residents during CPWE-funded rotation in community agencies/LMHAs.		
	# of child/adolescent mental health patients seen per quarter in participating LMHAS	Number of unique child or adolescent patients seen by a CPWE faculty or resident in a documented encounter in the community agency or LMHA during the reporting period.		
b. What percent of patients served are from vulnerable and/or underserved populations (racial/ethnic or linguistic minorities, as well as by rural/non-rural groups)	# of unique patients from vulnerable and/or underserved populations seen at LMHAS	Number of unique child or adolescent patients seen by a CPWE faculty or resident in a documented encounter in the community agency or LMHA during the reporting period from vulnerable or underserved populations		
c. What is the ratio of children to total patients seen for MH services at LMHAS?	ratio of children to total patients seen for MH services at LMHAS (CPWE)	Number of unique patients seen by a CPWE faculty or resident who are between the ages of birth to 20 years old. Children and adolescents will be further reported by age groups (0-5, 6-12, 13-17, 18-20).	Number of unique child or adolescent patients seen by a CPWE faculty or resident in a documented encounter in the community agency or LMHA during the reporting period.	
d. What percent of patients seen were initially contacted through CPAN or TCHAT?	# of patients seen that were initially contacted through CPAN or TCHAT (CPWE)	Number of unique child or adolescent patients seen referred by a CPAN or TCHAT team member to an LMHA participating in the CPWE program.		
2) Reach-LMHA				
a. What percent of eligible faculty and psychiatric residents are assigned to the LMHAS?	# of faculty and psychiatric residents assigned to LMHAS	Number of full-time equivalents (FTE) faculty members assigned as academic medical directors or psychiatric residents participating in rotations within community agencies or LMHAS during the reporting period.		

	Metric/Construct (Proposal)	Numerator	Denominator	Source
b. What percent of eligible LMHA's in Texas host faculty and psychiatric residents? (Reach)	# of LMHAs hosting faculty and psychiatric residents			
3) Implementation (Satisfaction)				
a. What level of satisfaction and comfort do fellows, residents, and LMHAs have with the CPWE program?				
4) Factors Influencing Implementation				
a. What barriers and facilitators have influenced implementation of the CPWE program?				

Child and Adolescent Psychiatry (CAP) Fellowship Constructs and Metrics Table

	Metric/Construct (Proposal)	Numerator	Denominator	Source
1) Primary Outcome (Reach-patients):				
a. How many child and adolescent patients are seen in CAP open and filled institutions in Texas?	Increase of children and adolescent patients seen in CAP open and filled institutions in TX			
b. What percent of patients are from vulnerable and/or underserved populations (racial/ethnic or linguistic minorities, as well as by rural/non-rural groups)?	Increased unique patients from vulnerable and/or underserved populations seen in CAP open and filled institutions in TX			
2) Reach-CAP sites and positions				
a. How many child and adolescent psychiatry fellowship positions are open and filled per institution and in Texas? (Reach)	# of child and adolescent psychiatry fellowship positions open per institution	Total number of unfilled but funded child and adolescent psychiatry fellowship positions at each HRI for the reporting period.		
	# of child and adolescent psychiatry fellowship positions filled per institution	Total number of active child and adolescent psychiatry fellows funded by the TCMHCC at each HRI for the reporting period.		
	# of child and adolescent psychiatry fellowship positions open and filled in TX	Total number of filled or unfilled child and adolescent psychiatry fellowship positions regardless of funding at each HRI for the reporting period.		
b. How many new CAP fellowship programs received graduate medical education approval?	# successful GME approval of new fellowship programs	Total number of HRI child and adolescent psychiatry fellowship programs obtaining approval from GME during the reporting period.		
3) Implementation (Satisfaction)				
a. What level of satisfaction and comfort do fellows, residents, and LMHAs have with the CAP program?				
4) Factors Influencing Implementation				
a. What barriers and facilitators have influenced implementation of the CAP program?				

Cost Analysis

Costs: will include the costs of implementation plus replication including fixed (equipment, software, and training) and variable (personnel time, consultants) costs and opportunity cost (time spent by medical care providers). Follow practical costing guide for behavioral program.¹¹ Consider use of REDCap software vs. Stages of Implementation Completion (SIC) and the Cost of Implementing New Strategies (COINS)¹² web-based programs for tracking implementation costs and outcomes in a sample of implementation sites that utilize the leading strategies.¹³

	Model inputs	Source
1) CPAN		
a. What does it cost to implement CPAN?	Program activities	CPAN HRI Process Maps
b. Are there fundamental differences in the strategies that organizations implement to conduct outreach and training? If so, what are the different costs and outcomes associated with alternative strategies?	Approximate time spent per activity	CPAN HRI Cost Worksheets
	Person level unit costs (wage rates and benefits; equipment, supplies, transportation costs.)	CPAN HRI Budgets
	Role of personnel for each activity	Process Mapping Interviews
1) TCHATT		
a. What does it cost to implement TCHATT?	Program activities	TCHATT HRI Process Maps
b. Are there are fundamental differences in the strategies that organizations implement to conduct outreach and training? If so, what are the different costs and outcomes associated with alternative strategies?	Approximate time spent per activity	TCHATT HRI Cost Worksheets
	Person level unit costs (wage rates and benefits; equipment, supplies, transportation costs.)	TCHATT HRI Budgets
	Role of personnel for each activity	Process Mapping Interviews

Appendix E. Data Cleaning and Reconciliation Process

TCMHCC External Evaluation Data Cleaning and Reconciliation Process

CPAN – Clinic Directory:

- Identify tests, deleted, removed clinics
 - There were 40 of these in the last Clinic discrepancy report, but they were retained because they previously were on the clean list in a previous extract.
- Identify clinics with null address
 - There were 18 clinics with blank addresses in the data discrepancy report that were removed from the clean list.
- Identify duplicate entries
 - Using duplicate names (for Clinic)
 - Using duplicate addresses (for Clinic)
 - There were 23 clinics that were identified as duplicates. 7 of these remain in REDCap because they were previously in the clean list.
- Compare remaining clinics to previous list in REDCap and track any changes made from the previous month extract.
- Replace any original values with the newer value.
- Get latitude/longitude for any new and changed value clinics
- Import data into REDCap.
- Send data discrepancy excel file to Edith Ortiz for reconciliation process.
- Edith contact HRIs to confirm the correct entries and instructs them to submit a data change request to Trayt.

CPAN – Clinic Staff Directory:

- Compare remaining clinics to previous list in REDCap and track any changes made from the previous month extract.
- Replace any original values with the newer value.
- Identify test entries, if any.
- Identify clinic staff without a “clean” clinic – i.e. a clinic in REDCap data, remove from clean list.
 - There were 78 clinic staff without a clinic in the last data discrepancy report:
 - 59 were “active” with or without a clinic
- Identify duplicate entries using full name:
 - Check if matching role, clinic, or both – assign a person-clinic combination ID
 - Using person-clinic combination fill in any missing values – so every entry within a person-clinic combination has the same values, then retain the first within the group.
 - Add this to data discrepancy to get confirmed if appropriate to combine, anyone with a duplicate gets flagged, not removed.
 - There were 926 duplicate entries.
- Import data into REDCap.
- Send data discrepancy excel file to Edith Ortiz for reconciliation process.

- Edith contact HRIs to confirm the correct entries and instructs them to submit a data change request to Trayt.

CPAN – Calls/Encounter data:

- Read in new data
- Change to REDCap variable names
- Recode values to corresponding numbers where applicable.
- Change datetime format to REDCap friendly format.
- Remove unrecognized symbols from character strings
- Compare to previous month data and track any changes made from the previous month's extract.
- Replace any original values with the newer value.
- Investigate any duplicate encounter IDs – none to date.
- Import data into REDCap.
- Store data change tracking or send to Trayt if glaring issue.

TCHAT – Campus List (Last done using 8/8/2021 data)

- Read in new data from Molly and David.
- Change variable names to REDCap variable names
- Recode values to corresponding numbers where applicable.
- Change datetime format to REDCap friendly format.
- Remove unrecognized symbols from character strings
- Read in Corrected Campuses data file from April – post reconciliation file with corrections.
 - Campuses that match the corrected data file entries, remove from new list and default to the corrected data list.
- Fix grades being read in as date fields
- Compare to previous month's list and track any changes.
- Replace any original values with the newer value.
- Check for any duplicate entries – using TEA campus number
 - There were 40 duplicates in the last data extract, but all were previously fixed in another version of the corrected file.
- Compare campus list to TEA Directory from 2021 – add mismatch to discrepancy list and remove from clean list.
 - There were 7 that did not match the TEA Directory.
- Use NCES to TEA crosswalk from Trayt to get matching NCES IDs.
- Add if campus was selected for our EE survey Yes/No.
- Find Latitude/Longitudes for new campuses and those with an updated value.
- Import into REDCap.

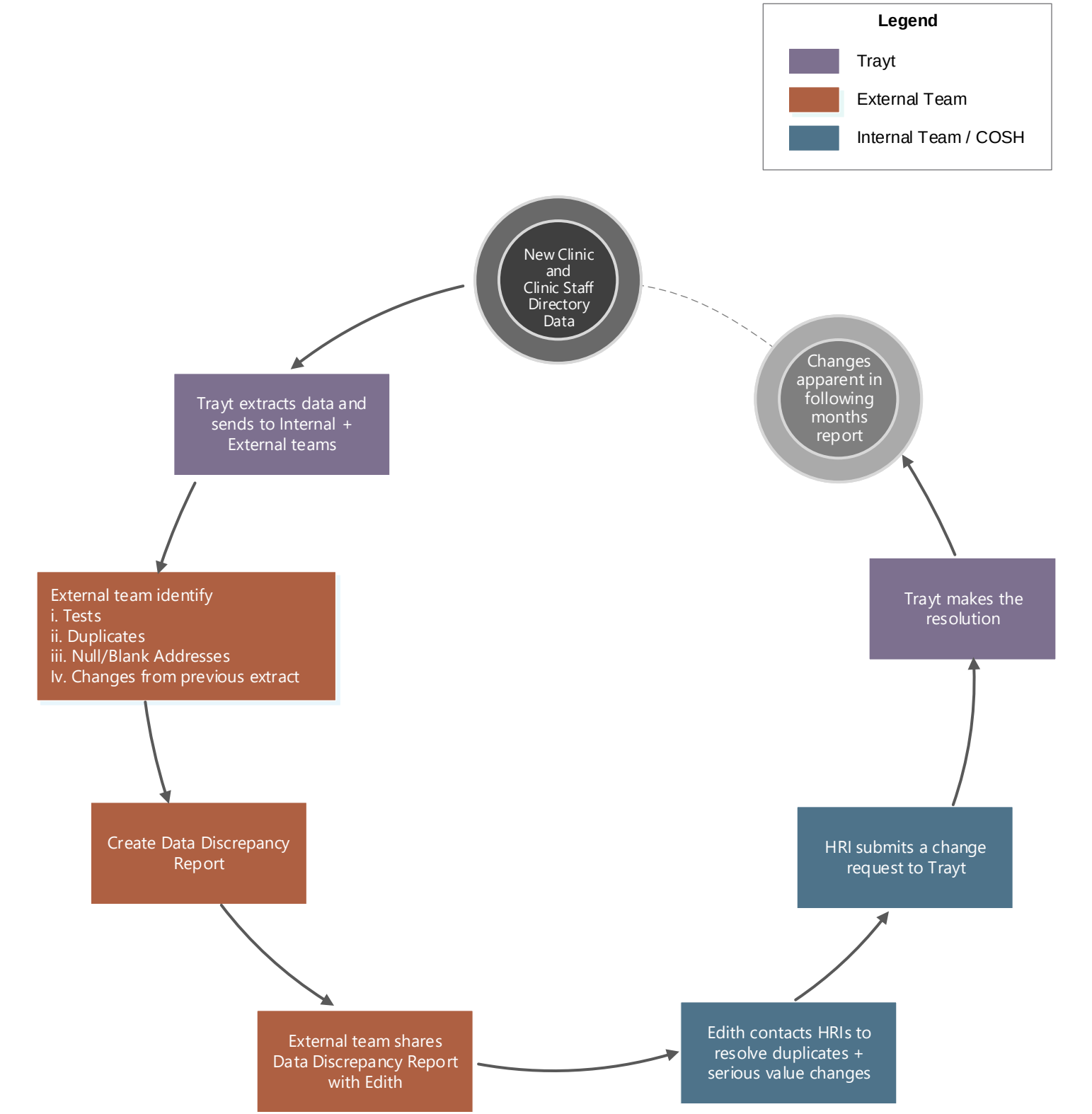
TCHAT – Referrals/Encounter data:

- Read in new data
- Change to REDCap variable names

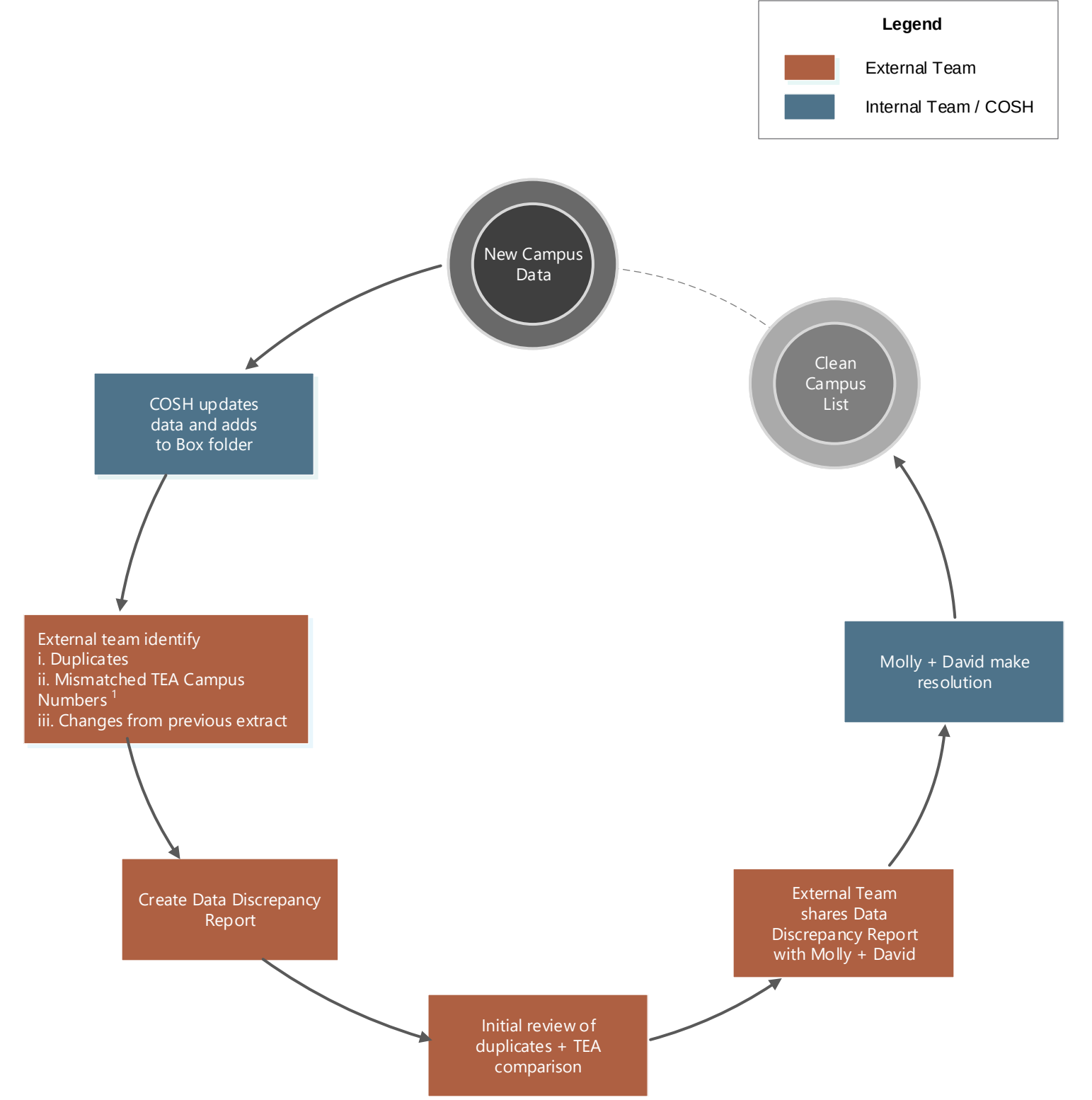
- Recode values to corresponding numbers where applicable.
- Change datetime format to REDCap friendly format.
- Remove unrecognized symbols from character strings
- Compare to previous month data and track any changes made from the previous month's extract.
- Replace any original values with the newer value.
- Investigate any duplicate referral IDs – none to date.
- Import data into REDCap.
- Store data change tracking or send to Trayt if glaring issue.

General Data Cleaning and Reconciliation Process		
Item	Task	Description
1	Reformat Data Fields	This includes changing variables from characters to numeric coding, adjusting datetime fields, creating any calculated fields, and cleaning character strings.
2	Identify tests and invalid entries	Identify and remove any values that appear to be a test entry or have majority blank or null fields and add these to the data discrepancy report.
3	Identify duplicate entries	Matching on appropriate unique values such as: clinic address; clinic name; clinic staff email; clinic staff full name; or TEA campus number, identify any duplicate entries, flag, and add to data discrepancy report. Note: For CPAN clinics and TCHATTT campuses that are identified as duplicates are removed from the clean list until they can be reconciled by the internal evaluation team and Trayt.
4	Compare current month's data to previous data currently in REDCap and track any changes made from the previous month's extract.	Using comparedf() function in R – equivalent to PROC COMPARE in SAS, compare the previous dataset to the most recent data from Trayt and retain and record any updates that were made to existing records.
5	Obtain latitude/longitude for any new and changed records, where applicable.	For CPAN Clinics and TCHATTT Campuses, use a Google Geolocation API to acquire a latitude and longitude for every clinic and/ campus.
6	Import data into REDCap.	Import the cleaned and reformat data into the appropriate External Evaluation team REDCap project.
7	Send Data Discrepancy Report to appropriate Internal Evaluation Team and Trayt Members.	Occurs on a monthly-basis initiated by the receipt of new data from Trayt or COSH.

Trayt CPAN Clinic Data Reconciliation



Trayt TCHATT Campus Data Reconciliation



1. Comparison to the TEA Directory 2021

Appendix F. Supplemental CPAN and TCHATT Results

Table 1. CPAN Monthly Calls by HRI

	Number of Calls by Month													Total Calls (AUG20- AUG21)
	AUG20	SEP20	OCT20	NOV20	DEC20	JAN21	FEB21	MAR21	APR21	MAY21	JUN21	JUL21	AUG21	
HRI														
BCM	14	29	35	29	15	19	33	47	51	26	22	30	44	394
TAMHSC	.	.	.	.	.	.	5	5	8	8	10	3	5	44
TTUHSC	.	5	19	52	32	42	48	58	51	38	33	34	27	439
TTUHSCEP	.	3	4	5	3	12	8	8	21	7	12	8	18	109
UNTHSC	.	.	1	14	12	12	10	22	26	22	11	21	6	157
UT Dell	.	.	.	.	.	64	50	88	85	87	118	92	135	719
UTHSCH	.	.	.	12	15	20	24	37	29	24	13	12	11	197
UTHSCSA	.	8	20	20	14	28	15	25	44	38	38	35	32	317
UTHSCT	.	4	14	13	15	22	14	43	38	31	23	32	24	273
UTMB	.	5	5	15	15	29	18	47	41	55	46	40	49	365
UTRGV	.	.	1	.	.	1	6	4	1	2	3	7	4	29
UTSW	.	.	18	19	32	45	57	99	120	134	105	93	126	848
All HRIs	14	54	117	179	153	294	288	483	515	472	434	407	481	3891

Data Source: CPAN Encounter-level Extract, Trayt. August 16th, 2020 through August 31st, 2021.

Figure 1. CPAN Monthly Calls from August 2020 to August 2021

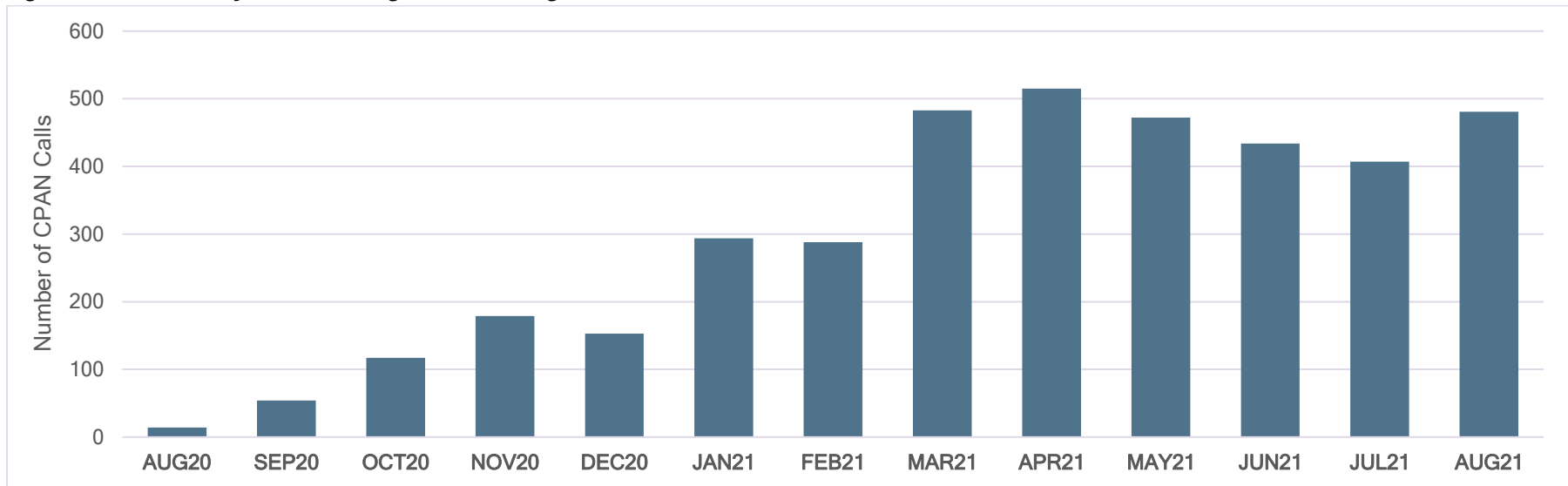


Figure 2. Monthly CPAN Calls by HRI (March 2021 - August 2021)

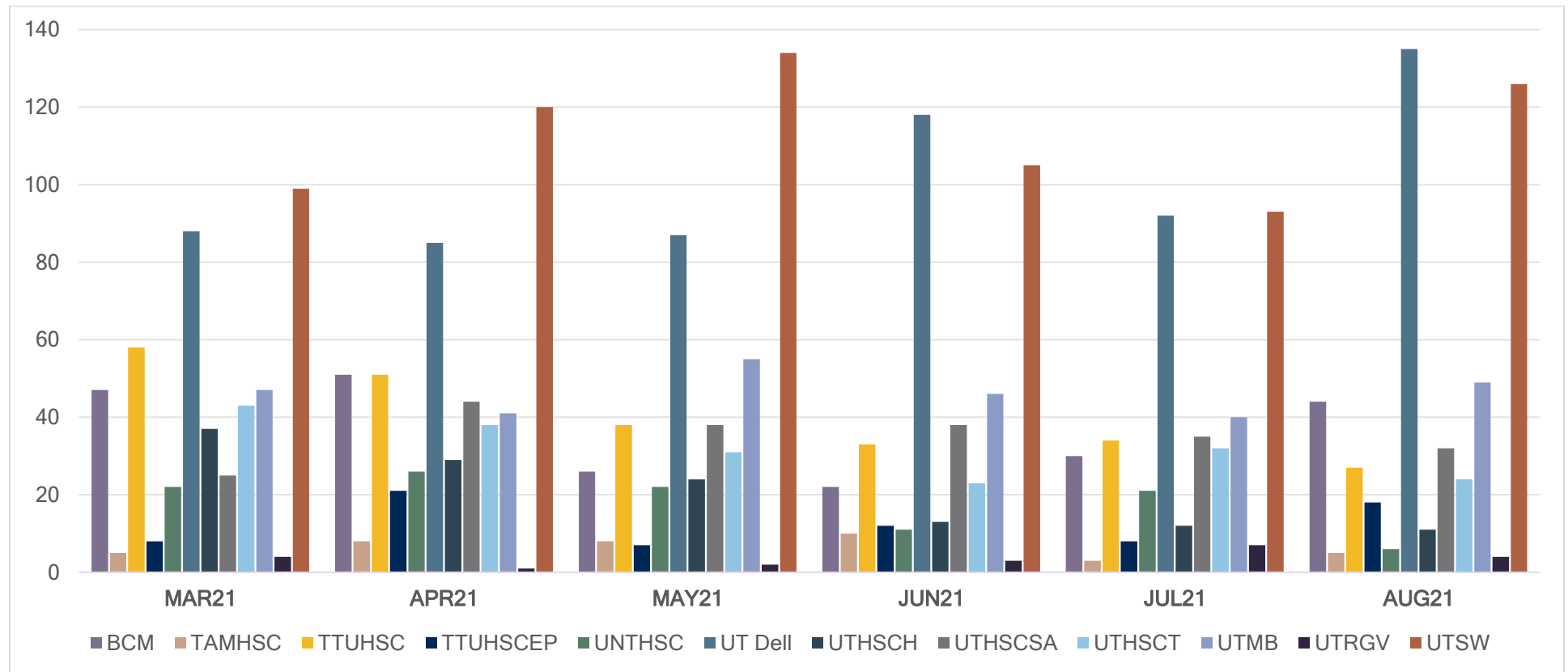


Table 2. TCHATT Monthly Referrals by HRI

	Number of Referrals by Month						Total Referrals (MAR21-AUG21)
	MAR21	APR21	MAY21	JUN21	JUL21	AUG21	
HRI							
BCM	28	104	74	26	9	60	301
TAMHSC	.	.	.	.	3	40	43
TTUHSC	.	27	62	8	.	47	144
TTUHSCEP	.	.	25	19	5	28	77
UNTHSC	.	.	35	17	2	8	62
UTHSCH	1	.	44	30	13	36	124
UTHSCSA	44	165	160	39	3	74	485
UTHSCT	4	34	1	.	.	6	45
UTMB	12	49	54	4	6	15	140
UTRGV	5	8	7	6	.	9	35
UTSW	.	.	32	4	.	28	64
All HRIs	94	387	494	153	41	351	1520

Data Source: TCHATT Referral-level Extract, Trayt. August 31st, 2021

Data does not include UT Dell TCHATT Referrals. UT Dell is in the process of finalizing a BAA between Trayt and Ascension/Seton and have been unable to enter protected health information into Trayt.

Figure 3. TCHATT Monthly Referrals from March 2021 to August 2021

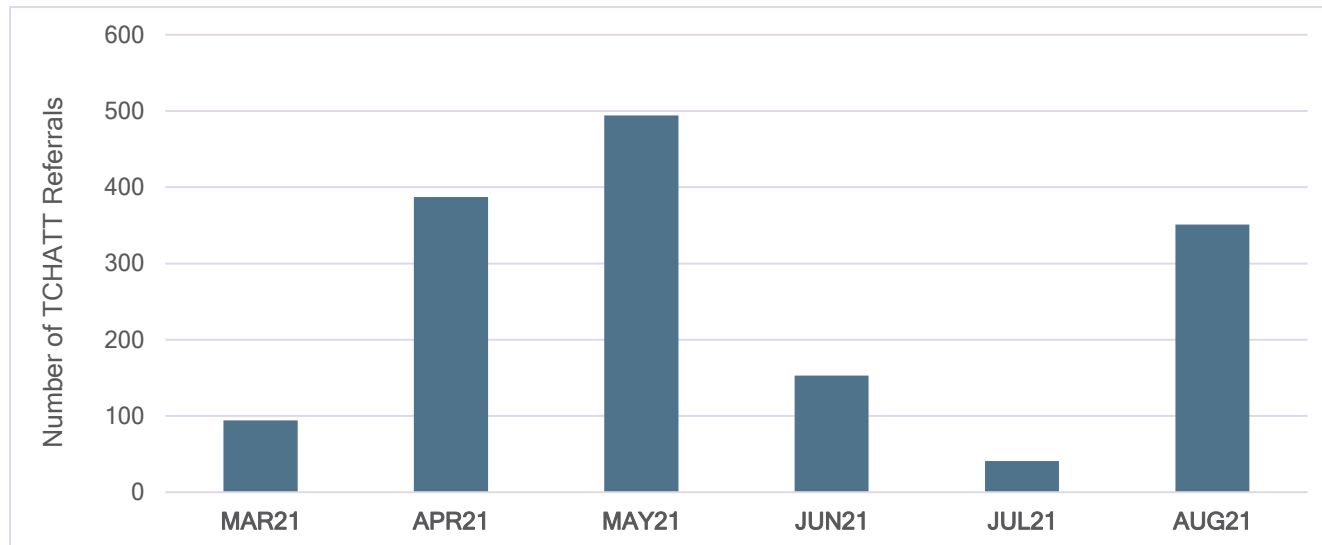
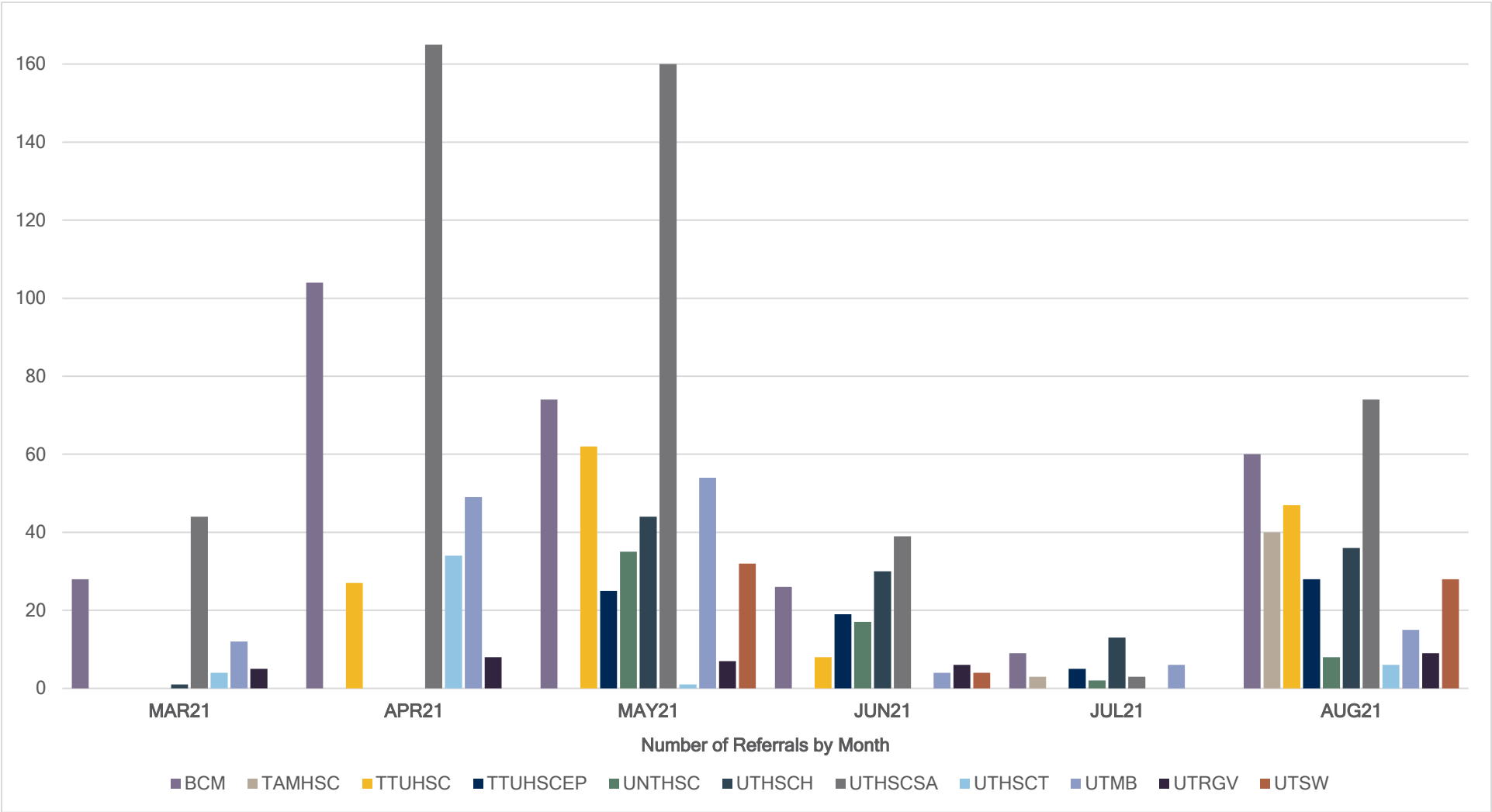
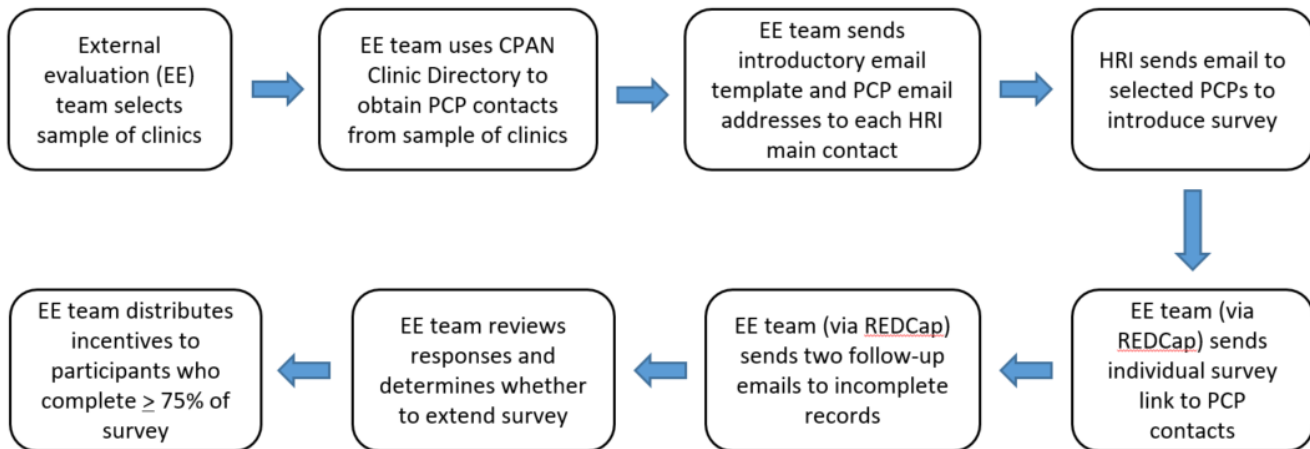


Figure 4. Monthly TCHATT Referrals by HRI



Appendix G. Surveys and Survey Protocols

CPAN Implementation Survey Protocol



Topics Covered

1. Activity Purpose
2. Who conducts the activity
3. When the activity occurs
4. Frequency of activity
5. Steps required to conduct the activity
6. Materials / Resources needed for the activity
7. Tracking system or Tools used to document activity conducted
8. Who monitors the activity
9. Steps to monitor the activity

Purpose of Activity

Collect data on the opinions and experience of various staff responsible for implementing CPAN program for clinics. We used a survey developed by the External Evaluation team as the data collection instrument.

Who Implements

TCMHCC External Evaluation team including contributors from UT Health School of Public Health and the Baker Institute for Public Policy.

When

July 2021

Frequency of Conducting

Distribute survey to clinics on July 8th. After receipt of the data collected through the survey administration, we conduct a follow-up period where we send reminders on July 12th and July

15th to remaining targets who did not complete and submit the survey.

Activity Steps

1. Attend the COSH CPAN state-wide meeting to introduce the CPAN Implementation survey.
2. Identify sample of clinics for CPAN survey.
3. Obtain contacts for all PCPs (physicians, residents, PA, and NPs) at selected clinics from CPAN Clinic Directory.
4. External Evaluation team develops a draft of the CPAN Implementation survey.
5. CPAN Implementation survey is shared with various stakeholders (CPAN HRI leads, various EC members) for feedback by July 2nd.
6. CPAN Implementation survey is coded into REDCap database in the project CPAN clinic-staff level.
7. CPAN Implementation survey is tested for link distribution and skip logic patterns by July 2nd.
8. Feedback and revisions are integrated into CPAN Implementation survey by July 7th.
9. Automated messaging is coded into the REDCap project to send an initial email with individual survey link to PCP emails by July 8th.
10. PCPs click the link and complete the survey.
11. REDCap sends two automatic reminders to complete and submit the CPAN Implementation survey to PCP contacts who did not complete their survey on July 12th and Jul 15th. Reasons the survey is not complete include the link was never opened or the link is partially complete but 'Submit' was not clicked.
12. Once this process is complete, External Evaluation team reviews response and determines whether to extend survey until July 23rd.
13. CPAN Implementation survey link expires on July 24th.

Tracking Instructions to Document Activity

Platforms utilized:

- REDCap – Database for survey distribution

Who Monitors the Activity

Team contributors/staffing:

- 1 Coordinator acts as a task manager for multiple streams of activity
- 2 GAs are responsible for REDCap and participant communication respectively

Communication Materials

Introductory Email to CPAN HRI Main Contacts:

Dear [Name],

I hope you had nice weekend! I want to let you know that we incorporated feedback on the CPAN survey from HRIs, and we will be sending the survey out to our sample of providers on Thursday, July 8th. In order to achieve a high response rate, we would greatly appreciate you sending an email to notify providers about this survey. I attached an email message with email addresses of selected providers at your HRI listed in the "Bcc" field (for privacy). I'm also including the message and emails below in case you have trouble with this attachment. Please copy me on the email as well so I can keep track of who receives.

Thanks so much for your help with this!

Sincerely,

Erica Frost
TCMHCC External Evaluation

Email Message to Sample of Providers:

Greetings CPAN providers!

Thank you so much for your role in the Child Psychiatry Access Network (CPAN) program!

As part of the external evaluation of the CPAN program, the University of Texas Health Science Center at Houston (UTHealth) School of Public Health and Rice University's Baker Institute for Public Policy are offering a \$50 electronic Amazon gift card for your participation in a survey. You will receive this survey via email from TCMHCC External Evaluation (TCMHCC.External.Evaluation@uth.tmc.edu). Only the first 500 responses will be accepted, so please respond FAST!

We look forward to receiving your feedback and appreciate your contribution to building a stronger CPAN program!

Participant emails:

Cc: Erica.L.Frost@uth.tmc.edu

Bcc: [Email addresses]

Follow-Up Emails to Sample of Providers:

Hello [First Name] [Last Name]!

We are following up on our request for you to complete the CPAN Implementation Survey. We want to make sure you have the chance to contribute your valued feedback in our Evaluation before **Friday, July 16th at 11:59 PM CDT**. In exchange for your participation, we are offering a \$50 Amazon card for your time!

Please note that your participation is voluntary and you are welcome to discontinue the survey at any point. If you choose to complete the survey, we ask that you answer the questions thoughtfully, and complete at least 75% of the survey and click 'Submit' to receive your \$50 Amazon card.

If you have not yet completed this survey, please follow the link below to begin your survey. The following link is unique to you and should not be forwarded to others. You may access this link by clicking the link below:

[Evaluation of the Texas Child Mental Health Care Consortium](#)

Or you may copy and paste the link below into your web browser:

<https://redcap.uth.tmc.edu/surveys/?s=j7uzB6m7Hr>

Thank you!

The External Evaluation Team for the Texas Child Health Mental Health Consortium

EVALUATION OF THE TEXAS CHILD MENTAL HEALTH CONSORTIUM

CPAN IMPLEMENTATION SURVEY

Thank you for taking the time to complete this survey. We want to learn about your opinions and experiences with the Child Psychiatry Access Network (CPAN) program. This survey is being conducted by the University of Texas Health Science Center-School of Public Health, in collaboration with Rice University's Baker Institute for Public Policy. We will not collect any identifying information as part of this survey except for email addresses and IP addresses since the survey is being administered electronically. This identifying information will not be used for research purposes. Survey results will be reported in aggregate form only and will never identify you. Your responses will remain confidential and will not affect your current or future relationship with CPAN. The survey will take about 30 minutes to complete. Please try to answer as honestly as you can. Your participation is voluntary, and you may stop completing this survey at any point. In compensation for your time and participation, you will be offered a \$50 electronic gift card after completing at least 75% of the survey. If you have any questions or technical issues completing this survey, please contact Erica Frost, Program Manager, by email at Erica.L.Frost@uth.tmc.edu or by phone at 713-500-9669. Thank you again for your participation!

A. AWARENESS AND LEVEL OF INVOLVEMENT WITH CPAN

These first questions ask about your level of awareness and involvement with the Child Psychiatry Access Network (CPAN) program.

1. How true is the following statement for you?

I am aware of the **Child Psychiatry Access Network (CPAN)** program.

- a. Not at all true **[SKIP Section A: Q2-11, Section B, Section C: Parts II and III only, and Section D]**
 - b. Slightly true
 - c. Somewhat true
 - d. Very true
2. Did you call CPAN during the past 12 months when there was a need?
 - a. No, and I have no plans to do so. **[SKIP Section A: Q4-Q5, Q8-11, Section B, Section C: Part III only, and Section D]**
 - b. No, but I plan to call CPAN in the future. **[SKIP Section A: Q4-Q5, Q8-11, Section B, Section C: Part III only, and Section D]**
 - c. Yes, I called CPAN on occasion. **[SKIP Section A: Q3-Q4]**
 - d. Yes, I called CPAN regularly. **[SKIP Section A: Q3-Q4]**
 - e. Yes, but I do not call CPAN anymore. **[SKIP Section A: Q3]**
 3. Please indicate the reason(s) you do not use CPAN services. Please choose all that apply.
 - a. I did not know how to call in
 - b. I have not come across any mental health issues that I could not address on my own
 - c. I am already trained in treating mental health conditions
 - d. I am able to meet the needs of children with mental health issues using existing resources
 - e. I am in the process of enrolling in CPAN
 - f. Other (please specify): _____
 4. Please indicate the reason(s) you do not use CPAN services anymore. Please choose all that apply.
 - a. My practice has moved.
 - b. I was not satisfied with CPAN services.
 - c. I no longer need CPAN services.

- d. CPAN requires too much time
- e. Other (please specify): _____

5. Please indicate the reason(s) why you used CPAN. Please choose all that apply.
- a. Assessment
 - b. Diagnosis
 - c. Behavioral management
 - d. Medication management
 - e. Referral assistance
 - f. General resources
 - g. Advice for parents
 - h. Second opinion (e.g., question or concern about care provided by a community mental health provider)
 - i. School issues
 - j. Crisis
 - k. Other (please specify): _____
6. Did you attend any trainings or receive materials and/or resources to help prepare you to use CPAN?
- a. Yes
 - b. No **(SKIP to Section A: Q8)**
 - c. Don't know **(SKIP to Section A: Q8)**
7. How helpful were these trainings, material, and/or resources?
- a. Not at all helpful
 - b. Somewhat helpful
 - c. Very helpful
 - d. Extremely helpful
8. Please indicate which of the following occurred for your patient(s) as a result of your CPAN consultation. Please choose all that apply.
- a. Initiation of new medication
 - b. Adjustment of current medication
 - c. Recommendation of therapy
 - d. Referral to child and adolescent psychiatrist
 - e. Referral to other mental health professional (e.g., LP, LPC, LCSW, LMFT) in the community
 - f. Continuation of PCP management
 - g. Other needs of patient met (please specify): _____

Please indicate the degree to which CPAN increased the following for you:

	Not at all	Slightly	Moderately	Very much
9. My knowledge in mental health care	☐	☐	☐	☐
10. My skill to provide mental health care	☐	☐	☐	☐
11. My confidence to provide mental health care	☐	☐	☐	☐

12. What other mental health providers/services are available to you for mental health consults (besides CPAN)?
Please describe. _____

B. CPAN ACTIVITY CHECKLIST

Below are a set of possible activities that comprise the CPAN program. Please indicate whether or not you participated in each of these activities.

	Awareness Activities	Yes	No	Don't Know
1.	I received brochures or other information from the CPAN Hub			
2.	I obtained buy-in from other providers at my clinic prior to enrolling in CPAN			
	Training Activities	Yes	No	Don't Know
3.	I received a welcome packet from the CPAN Hub after enrolling in CPAN			
4.	I received training on CPAN services			

Now, please indicate the **frequency** with which you participate in each activity listed using the available response options.

	Implementation Support Activities	Often	Sometimes	Rarely	Don't Know
5.	I receive education (e.g., newsletter, videos, additional trainings, etc.) from the CPAN Hub on identifying and treating mental health conditions				
6.	I have participated in CME activities offered through CPAN.				
7.	My clinic discusses CPAN in staff development meetings				
	Consultation Activities	Often	Sometimes	Rarely	Don't Know
8.	I call CPAN to consult with a psychiatrist				
9.	I call CPAN to obtain referrals or resources for families				
10.	I notify parents of the patient about CPAN prior to calling for a consultation				
	Child Assessment & Ongoing Care Activities	Often	Sometimes	Rarely	Don't Know
11.	After a CPAN consultation about a patient, I follow recommendations provided by the psychiatrist				
12.	After a CPAN consultation about a patient, I follow up with the patient's family				

C. ORGANIZATIONAL CHARACTERISTICS

Part II:

The next set of questions ask about your perceptions of CPAN and how it may compare to other services and programs offered at your clinic. Remember, there are no right or wrong answers so please answer how you really think or feel.

Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. CPAN is better than other services we <i>have used before</i> in our clinic.	☐	☐	☐	☐	☐
2. CPAN is better than other services we <i>have considered using</i> in our clinic.	☐	☐	☐	☐	☐
3. CPAN represents an advance over other services that <i>are already available</i> in our field.	☐	☐	☐	☐	☐
4. CPAN represents improvement over how we have done things before.	☐	☐	☐	☐	☐
5. CPAN has advantages for our clinic compared to other innovations.	☐	☐	☐	☐	☐
6. CPAN meets our clinic needs better than what we have been doing.	☐	☐	☐	☐	☐
7. CPAN represents a better option over what we have been doing.	☐	☐	☐	☐	☐
8. There is evidence that CPAN works better than other services.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. CPAN fits well with other initiatives in our clinic.	☐	☐	☐	☐	☐
2. CPAN helps us meet the needs of the people we serve.	☐	☐	☐	☐	☐
3. CPAN is timely given the current needs of the people we serve.	☐	☐	☐	☐	☐
4. CPAN fits well with our clinic's culture.	☐	☐	☐	☐	☐
5. CPAN fits well with our clinic's values.	☐	☐	☐	☐	☐
6. CPAN fits well with our clinic's mission.	☐	☐	☐	☐	☐
7. We can see how using CPAN helps meet our clinic's needs.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. CPAN is difficult to use.	☐	☐	☐	☐	☐
2. CPAN is hard to understand.	☐	☐	☐	☐	☐
3. The many different parts involved in CPAN make it complicated.	☐	☐	☐	☐	☐
4. It is difficult to use CPAN because it is complicated.	☐	☐	☐	☐	☐
5. It is easy for us to use CPAN.	☐	☐	☐	☐	☐
6. CPAN is easy for us to understand.	☐	☐	☐	☐	☐

The next set of questions asks about your perceived benefits of using CPAN and its priority at your clinic. Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. We can see how using CPAN will help meet our clinic's goals.	☐	☐	☐	☐	☐
2. We see how CPAN will work in the short-term.	☐	☐	☐	☐	☐
3. We can see how CPAN can benefit the people we serve.	☐	☐	☐	☐	☐
4. In the near future, we expect to see the benefits of CPAN.	☐	☐	☐	☐	☐
5. We expect to see a good return on our investment in CPAN.	☐	☐	☐	☐	☐
6. We are able/will be able to see short-term gains from CPAN.	☐	☐	☐	☐	☐
7. We will be able to see/are seeing tangible benefits from CPAN.	☐	☐	☐	☐	☐
8. There is evidence that CPAN works.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. Using CPAN is one of our top priorities.	☐	☐	☐	☐	☐
2. Our clinic emphasizes that implementing CPAN is very important.	☐	☐	☐	☐	☐
3. CPAN is important for our clinic right now.	☐	☐	☐	☐	☐
4. Decision makers at our clinic believe CPAN is important.	☐	☐	☐	☐	☐
5. It is important that we implement CPAN right now.	☐	☐	☐	☐	☐
6. There is an urgent need for CPAN at our clinic.	☐	☐	☐	☐	☐
7. External reasons make CPAN a priority for our clinic.	☐	☐	☐	☐	☐
8. Internal reasons make CPAN a priority for our clinic.	☐	☐	☐	☐	☐
9. Our clinic is committed to implementing CPAN.	☐	☐	☐	☐	☐

Part III:

The next set of questions ask about your clinic's capacity to implement CPAN. Remember, there are no right or wrong answers.

Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. We have the ability to implement CPAN.	☐	☐	☐	☐	☐
2. We have the knowledge to implement CPAN.	☐	☐	☐	☐	☐
3. We have the skills needed to implement CPAN.	☐	☐	☐	☐	☐
4. We can describe the steps needed to implement CPAN.	☐	☐	☐	☐	☐
5. We know what it takes to implement CPAN.	☐	☐	☐	☐	☐
6. We feel confident in our ability to implement CPAN.	☐	☐	☐	☐	☐
7. We know the core components of CPAN.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. An influential person in our clinic strongly promotes CPAN.	☐	☐	☐	☐	☐
2. At least one person we work with clearly communicates the benefits of using CPAN.	☐	☐	☐	☐	☐
3. We have a person/people who share(s) progress on how implementation is going.	☐	☐	☐	☐	☐
4. We have a person/people who share(s) our progress on CPAN with other clinics.	☐	☐	☐	☐	☐
5. There is an influential person in our clinic who tries to get others to use CPAN.	☐	☐	☐	☐	☐
6. At least one person in our clinic has the skills to promote CPAN to our colleagues.	☐	☐	☐	☐	☐
7. We have an individual within our clinic who takes a lead role in making sure CPAN is used.	☐	☐	☐	☐	☐

The next set of questions asks about your clinic's climate and communication networks within and outside of the clinic. Please mark how much you agree or disagree with the following statements.

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. If needed, our clinic provides technical assistance or coaching to use CPAN.	☐	☐	☐	☐	☐
2. Our clinic provides high quality trainings that are useful for implementing CPAN.	☐	☐	☐	☐	☐
3. Our clinic asks staff about their training needs for CPAN.	☐	☐	☐	☐	☐
4. Supervisors monitor how CPAN is implemented.	☐	☐	☐	☐	☐
5. Supervisors give feedback to staff about how they are implementing CPAN.	☐	☐	☐	☐	☐

6. Our clinic effectively deals with turnover to keep implementation of CPAN on track.	☐	☐	☐	☐	☐
7. There is a process in place to help new employees understand the expectation of using CPAN.	☐	☐	☐	☐	☐
8. Our clinic dedicates sufficient resources to implementing CPAN.	☐	☐	☐	☐	☐
9. Supervisors expect us to implement CPAN.	☐	☐	☐	☐	☐
10. Supervisors support implementation of CPAN.	☐	☐	☐	☐	☐
11. Supervisors have expressed the importance of implementing CPAN.	☐	☐	☐	☐	☐
12. Staff get the support they need to implement CPAN.	☐	☐	☐	☐	☐
13. Supervisors acknowledge staff for implementing CPAN.	☐	☐	☐	☐	☐
14. People who use CPAN are valued in this clinic.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. We are able to get support for delivering CPAN by collaborating with the CPAN Hub.	☐	☐	☐	☐	☐
2. We communicate well with CPAN Hub staff to implement CPAN.	☐	☐	☐	☐	☐
3. We obtain support from the CPAN Hub to help us implement CPAN.	☐	☐	☐	☐	☐
4. We can problem-solve with CPAN Hub staff to help deliver CPAN.	☐	☐	☐	☐	☐
5. We can get advice from the CPAN Hub to deliver CPAN.	☐	☐	☐	☐	☐
6. We are on the same page as the CPAN Hub in regards to CPAN.	☐	☐	☐	☐	☐
7. Relationships to the CPAN Hub are important for delivering CPAN.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. We can communicate well with other teams within our clinic about CPAN.	☐	☐	☐	☐	☐
2. We can coordinate well with each other when trying to implement CPAN.	☐	☐	☐	☐	☐
3. We get implementation support for CPAN from other teams in our clinic.	☐	☐	☐	☐	☐
4. Individuals within our clinic help support each other in implementing CPAN.	☐	☐	☐	☐	☐
5. We regularly meet with other units/teams within our clinic about implementing CPAN.	☐	☐	☐	☐	☐
6. We have an implementation team that consists of people from different departments to implement CPAN.	☐	☐	☐	☐	☐

7. Intra-organizational relationships are important for implementation.	☐	☐	☐	☐	☐
---	--------------------------	--------------------------	--------------------------	--------------------------	--------------------------

D. OTHER CPAN QUESTIONS

Now we have some more questions about CPAN.

	Strongly agree	Agree	Disagree	Strongly disagree
1. I would recommend the CPAN program to other providers.	☐	☐	☐	☐
2. I intend to continue using the CPAN program in the next 6 months.	☐	☐	☐	☐

3. Overall, what do you see as the biggest benefit of the CPAN program? [open-ended]
4. How can the CPAN program be improved? [open-ended]

E. BACKGROUND

Now we have some questions about your background and clinic. Remember that all responses are completely confidential. Results will only be reported in the aggregate.

1. How do you describe your gender? (Remember, all of your responses on this survey are voluntary.)
 - a. Male
 - b. Female
 - c. Other
2. How do you describe your race/ethnicity?
 - a. White, not of Hispanic origin
 - b. Black, not of Hispanic origin
 - c. Hispanic
 - d. American Indian/Alaskan Native
 - e. Asian or Pacific Islander
 - f. Other: _____
3. In what year did you complete your professional training? _____
4. What is your position in your clinic/organization?
 - a. Physician Assistant
 - b. Nurse Practitioner
 - c. Pediatrician
 - d. Family Physician
 - e. Other physician besides pediatrician and family physician
 - f. Other (please specify): _____

5. How many years have you worked at your clinic? (If less than 1, put 0) __ __ years
6. How many hours per week do you work at your clinic? __ __ hours
7. How long has your practice been in operation? __ __ years
8. How many full-time equivalents (FTEs) of the following personnel are in your clinic?

Providers (physicians, PAs, NPs) __ __

Nurses __ __

Medical assistants __ __

Community health workers/patient navigators __ __

Support staff (medical records, check-in, etc.) __ __

Administrators __ __

9. What is the average number of patients scheduled per hour in your clinic? __ __
10. What is the average number of patients seen per hour in your clinic? __ __

11. Which of the following best describes your clinic?

- ☐ Private practice, including solo, group practice, or HMO
- ☐ Federally-qualified health center, including community, migrant, rural, or Indian health center
- ☐ Hospital-based clinic, including university clinic or residency teaching practice
- ☐ Public health department-operated clinic
- ☐ Military clinic
- ☐ Other (please specify): _____

12. What best describes the region in which you practice?

- ☐ Urban
- ☐ Suburban
- ☐ Rural

13. What is the primary zip code of your practice?

14. What is the racial composition of your patient population? Please indicate the percentage for each group listed below. Please approximate; groups may not sum to 100%.

	0%	1-25%	26-50%	51-75%	76-100%	Don't know
White, not of Hispanic origin	☐	☐	☐	☐	☐	☐
Black, not of Hispanic origin	☐	☐	☐	☐	☐	☐
Hispanic	☐	☐	☐	☐	☐	☐
American Indian/Alaskan Native	☐	☐	☐	☐	☐	☐
Asian or Pacific Islander	☐	☐	☐	☐	☐	☐
Other (please specify): _____	☐	☐	☐	☐	☐	☐

15. *About* what percent of your patients use the following primary payment methods? (Please approximate; groups may not sum up to 100%)

	0%	1-25%	26-50%	51-75%	76-100%	Don't know
Private insurance	☐	☐	☐	☐	☐	☐
Medicaid or your state's Children's Health Insurance Program (CHIP)	☐	☐	☐	☐	☐	☐
Uninsured/self-pay	☐	☐	☐	☐	☐	☐
Medicare	☐	☐	☐	☐	☐	☐
Other (please specify): _____	☐	☐	☐	☐	☐	☐

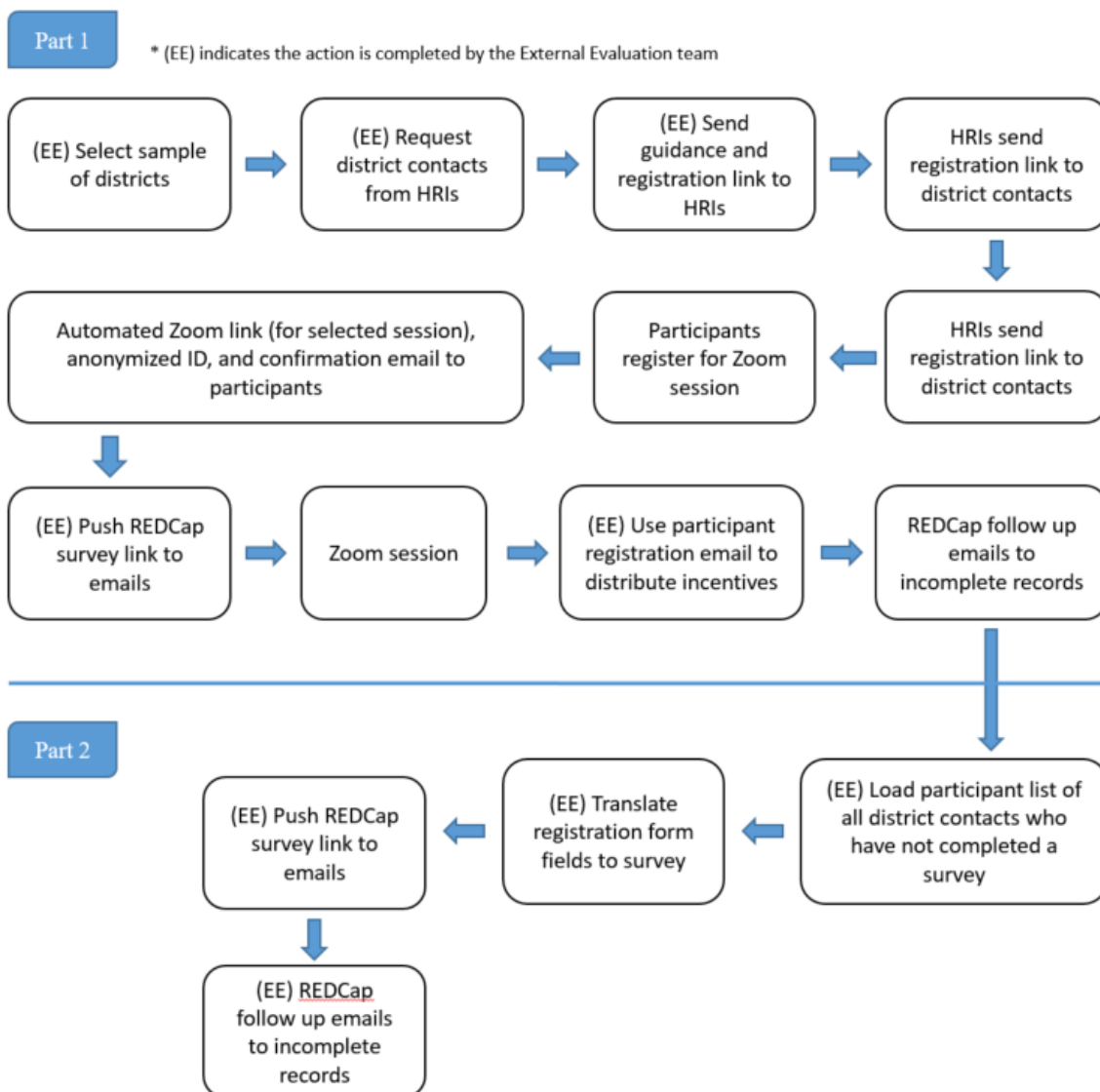
16. Which statement best describes your clinic's electronic health record (EHR) system?

- ☐ We do not have an EHR
- ☐ We have purchased/begun installation of an EHR but are not yet using the system
- ☐ We have an EHR installed and in use for some of our clinic staff and providers
- ☐ We have an EHR installed and in all (more than 90%) areas of our clinic

Thank you so much for your time in completing this survey!

If you have any questions, please do not hesitate to contact Erica Frost, Program Manager by email at Erica.L.Frost@uth.tmc.edu or by phon at 713-500-9669.

TCHATT Implementation Survey Protocol



Topics Covered

1. Activity Purpose
2. Who conducts the activity
3. When the activity occurs
4. Creating the sampling frame
5. Frequency of activity
6. Steps required to conduct the activity
7. Materials / Resources needed for the activity
8. Tracking system or Tools used to document activity conducted
9. Who monitors the activity
10. Steps to monitor the activity

Purpose of Activity

Collect data on the opinions and experience of various staff responsible for implementing TCHATT program for schools and school districts. We used a survey developed by the External Evaluation team as the data collection instrument.

Who Implements

TCMHCC External Evaluation team including contributors from UT Health School of Public Health and the Baker Institute for Public Policy.

When

May through July 2021

Sampling Frame

To create a sampling frame, we utilized two district level factors to select our target sample. The first factor was eligibility for the National School Lunch Program (NSLP). The second factor utilized was TEA district type, which provides a scale of urban to rural classification of districts. For our purposes, we collapsed the TEA district type into the dichotomous variables urban and rural. Our final sample was 104 school districts, with representation from each of the 12 HRI sites. A total of 277 school staff completed the electronic surveys.

Frequency of Conducting

4 Zoom sessions occurring June 8th at 5pm, June 10th at 5pm, Friday June 11th at 9am and Monday June 14th at 9am. After receipt of the data collected through the Zoom process administration, we conduct a follow up period where we push links to remaining targets who were unable to attend a Zoom session.

Activity Steps

1. Attend the COSH TCHATT state-wide meeting to introduce the TCHATT Implementation survey
2. Initial request of district-level and campus-level contacts from each of the 12 health-related institution (HRI) including name, email, district, campus, role.
3. Follow up with HRI TCHATT leads on any missing data.
4. External Evaluation team develops a draft of the TCHATT Implementation survey.
5. TCHATT Implementation survey is shared with various stakeholders for feedback (TCHATT HRI leads, various EC members)
6. Feedback and revisions are integrated into TCHATT Implementation survey
7. TCHATT Implementation survey is coded into REDCap database in the project TCHATT Campus-staff level
8. TCHATT Implementation survey is tested for link distribution and skip logic patterns.
9. Registration link is prepared through Airtable with contribution and expertise from an external contributor from the Baker Institute for Public Policy.
10. Coordinator on the External Evaluation team provides individual guidance documents to each HRI. These documents include language to introduce the TCHATT Implementation

survey, a link to Airtable registration form, and a list of emails to forward the survey registration information.

11. Coordinator and GA follow up with a phone call to each TCHATT HRI lead to confirm receipt of registration link materials and assist with sending out the registration link.
12. One the initial request for registration is sent by the respective TCHATT HRI leads, GA and Coordinator send a daily reminder on the email chain created by the TCHATT. There should be three separate follow up messages sent to each of the 12 HRI target contact lists.
13. Registration for TCHATT Implementation zoom sessions begins and will remain open until the final session on Monday June 14th at 9am. When registration closes, the link is still active to send an email to Coordinator on External Evaluation team to manually send TCHATT Implementation survey link to participants.
14. Targets click the link and complete the registration form.
15. Prior to and during each Zoom session the following steps occur: (the technical portion of the Zoom session was facilitated by external contributor from the Baker Institutes for Public Policy)
 - a. The registration form is loaded into REDCap as a participant list
 - b. The REDCap individualized survey link is sent to the participants registered for the upcoming session 15 minutes prior to start time.
 - c. The survey administration team joins 40 minutes before the session.
 - d. The registered participants are admitted from the Zoom waiting room at the start time.
 - e. Introduction, verbal consent, and instruction are provided by the survey administration team.
 - f. Participants complete surveys for the remaining time, with ability to ask questions in the chat box or in a breakout room, as needed.
 - g. Any latecomers are directed to a breakout room for introduction and verbal consent.
16. Automatic reminder to complete and submit the TCHATT Implementation survey is sent each morning at 9am to those who registered and did not complete their survey. This occurs for two days. Reasons the survey is not complete include missed attendance at the Zoom session, the link was never opened, or the link is partially complete but 'Submit' was not clicked.
17. Once this process is complete, REDCap is used to send a final reminder to participants in all sessions with incomplete records as a request to complete the survey.

.....

*** A follow-up protocol was developed to obtain additional responses.

18. The questions from the Airtable registration form are translated to the REDCap survey. Some adjustments were made since the instruction is read rather than heard in a Zoom session.
19. The participants who completed the survey are removed from the original contact lists provided by each HRI. This revised list will become the participant list in a new REDCap project.
20. Individualize links will be provided to each of the school and campus contacts who did not complete the survey. This is intended to give the contacts who were unable to attend a

Zoom session the opportunity to share their opinions and experience with TCHATT.

21. Automated messaging will be coded into the REDCap project to send an initial email with the survey link as well as a series of follow up messages based on the period of time the survey remains live.

Tracking Instructions to Document Activity

Platforms utilized:

- GoogleDoc – Communication tracking with HRIs
- R – Prepare HRI guidance materials (i.e. list of emails)
- Airtable – registration and zoom link
- Zapier – Airtable to Zoom automation
- Zoom – Virtual survey session platform
- REDCap – Database for survey distribution

Who Monitors the Activity

Team contributors/staffing:

- 1 Coordinator acts as a task manager for multiple streams of activity
 - 2 GAs are responsible for REDCap and participant communication respectively
 - 1 Consultant was needed for technical facilitation of the automations between Airtable and Zoom, Zoom session support
-

Communication Materials/Resources

Initial Email from TCHAT HRI Lead:

UNTHSC

Email to TCHAT Survey participants

Please send the email language below to the emails list below.

Email language

Greetings TCHAT district/school staff!

Thank you so much for your role in the Texas Child Health Access Through Telemedicine (TCHAT) program!

We are offering a \$50 electronic Amazon gift card for your participation in an hour-long, survey webinar! Only the first 500 staff respondents will be accepted, so please sign up FAST! Please click on your preferred date and time to register:

TCHAT Implementation Survey Registration Form

Our team is interested in your experience with TCHAT. We'd like to understand the decision-making process for the implementation of TCHAT at your school or district. This information will support our External Evaluation of the Texas Children's Mental Healthcare Consortium, conducted by UT Health School of Public Health and the Baker Institute for Public Policy.

We look forward to hearing your experience and appreciate your contribution to building a stronger TCHAT program!

The External Evaluation Team

Participant emails

Cc: jk90@rice.edu; ariel.c.harrison@uth.tmc.edu

Bcc: [REDACTED]

Follow up 1:

Thank you to everyone who registered so far!

SPOTS ARE FILLING FAST!! Register now to receive \$50 dollars for sharing your important feedback about TCHAT.

TCHAT Implementation Survey Registration Form

Thank you!

The External Evaluation Team

Follow-up Email# 2:

LAST CHANCE to register to receive \$50 dollars for sharing your important feedback about TCHAT.

TCHAT Implementation Survey Registration Form

Thank you!
External Evaluation team

Follow-up Email #3:

Thank you to those who have registered!

We don't want you to miss out on the chance to receive a \$50 Amazon card for sharing your valued feedback about TCHAT.

Our remaining sessions are Thursday June 10 at 5pm, Friday June 11 at 9am and Monday June 14 at 9am.

Please click to register for a session: [TCHAT Implementation Survey Registration Form](#)

Thank you!
The External Evaluation Team

Zoom Session Script and Verbal Instruction

Introduction

- Welcome, thank you for your participation
- Purpose of the survey
- Why this medium – we’re holding this session to carve out a time in your busy schedules to participate in our survey and provide be available to answer questions you might have
- Consent form – your responses remain confidential
- Emphasize – must complete survey 75% and press submit

Instruction

If you have a question, please drop it in the chat and our team will answer as best we can, otherwise you will direct to a break room for further support. The chat box can be found on the bottom menu using the button “chat” or if you’re on your phone click on the 3 dots under “more” to find the chat option. Any comments in the chat window will only be visible to our survey team, to keep your identities confidential. We appreciate your patience with us as we address any questions you have!

Before the start of the session, you received a link to the email address you used to register for this zoom session. Please search your inbox, you might search subject: “TCHATT Implementation Survey Link”. Once you find the email in your inbox, please click the hyperlink for “Evaluation of the Texas Child Mental Health Consortium” or copy and paste the redcap link into your browse. If you have a question, drop it in the chat, and please give us a thumbs up once you’re ready to proceed.

You should have the survey open on your screen. The purpose of our survey is to capture information about the decision-making process related to TCHATT. As you complete the survey, it is very important that you think of ONE campus as you answer the questions. Again, your responses should reflect your experience with ONE campus. For those of you who work at one school campus, this next set of instructions will not apply.

For those of you who identified multiple campuses on your registration form, please think about the campus where you spend most of your time on TCHATT. Type the name of the school campus where you spend more of your time on TCHATT in the text box. Throughout the survey, please respond to the questions with this campus in mind.

For those of you who selected “None of the Above” please answer whether this was because the school campus was not listed or another reason. If you selected “None of the Above” because you work at a school that is not listed, please type in the school name where you spend the most time on TCHATT.

For the remaining time, please complete the survey. To submit your answers, please click submit at the end. To reiterate, if any questions come up, please drop them in the chat box and we will help you out!

I will let you know when 15 minutes remain in our session. Please note, the meeting may end, but you can still finish the survey after this session time. Thank you for your time!

Closing

- Thank you
- If you had trouble during this session and we did not hear from you, please ping us in the chat now, or reach out via email
- Gift cards process
- Team process, timeline for results

EVALUATION OF THE TEXAS CHILD MENTAL HEALTH CONSORTIUM

TCHATT IMPLEMENTATION SURVEY

Thank you for taking the time to complete this survey. We want to learn about your opinions and experiences with the Texas Child Health Access Through Telemedicine (TCHATT) program and other mental health services in your school. This survey is being conducted by University of Texas Health Science Center-School of Public Health, in collaboration with the Baker Institute at Rice University. The survey will take about 30 minutes to complete. Your responses are confidential and will not affect your current or future relationship with TCHATT. Please try to answer as honestly as you can. Your participation is voluntary, and you may stop completing this survey at any point. In compensation for your time and participation, you will be offered a \$50 electronic gift card after completing this survey. If you have any questions or technical issues completing this survey, please contact Erica Frost, Program Manager, by email at Erica.L.Frost@uth.tmc.edu or by phone at 713-500-9669.

Thank you so much for your time in completing this survey!

This survey asks questions about your opinions and experiences with the TCHATT program. Some items will ask about TCHATT in the school setting. As you complete the survey, it is very important that you think of ONE campus as you answer the questions.

1. Which of the following statements best describes your interaction with the TCHATT program?
 - a. I spend all my time on TCHATT with one school campus. **[SKIP Q3, Q4 AND Q5]**
 - b. I split my time on TCHATT among multiple school campuses. **[SKIP Q2, Q4 AND Q5]**
 - c. I do not spend any time on TCHATT with a specific school campus (e.x. Mental Health Referral Coordinator, Family Resource Center). **[SKIP Q2 AND Q3]**

Please identify the ONE school campus where you work on TCHATT.

2. Please enter the name of the school campus where you work on TCHATT.

During this survey, it is important you answer the survey questions with ONE campus in mind. If you work at multiple campuses, please think of the campus where you spend most of your time on TCHATT.

3. Please enter the name of the ONE campus where most of your time is spent on TCHATT. [open-ended]

Please provide additional information on your employment related to TCHATT.

4. Are you a sub-contractor of a school or school district?
 - a. Yes
 - b. No **[SKIP Q5]**
5. Please enter the name of the organization that employs you. [open-ended]

A. AWARENESS AND LEVEL OF INVOLVEMENT WITH TCHATT

These first questions ask about your level of awareness and involvement with the Texas Child Health Access Through Telemedicine (TCHATT) program.

13. How true is the following statement for you?

I am aware of the **Texas Child Health Access Through Telemedicine (TCHATT)** program.

- a. Not at all true **[SKIP REMAINING QUESTIONS IN SECTION A, SECTION B, SECTION D: PARTS II AND III ONLY, AND SECTION E]**
 - b. Slightly true
 - c. Somewhat true
 - d. Very true
14. Has your district or school implemented TCHATT during the past 12 months?
- a. No, and we have no plans to do so. **[SKIP ALL REMAINING QUESTIONS IN SECTION A, SECTION B, SECTION D: PART III ONLY, AND SECTION E]**
 - b. No, but we are planning to implement TCHATT in the future. **[SKIP Q3, Q4, Q7-Q10 IN SECTION A SECTION D: PART III ONLY, AND SECTION E]**
 - c. Yes, we are at an early stage of implementing TCHATT.
 - d. Yes, we have implemented TCHATT, but it is inconsistently implemented at the district or school.
 - e. Yes, we have implemented TCHATT fully and systematically across the district or school.
 - f. Don't know **[SKIP ALL QUESTIONS IN SECTION A, SECTION B, SECTION D: PARTS II AND III ONLY, AND SECTION E]**
15. How many months have you been implementing TCHATT in your school? _____ (months)
16. How involved are you with the implementation of TCHATT at your district or school?
- a. Not at all involved **[SKIP REMAINING QUESTIONS IN SECTION A, SECTION B, SECTION D: PART III ONLY, AND SECTION E]**
 - b. Somewhat involved
 - c. Very involved
17. Did you attend any trainings or receive materials and/or resources to help prepare you to implement the TCHATT program in your school?
- a. Yes
 - b. No (SKIP to #7 in Section A)
 - c. Don't know (SKIP to #7 in Section A)
18. How helpful were these trainings, material, and/or resources?
- e. Not at all helpful
 - f. Somewhat helpful
 - g. Very helpful
 - h. Extremely helpful
19. In your best estimate, of those students referred to TCHATT at your school, how many parents/guardians were interested in obtaining TCHATT services for their child?
- a. Less than 25%
 - b. 26-49%
 - c. 50-75%
 - d. Greater than 75%
 - e. Don't know
20. Thinking about the students who have received TCHATT services in your school; please indicate how much you agree or disagree with the following statements.

Since the students started receiving mental health services through TCHATT....

	Strongly agree	Agree	Disagree	Strongly disagree	Don't know
1. These students are more involved in school.	☐	☐	☐	☐	☐
2. These students had a decrease in behavioral incidents.	☐	☐	☐	☐	☐
3. These students had better attendance at school.	☐	☐	☐	☐	☐
4. These students had better grades at school.	☐	☐	☐	☐	☐

21. Please indicate how much you agree or disagree with the following statement: "TCHATT increased school staff capacity to meet the non-educational needs of students."

- a. Strongly agree
- b. Agree
- c. Neither agree or disagree
- d. Disagree
- e. Strongly disagree

B. TCHATT Activity Checklist

Below are a set of possible activities that comprise the TCHATT program at schools. Please indicate the frequency with which your school participates in each activity listed using the available response options.

	Awareness Activities	Often	Sometimes	Rarely	Never	Don't Know
1.	My school obtained buy-in from counselors and school leadership prior to enrolling in TCHATT					
2.	My school receives material about TCHATT and how to refer students.					
Implementation Support Activities						
3.	My school received training to implement TCHATT					
4.	My school provided training to implement TCHATT					
5.	My school receives ongoing information (e.g., newsletter, videos, additional trainings, etc.) from the health-related institution (HRI) to support implementation of TCHATT					
6.	My school discusses TCHATT regularly in staff development meetings					
School Activities						
7.	School personnel refer students in need of TCHATT services to counselors or other designated TCHATT Campus Liaison (CL)					
8.	School counselor/CL submits student referrals to TCHATT					

9.	Counselor/CL explains TCHATT to family					
10.	My school provides a translator to explain TCHATT to families who do not speak English					
11.	School counselor/CL obtains verbal consent from families to receive TCHATT services					
12.	Parents/legal guardians who refuse TCHATT services are asked if they are willing to talk to someone at the HRI or consider TCHATT in future					
13.	Counselor/CL follows up with HRI or family after referral is made to make sure student is connected to TCHATT					
14.	Counselor/CL coordinates scheduling of on-campus appointments with student/family and TCHATT					
15.	School personnel secure a room for TCHATT visits					
16.	School personnel pulls student from class and escorts them to the identified room at the time of appointment					
17.	Parent/legal guardian attends the first appointment					
18.	My school has IT support available for TCHATT visits					
Child Assessment & Ongoing Care Activities						
19.	Counselor/CL follows up with students after TCHATT sessions are completed to see if additional support is needed					

20. Has your school translated TCHATT brochures or other educational material available for families that do not speak English?
- Yes
 - No
 - Don't know
21. What languages, other than English, are TCHATT brochures or other educational materials provided in?
- Spanish
 - Vietnamese
 - Chinese language such as Mandarin or Cantonese
 - Korean
 - Urdu
 - Hindi
 - Farsi
 - Other, please specify. [open-ended]
22. Do you have any additional comments related to the activities that you conduct as part of TCHATT? If so, please enter them there. [open-ended response]

C. MENTAL HEALTH SERVICES IN SCHOOLS

This next set of questions are about the types of mental health services (besides TCHAT) that are provided in your school.

22. Besides TCHAT, please indicate which of the following state-funded programs that your school has used in the past 12 months to support school-based mental health services or educator training. Please select all that apply.
- Community mental health services (i.e., use of local mental health authorities)
 - Communities in School of Texas
 - Community mental health grants
 - Safe School allotments
 - Mental Health First Aid Training program
 - Non-physician mental health professional in education service center
 - Don't know
 - None of the above
 - Other, please specify: [open-ended]
23. During the past 12 months, has your school undertaken efforts to assess the mental health needs of your students?
- Yes
 - No
 - Don't know
24. Besides TCHAT, does your school have a formal agreement or memorandum of understanding (MOU) with one or more external providers to provide mental health services to students?
- Yes
 - No (SKIP TO Q16)
 - Don't know (SKIP TO Q16)
25. Which of the following external providers does your school have a formal agreement or MOU to provide mental health services to students? Please select all that apply.
- Local mental health center
 - Community health center
 - Social services organization
 - Private counselor
 - School-linked health center
 - School-based health center
 - Drug prevention agency
 - Local health department
 - Private psychologist
 - Drug treatment provider
 - Telehealth provider
 - University or medical school
 - None of the above
 - Don't know
 - Other, please specify: [open-ended]
26. In your best estimate, what percentage of the student population has need of non-educational supports such as meals, clothing, and/or counseling or behavioral therapy?
- Less than 5%
 - 6-15%
 - 16-25%
 - 26-35%
 - 36-50%

- f. Greater than 50%
- g. Don't know

27. In your best estimate, how much time does school staff spend addressing non-educational needs such as behavioral problems, hunger, sleep deprivation and/or need of adequate school supplies or clothing?
- a. Less than 15%
 - b. 15-25%
 - c. 26-49%
 - d. Greater than 50%
 - e. Don't know

D. ORGANIZATIONAL CHARACTERISTICS

Part I.

The next set of questions ask about your perceptions of your school's overall function. There are no right or wrong answers, so please answer honestly.

These next questions are about your school climate. Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. Our rules and regulation allow for creativity.	☐	☐	☐	☐	☐
2. If someone wants to try something new, he or she is given the chance.	☐	☐	☐	☐	☐
3. We regularly take time to consider ways to improve how we do things.	☐	☐	☐	☐	☐
4. After trying something new, we take the time to think about how it worked.	☐	☐	☐	☐	☐
5. People in our school actively try to improve how we do things.	☐	☐	☐	☐	☐
6. People in this school generally reflect on how things are going.	☐	☐	☐	☐	☐
7. Our school listens to people who have new ideas about the ways we do things.	☐	☐	☐	☐	☐
8. Our school learns from its mistakes.	☐	☐	☐	☐	☐
9. When we experience a problem in our school, we make a serious effort to find a new way of doing things.	☐	☐	☐	☐	☐
10. Our school can quickly change procedures to meet new conditions as they arise.	☐	☐	☐	☐	☐
11. We share information generally in the team rather than keeping it to ourselves.	☐	☐	☐	☐	☐
12. Everyone's view is listened to even if it is in a minority.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. Our school has the ability to access a wide range of resources for innovations.	☐	☐	☐	☐	☐
2. There is a clear financial plan for us to maintain innovations.	☐	☐	☐	☐	☐
3. There is a clear process by which we prioritize and distribute resources.	☐	☐	☐	☐	☐
4. We know how to allocate resources effectively.	☐	☐	☐	☐	☐
5. We know how to tap into potential resources.	☐	☐	☐	☐	☐
6. Our school is able to allocate resources to new things.	☐	☐	☐	☐	☐
7. Our school is able to find new resources to support new things.	☐	☐	☐	☐	☐

Now we have some more questions about your school leadership and structure. Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. Our school leadership expresses confidence in the capabilities of others.	☐	☐	☐	☐	☐
2. Our school leadership praises/recognizes when someone has done something well.	☐	☐	☐	☐	☐
3. Our school leadership recognizes and appreciates team efforts that help us successfully implement projects.	☐	☐	☐	☐	☐
4. Our school leadership supports us in dealing with challenges of implementation.	☐	☐	☐	☐	☐
5. Our school leadership reacts to critical issues regarding the implementation of our projects by openly and effectively addressing the problem(s).	☐	☐	☐	☐	☐
6. Our school leadership encourages staff feedback in choosing new program goals.	☐	☐	☐	☐	☐
7. Our school leadership considers staff needs when setting new program goals.	☐	☐	☐	☐	☐
8. Our school leadership provides opportunities for staff members to take primary responsibility over tasks.	☐	☐	☐	☐	☐
9. Our school leadership sees that authority is granted to staff in order to get tasks completed.	☐	☐	☐	☐	☐
10. Our school leadership conveys confidence in staff members' ability to accomplish tasks.	☐	☐	☐	☐	☐

The next set of questions asks about your school staff's capacity and school climate. Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. Staffing levels are sufficient right now to accomplish our day-to-day tasks.	☐	☐	☐	☐	☐
2. People who work within our school have sufficient knowledge to carry out our day-to-day tasks.	☐	☐	☐	☐	☐
3. People who work in our school have the necessary experience to carry out their role.	☐	☐	☐	☐	☐
4. People in our school are able to take on new tasks when needed.	☐	☐	☐	☐	☐
5. People in our school have unique skills that contribute to the team.	☐	☐	☐	☐	☐
6. The number of staff are sufficient for the tasks we have.	☐	☐	☐	☐	☐
7. People in our school can adapt to changing work demands.	☐	☐	☐	☐	☐
8. People in our school have good communication skills.	☐	☐	☐	☐	☐
9. Turnover is not a problem in our district/school.	☐	☐	☐	☐	☐

Part II.

The next set of questions ask about your perceptions of TCHAT and how it may compare to other services and programs offered at your school. Remember, there are no right or wrong answers so please answer how you really think or feel.

Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. TCHAT is better than other services we <i>have used before</i> in our school.	☐	☐	☐	☐	☐
2. TCHAT is better than other services we <i>have considered using</i> in our school.	☐	☐	☐	☐	☐
3. TCHAT represents an advance over other services that <i>are already available</i> in our field.	☐	☐	☐	☐	☐
4. TCHAT represents improvement over how we have done things before.	☐	☐	☐	☐	☐

5. TCHATT has advantages for our school compared to other innovations.	☐	☐	☐	☐	☐
6. TCHATT meets our school needs better than what we have been doing.	☐	☐	☐	☐	☐
7. TCHATT represents a better option over what we have been doing.	☐	☐	☐	☐	☐
8. There is evidence that TCHATT works better than other services.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
1. TCHATT fits well with other initiatives in our school.	☐	☐	☐	☐	☐
2. TCHATT helps us meet the needs of the people we serve.	☐	☐	☐	☐	☐
3. TCHATT is timely given the current needs of the people we serve.	☐	☐	☐	☐	☐
4. TCHATT fits well with our school's culture.	☐	☐	☐	☐	☐
5. TCHATT fits well with our school's values.	☐	☐	☐	☐	☐
6. TCHATT fits well with our school's mission.	☐	☐	☐	☐	☐
7. We can see how using TCHATT helps meet our school's needs.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
7. TCHATT is difficult to use.	☐	☐	☐	☐	☐
8. TCHATT is hard to understand.	☐	☐	☐	☐	☐
9. The many different parts involved in TCHATT make it complicated.	☐	☐	☐	☐	☐
10. It is difficult to use TCHATT because it is complicated.	☐	☐	☐	☐	☐
11. It is easy for us to use TCHATT.	☐	☐	☐	☐	☐
12. TCHATT is easy for us to understand.	☐	☐	☐	☐	☐

The next set of questions asks about your perceived benefits of using TCHATT and its priority at your school. Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
9. We can see how using TCHATT will help meet our school's goals.	☐	☐	☐	☐	☐
10. We see how TCHATT will work in the short-term.	☐	☐	☐	☐	☐
11. We can see how TCHATT can benefit the people we serve.	☐	☐	☐	☐	☐
12. In the near future, we expect to see the benefits of TCHATT.	☐	☐	☐	☐	☐
13. We expect to see a good return on our investment in TCHATT.	☐	☐	☐	☐	☐
14. We are able/will be able to see short-term gains from TCHATT.	☐	☐	☐	☐	☐
15. We will be able to see/are seeing tangible benefits from TCHATT.	☐	☐	☐	☐	☐
16. There is evidence that TCHATT works.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
10. Using TCHATT is one of our top priorities.	☐	☐	☐	☐	☐
11. Our school emphasizes that implementing TCHATT is very important.	☐	☐	☐	☐	☐
12. TCHATT is important for our school right now.	☐	☐	☐	☐	☐
13. Decision makers believe TCHATT is important.	☐	☐	☐	☐	☐
14. It is important that we implement TCHATT right now.	☐	☐	☐	☐	☐
15. There is an urgent need for TCHATT at our school.	☐	☐	☐	☐	☐
16. External reasons make TCHATT a priority for our school.	☐	☐	☐	☐	☐
17. Internal reasons make TCHATT a priority for our school.	☐	☐	☐	☐	☐
18. Our school is committed to implementing TCHATT.	☐	☐	☐	☐	☐

Part III.

The next set of questions ask about your school's capacity to implement TCHATT. Remember, there are no right or wrong answers.

Please mark how much you agree or disagree with the following statements:

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
8. We have the ability to implement TCHATT.	☐	☐	☐	☐	☐
9. We have the knowledge to implement TCHATT.	☐	☐	☐	☐	☐
10. We have the skills needed to implement TCHATT.	☐	☐	☐	☐	☐
11. We can describe the steps needed to implement TCHATT.	☐	☐	☐	☐	☐
12. We know what it takes to implement TCHATT.	☐	☐	☐	☐	☐
13. We feel confident in our ability to implement TCHATT.	☐	☐	☐	☐	☐
14. We know the core components of TCHATT.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
8. An influential person in our school strongly promotes TCHATT.	☐	☐	☐	☐	☐
9. At least one person we work with clearly communicates the benefits of using TCHATT.	☐	☐	☐	☐	☐
10. We have a person(s) who shares progress on how implementation is going.	☐	☐	☐	☐	☐
11. We have a person(s) who shares our progress on TCHATT with other schools.	☐	☐	☐	☐	☐
12. There is an influential person in our school who tries to get others to use TCHATT.	☐	☐	☐	☐	☐
13. At least one person in our school has the skills to promote TCHATT to our colleagues.	☐	☐	☐	☐	☐
14. We have an individual within our school who takes a lead role in making sure TCHATT is used.	☐	☐	☐	☐	☐

The next set of questions asks about your school's climate and communication networks within and outside of the school. Please mark how much you agree or disagree with the following statements.

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
15. If needed, our school provides technical assistance or coaching to use TCHATT.	☐	☐	☐	☐	☐

16. Our school provides high quality trainings that are useful for implementing TCHATT.	☐	☐	☐	☐	☐
17. Our school asks staff about their training needs for TCHATT.	☐	☐	☐	☐	☐
18. Supervisors monitor how TCHATT is implemented.	☐	☐	☐	☐	☐
19. Supervisors give feedback to staff about how they are implementing TCHATT.	☐	☐	☐	☐	☐
20. Our school effectively deals with turnover to keep implementation of TCHATT on track.	☐	☐	☐	☐	☐
21. There is a process in place to help new employees understand the expectation of using TCHATT.	☐	☐	☐	☐	☐
22. Our school dedicates sufficient resources to implementing TCHATT.	☐	☐	☐	☐	☐
23. Supervisors expect us to implement TCHATT.	☐	☐	☐	☐	☐
24. Supervisors support implementation of TCHATT.	☐	☐	☐	☐	☐
25. Supervisors have expressed the importance of implementing TCHATT.	☐	☐	☐	☐	☐
26. Staff get the support they need to implement TCHATT.	☐	☐	☐	☐	☐
27. Supervisors acknowledge staff for implementing TCHATT.	☐	☐	☐	☐	☐
28. People who use TCHATT are valued in this school.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
8. We are able to get support for delivering TCHATT by collaborating with the Health-related institution (HRI).	☐	☐	☐	☐	☐
9. We communicate well with the HRI staff to implement TCHATT.	☐	☐	☐	☐	☐
10. We obtain support from the HRI to help us implement TCHATT.	☐	☐	☐	☐	☐
11. We can problem-solve with the HRI staff to help deliver TCHATT.	☐	☐	☐	☐	☐
12. We can get advice from the HRI to deliver TCHATT.	☐	☐	☐	☐	☐
13. We are on the same page as the HRI in regards to TCHATT.	☐	☐	☐	☐	☐
14. Relationships to the HRI important for delivering TCHATT.	☐	☐	☐	☐	☐

	Strongly Disagree	Disagree	Neither Agree nor Disagree	Agree	Strongly Agree
8. We can communicate well with other teams within our school about TCHATT.	☐	☐	☐	☐	☐
9. We can coordinate well with each other when trying to implement TCHATT.	☐	☐	☐	☐	☐

10. We get implementation support for TCHATT from other teams in our school.	☐	☐	☐	☐	☐
11. Individuals within our school help support each other in implementing TCHATT.	☐	☐	☐	☐	☐
12. We regularly meet with other units/teams within our school about implementing TCHATT.	☐	☐	☐	☐	☐
13. We have an implementation team that consists of people from different departments to implement TCHATT.	☐	☐	☐	☐	☐
14. Intra-organizational relationships are important for implementation.	☐	☐	☐	☐	☐

E. OTHER TCHATT QUESTIONS

Now we have some more questions about TCHATT.

	Strongly agree	Agree	Disagree	Strongly disagree
1. I would recommend the TCHATT program to other schools.	☐	☐	☐	☐
2. My school intends to continue using the TCHATT program in the next 6 months.	☐	☐	☐	☐

3. Overall, what do you see as the biggest benefit of having the TCHATT program available in your school? [open-ended]
4. How can the TCHATT program be improved? [open-ended]

F. BACKGROUND

Now we have some questions about your background and school. Remember that all responses are completely confidential. Results will only be reported in the aggregate.

17. What is your gender?

- d. Male
- e. Female
- f. Neither Male, nor Female

18. What is your race/ethnicity?

- g. White, not of Hispanic origin
- h. Black, not of Hispanic origin
- i. Hispanic
- j. Asian or Pacific Islander
- k. Native American, American Indian, or Alaska Native

l. Other: _____

m. Prefer not to answer

19. What is your age?

a. 20-29

b. 30-39

c. 40-49

d. 50-59

e. 60 or older

20. What is your primary role?

g. Principal/Assistant Principal/School Administrator

h. Counselor

i. Social worker

j. School psychologist

k. Nurse

l. Teacher

m. Other (please specify) _____

21. What is your highest level of education?

a. High school

b. Associate's degree

c. Bachelor of Arts/Bachelor of Science

d. Master of Arts/Master of Science

e. Master's degree plus 15 or more additional course hours

f. EdD/PhD

g. Other professional degree [specify]

22. Counting this year as a full year, how many years have you served in this primary role? [open-ended]

23. Are you the person who coordinates TCHATT at your school or school district?

a. Yes

b. No

c. Don't know

Now we have some questions about your school and school district.

CENTRALIZED is defined as key decision-making that occurs at the district level and then is implemented at the school level. There is usually consistency of services, programming, and processes amongst schools because those decisions are made within the district, not by individual schools.

DECENTRALIZED is defined as key decision-making that occurs at the school level. The school district can provide guidance and parameters for those decisions, but local schools have a lot of authority in services and programming. Schools within decentralized school districts may not be similar in implementation of district-wide initiatives, because a lot of discretion is left to individual schools.

24. Would you describe your school district as having a centralized or decentralized decision-making structure?
- a. Centralized
 - b. Decentralized
 - c. Don't know
25. Are there any teachers that have a role in implementing TCHATT (e.g., those who refer students, reach out to families, etc). who you would recommend completing this survey? If so, please can you provide those teachers' emails? [open-ended]

Thank you so much for your time in completing this survey!

If you have any questions, Erica Frost, Program Manager, by email at Erica.L.Frost@uth.tmc.edu or by phone at 713-500-9669.

Appendix H. Codebooks

CPAN Codebook

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN HRI level	hri	HRI	text		HRI Acronym used by COSH/Consortium, example: BCM
CPAN HRI level	hri_fullname	HRI Full Name	text		Trayt: HubOrgName
CPAN HRI level	hri_trayt_id	Trayt HRI ID	text		Trayt: HubOrgID
CPAN HRI level	cpan_region	HRI Region	text		Hub region designated by Consortium, example: TTUHSC
CPAN HRI level	create_date	Creation Date	text		HRI PDD
CPAN HRI level	update_date	Update Date	text		HRI PDD
CPAN HRI level	initial_pcp_goal	Goal number of PCPs from HRI PDD	text		HRI PDD
CPAN County level	fips	County FIPS Code	text		ACS 2018
CPAN County level	county	County Name	text		ACS 2018
CPAN County level	hri_region (cpan_region)	HRI Region	dropdown	BCM_UTHSCH = Baylor College of Medicine/University of Texas Health Science Center at Houston UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas	Hub region designated by Consortium, example: TTUHSC

Project	Variable Name	Field Text	Field Type	Choices	Description
				Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	
CPAN County level	total_population	total_population	text		ACS 2018
CPAN County level	hub_cnty	CPAN Hub County	yesno		Hub county designated by Consortium
CPAN County level	rucc_2013	RUCC 2013 Classification	dropdown	1 = 1 2 = 2 3 = 3 4 = 4 5 = 5 6 = 6 7 = 7 8 = 8 9 = 9	RUCC 2013
CPAN County level	rucc_cat	RUCC 2013 Categorization	dropdown	1 = Metro 2 = Nonmetro	RUCC 2013
CPAN County level	svi_score	SVI Score	text		CDC SVI
CPAN County level	svi_rank	SVI Rank	text		CDC SVI
CPAN County level	svi_cat	SVI Categorization	dropdown	1 = Low 2 = Medium 3 = High	CDC SVI
CPAN County level	children_6_to_17	Children Age 6 to 17 Census	text		ACS 2018
CPAN County level	black_tot_prop	African American (All ages) Proportion of Total Population	text		ACS 2018
CPAN County level	white_tot_prop	Caucasian (All ages) Proportion of Total Population	text		ACS 2018

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN County level	hisp_tot_prop	Hispanic (All ages) Proportion of Total Population	text		ACS 2018
CPAN County level	asian_tot_prop	Asian (All ages) Proportion of Total Population	text		ACS 2018
CPAN Clinic level	clinic_id	Clinic ID	text		Trayt: clinicid
CPAN Clinic level	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	HRI Acronym used by COSH/Consortium, example: BCM
CPAN Clinic level	fips	County FIPS code	text		ACS 2018
CPAN Clinic level	clinic_name	Clinic Name	text		Trayt: ClinicName
CPAN Clinic level	clinic_address	Clinic Address	text		Trayt Clinic directory
CPAN Clinic level	clinic_phone	Clinic Phone Number	text		Trayt Clinic directory
CPAN Clinic level	clinic_type	Clinic Type	radio	1 = Pediatrics 2 = Family	Clinic type used in Trayt, example: Pediatrics

Project	Variable Name	Field Text	Field Type	Choices	Description
				3 = Integrated (Family & Pediatrics) 4 = Other	
CPAN Clinic level	act_status	Clinic Status	radio	1 = Active 2 = Removed	Trayt Clinic directory
CPAN Clinic level	agree_status	Clinic Agreement Status	radio	1 = Signed 2 = Invitation Sent 3 = Enrollment started - Hub 4 = Pending 5 = Pending Agreement 6 = Pending Fax Agreement 7 = Archived 8 = Declined	Trayt Clinic directory
CPAN Clinic level	clinic_consent_date	Consent form Signed Date	text		Trayt Clinic directory
CPAN Clinic level	update	Last updated date	text		Trayt Clinic directory
CPAN Clinic level	pot_fqhc	Potential FQHC	yesno		TX FQHCs
CPAN Clinic level	latitude	Clinic Latitude	text		Google API
CPAN Clinic level	longitude	Clinic Longitude	text		Google API
CPAN Clinic level	interview_sample	Included in interview sample?	yesno		External Team selection method
CPAN Clinic level	survey_sample	Included in survey sample?	yesno		External Team selection method
CPAN Clinic staff level	clinic_staff_id	Clinic Staff ID from Trayt	text		Trayt: pcplID
CPAN Clinic staff level	clinic_id	Affiliated Clinic ID from Trayt	text		Trayt: clinicid
CPAN Clinic staff level	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center	HRI Acronym used by COSH/Consortium, example: BCM

Project	Variable Name	Field Text	Field Type	Choices	Description
				TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	
CPAN Clinic staff level	first_name	First Name	text		Trayt: PCPName
CPAN Clinic staff level	last_name	Last Name	text		Trayt: PCPName
CPAN Clinic staff level	email	Email	text		Trayt Clinic directory
CPAN Clinic staff level	role	Clinic Staff Role	dropdown	1 = Counselor 2 = Learners - Nurse Practitioners 3 = Learners - Physician Assistant 4 = Medical Director 5 = Nurse Practitioner 6 = Office Manager 7 = Physician 8 = Physician Assistant 9 = Referral/Nurse Coordinator 10 = Resident	Trayt: PCPRole
CPAN Clinic staff level	clinic_staff_status	Clinic Staff Account Status	dropdown	1 = Active 2 = Active-No Clinic 3 = Pending Verification 4 = Pending Agreement 5 = Pending Fax Agreement 6 = Removed	Trayt: Current_PCPStatus
CPAN Clinic staff level	contact_created_date	Contact Created Date	text		Trayt Clinic directory

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Clinic staff level	is_duplicate	Does this clinic staff member have a duplicate?	yesno		Flag to external team whether duplicate record
CPAN Implementation Survey	assigned_clinic	This survey asks questions about your opinions and experiences with the CPAN program. Some items will ask about CPAN in the clinic setting. As you complete the survey, it is very important that you think of the assigned clinic below as you answer the questions. [clinic_name]	descriptive		
CPAN Implementation Survey	aware	How true is the following statement for you? I am aware of the Child Psychiatry Access Network (CPAN).	radio	1 = Not at all true 2 = Slightly true 3 = Somewhat true 4 = Very true	
CPAN Implementation Survey	implement	Did you call CPAN during the past 12 months when there was a need?	radio	1 = No, and I have no plans to do so. 2 = No, but I plan to call CPAN in the future. 3 = Yes, I called CPAN on occasion. 4 = Yes, I called CPAN regularly. 5 = Yes, but I do not call CPAN anymore.	
CPAN Implementation Survey	reason_no_use	Please indicate the reason(s) you do not use CPAN services. Please choose all that apply.	checkbox	1 = I did not know how to call in 2 = I have not come across any mental health issues that I could not address on my own 3 = I am already trained in treating mental health conditions 4 = I am able to meet the needs of children with mental health issues using	

Project	Variable Name	Field Text	Field Type	Choices	Description
				existing resources 5 = I am in the process of enrolling in CPAN 6 = Other	
CPAN Implementation Survey	reason_no_use_other	Please specify, "Other":	text		
CPAN Implementation Survey	reason_no_more	Please indicate the reason(s) you do not use CPAN services anymore. Please choose all that apply.	checkbox	1 = My practice has moved. 2 = I was not satisfied with CPAN services. 3 = I no longer need CPAN services. 4 = CPAN requires too much time 5 = Other	
CPAN Implementation Survey	reason_no_more_other	Please specify, "Other":	text		
CPAN Implementation Survey	reason_use	Please indicate the reason(s) why you used CPAN. Please choose all that apply.	checkbox	1 = Assessment 2 = Diagnosis 3 = Behavioral management 4 = Medication management 5 = Referral assistance 6 = General resources 7 = Advice for parents 8 = Second opinion (e.g., question or concern about care provided by a community mental health provider) 9 = School issues 10 = Crisis 11 = Other	
CPAN Implementation Survey	reason_use_other	Please specify, "Other":	text		
CPAN Implementation Survey	training	Did you attend any trainings or receive materials and/or resources to help prepare you to use CPAN?	radio	1 = Yes 2 = No 3 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	training_helpful	How helpful were these trainings, material, and/or resources?	radio	1 = Not at all helpful 2 = Somewhat helpful 3 = Very helpful 4 = Extremely helpful	
CPAN Implementation Survey	consult_result	Please indicate which of the following occurred for your patient(s) as a result of your CPAN consultation. Please choose all that apply.	checkbox	1 = Initiation of new medication 2 = Adjustment of current medication 3 = Recommendation of therapy 4 = Referral to a child and adolescent psychiatrist 5 = Referral to other mental health professional (e.g. LP, LPC, LCSW, LMFT) in the community 6 = Continuation of PCP management 7 = Other needs of patient met	
CPAN Implementation Survey	consult_result_other	Please specify, "Other needs of patient met":	text		
CPAN Implementation Survey	cpan_increase_1	My knowledge in mental health care	radio	1 = Not at all 2 = Slightly 3 = Moderately 4 = Very much	
CPAN Implementation Survey	cpan_increase_2	My skill to provide mental health care	radio	1 = Not at all 2 = Slightly 3 = Moderately 4 = Very much	
CPAN Implementation Survey	cpan_increase_3	My confidence to provide mental health care	radio	1 = Not at all 2 = Slightly 3 = Moderately 4 = Very much	
CPAN Implementation Survey	services_available	What other mental health providers/services are available to you for mental health consults (besides CPAN)? Please describe.	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	aware_act_1	I received brochures or other information from the CPAN Hub.	radio	1 = Yes 2 = No 3 = Don't know	
CPAN Implementation Survey	aware_act_2	I obtained buy-in from other providers at my clinic prior to enrolling in CPAN	radio	1 = Yes 2 = No 3 = Don't know	
CPAN Implementation Survey	train_act_1	I received a welcome packet from the CPAN Hub after enrolling in CPAN	radio	1 = Yes 2 = No 3 = Don't know	
CPAN Implementation Survey	train_act_2	I received training on CPAN services	radio	1 = Yes 2 = No 3 = Don't know	
CPAN Implementation Survey	support_act_1	I receive education (e.g., newsletter, videos, additional trainings, etc.) from the CPAN Hub on identifying and treating mental health conditions	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	support_act_2	I have participated in CME activities offered through CPAN.	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	support_act_3	My clinic discusses CPAN in staff development meetings	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	consult_act_1	I call CPAN to consult with a psychiatrist	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	consult_act_3	I call CPAN to obtain referrals or resources for families	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	consult_act_4	I notify parents of the patient about CPAN prior to calling for a consultation	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	ongoing_act_1	After a CPAN consultation about a patient, I follow recommendations provided by the psychiatrist	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	ongoing_act_2	After a CPAN consultation about a patient, I follow up with the patient's family	radio	1 = Rarely 2 = Sometimes 3 = Often 4 = Don't know	
CPAN Implementation Survey	rel_advantage_1	CPAN is better than other services we have used before in our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_2	CPAN is better than other services we have considered using in our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_3	CPAN represents an advance over other services that are already available in our field.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_4	CPAN represents improvement over how we have done things before.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_5	CPAN has advantages for our clinic compared to other innovations.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
				4 = Agree 5 = Strongly Agree	
CPAN Implementation Survey	rel_advantage_6	CPAN meets our clinic needs better than what we have been doing.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_7	CPAN represents a better option over what we have been doing.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	rel_advantage_8	There is evidence that CPAN works better than other services.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_1	CPAN fits well with other initiatives in our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_2	CPAN helps us meet the needs of the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_3	CPAN is timely given the current needs of the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_4	CPAN fits well with our clinic's culture.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	compatible_5	CPAN fits well with our clinic's values.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_6	CPAN fits well with our clinic's mission.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	compatible_7	We can see how using CPAN helps meet our clinic's needs.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	complexity_1	CPAN is difficult to use.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	complexity_2	CPAN is hard to understand.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	complexity_3	The many different parts involved in CPAN make it complicated.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	complexity_4	It is difficult to use CPAN because it is complicated.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	complexity_5	It is easy for us to use CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
				4 = Agree 5 = Strongly Agree	
CPAN Implementation Survey	complexity_6	CPAN is easy for us to understand.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_1	We can see how using CPAN will help meet our clinic's goals.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_2	We see how CPAN will work in the short-term.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_3	We can see how CPAN can benefit the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_4	In the near future, we expect to see the benefits of CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_5	We expect to see a good return on our investment in CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_6	We are able/will be able to see short-term gains from CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	observability_7	We will be able to see/are seeing tangible benefits from CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	observability_8	There is evidence that CPAN works.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_1	Using CPAN is one of our top priorities.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_2	Our clinic emphasizes that implementing CPAN is very important.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_3	CPAN is important for our clinic right now.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_4	Decision makers at our clinic believe CPAN is important.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_5	It is important that we implement CPAN right now.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	priority_6	There is an urgent need for CPAN at our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_7	External reasons make CPAN a priority for our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_8	Internal reasons make CPAN a priority for our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	priority_9	Our clinic is committed to implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	knowledge_1	We have the ability to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	knowledge_2	We have the knowledge to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020Scaccia, 2015
CPAN Implementation Survey	knowledge_3	We have the skills needed to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	knowledge_4	We can describe the steps needed to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	knowledge_5	We know what it takes to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	knowledge_6	We feel confident in our ability to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	knowledge_7	We know the core components of CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_1	An influential person in our clinic strongly promotes CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_2	At least one person we work with clearly communicates the benefits of using CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_3	We have a person/people who share(s) progress on how implementation is going.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	champion_4	We have a person/people who share(s) our progress on CPAN with other clinics.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_5	There is an influential person in our clinic who tries to get others to use CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_6	At least one person in our clinic has the skills to promote CPAN to our colleagues.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	champion_7	We have an individual within our clinic who takes a lead role in making sure CPAN is used.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_1	If needed, our clinic provides technical assistance or coaching to use CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_2	Our clinic provides high quality trainings that are useful for implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_3	Our clinic asks staff about their training needs for CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	imp_climate_4	Supervisors monitor how CPAN is implemented.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_5	Supervisors give feedback to staff about how they are implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_6	Our clinic effectively deals with turnover to keep implementation of CPAN on track.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_7	Supervisors expect us to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_8	There is a process in place to help new employees understand the expectation of using CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_9	Supervisors support implementation of CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_10	Supervisors have expressed the importance of implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	imp_climate_11	Our clinic dedicates sufficient resources to implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_12	Staff get the support they need to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_13	Supervisors acknowledge staff for implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	imp_climate_14	People who use CPAN are valued in this clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_1	We are able to get support for delivering CPAN by collaborating with the CPAN Hub.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_2	We communicate well with CPAN Hub staff to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_3	We obtain support from the CPAN Hub to help us implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	inter_relation_4	We can problem-solve with the CPAN Hub to help deliver CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_5	We can get advice from the CPAN Hub to deliver CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_6	We are on the same page as the CPAN Hub in regards to CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	inter_relation_7	Relationships with the CPAN Hub are important for delivering CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_1	We can communicate well with other teams within our clinic about CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_2	We can coordinate well with each other when trying to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_3	We get implementation support for CPAN from other teams in our clinic.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	intra_relation_4	Individuals within our clinic help support each other in implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_5	We regularly meet with other units/teams within our clinic about implementing CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_6	We have an implementation team that consists of people from different departments to implement CPAN.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	intra_relation_7	Intra-organizational relationships are important for implementation.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
CPAN Implementation Survey	other_cpan_1	I would recommend the CPAN program to other providers.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
CPAN Implementation Survey	other_cpan_2	I intend to continue using the CPAN program in the next 6 months.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
CPAN Implementation Survey	cpan_benefit	Overall, what do you see as the biggest benefit of the CPAN program?	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	cpan_improved	How can the CPAN program be improved?	notes		
CPAN Implementation Survey	gender	How do you describe your gender? (Remember, all of your responses on this survey are voluntary).	radio	1 = Male 2 = Female 3 = Other	
CPAN Implementation Survey	ethnicity	How do you describe your race/ethnicity?	radio	1 = White, not of Hispanic origin 2 = Black, not of Hispanic origin 3 = Hispanic 4 = American Indian/Alaska Native 5 = Asian or Pacific Islander 6 = Other, please specify: {ethnicity_other}	
CPAN Implementation Survey	ethnicity_other		text		
CPAN Implementation Survey	complete_training_yr	In what year did you complete your professional training?	text		
CPAN Implementation Survey	job_position	What is your position(s) in this clinic/organization? Please select all that apply.	checkbox	1 = Physician Assistant 2 = Nurse Practitioner 3 = Pediatrician 4 = Family Physician 5 = Other physician besides pediatrician and family physician 6 = Medical Director 7 = Resident 8 = Other	
CPAN Implementation Survey	position_other	Please specify, "Other":	text		
CPAN Implementation Survey	years_worked	How many years have you worked at this clinic? (If less than 1, put 0)	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	hours_worked	How many hours do you work at this clinic per week?	text		
CPAN Implementation Survey	year_operation	How many years has your practice been in operation?	text		
CPAN Implementation Survey	embed_fte	How many full time equivalents (FTEs) of the following personnel are in your clinic?	descriptive		
CPAN Implementation Survey	provider_count		text		
CPAN Implementation Survey	nurse_count		text		
CPAN Implementation Survey	medicalassistant_count		text		
CPAN Implementation Survey	community_health_count		text		
CPAN Implementation Survey	support_count		text		
CPAN Implementation Survey	admin_count		text		
CPAN Implementation Survey	patients_scheduled	What is the average number of patients scheduled per hour in your clinic?	text		
CPAN Implementation Survey	patients_seen	What is the average number of patients seen per hour in your clinic?	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	clinic_type	Which of the following best describes your clinic?	checkbox	1 = Private practice, including solo, group practice, or HMO 2 = Federally-qualified health center, including community, migrant, rural, or Indian health center 3 = Hospital-based clinic, including university clinic or residency teaching practice 4 = Public health department-operated clinic 5 = Military clinic 6 = Other	
CPAN Implementation Survey	clinic_type_other	Please specify, "Other":	text		
CPAN Implementation Survey	region_type	What best describes the region in which you practice?	radio	1 = Urban 2 = Suburban 3 = Rural	
CPAN Implementation Survey	zip	What is the primary zip code of your practice?	text		
CPAN Implementation Survey	white_patient	White, not of Hispanic origin	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	black_patient	Black, not of Hispanic origin	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	hispanic_patient	Hispanic	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75%	

Project	Variable Name	Field Text	Field Type	Choices	Description
				5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	amindian_patient	American Indian/Alaskan Native	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	asian_patient	Asian or Pacific Islander	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	other_patient	Other, please specify: {patient_raceeth_other}	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	patient_raceeth_other		text		
CPAN Implementation Survey	private_ins	Private insurance	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	medicaid	Medicaid or your state's Children's Health Insurance Program (CHIP)	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Implementation Survey	uninsured	Uninsured/self-pay	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	medicare	Medicare	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	other_pay_percent	Other, please specify: {payment_other}	radio	1 = 0% 2 = 1-25% 3 = 26-50% 4 = 51-75% 5 = 76-100% 6 = Don't know	
CPAN Implementation Survey	payment_other		text		
CPAN Implementation Survey	ehr_system	Which statement best describes your clinic's electronic health record (EHR) system?	radio	1 = We do not have an EHR 2 = We have purchased/begun installation of an EHR but are not yet using the system 3 = We have an EHR installed and in use for some of our clinic staff and providers 4 = We have an EHR installed and in all (more than 90%) areas of our clinic	
CPAN PPCP Survey	record_id	record number ID	text		TIEHM Survey
CPAN PPCP Survey	clinic_id	Clinic ID from Trayt	text		TIEHM Survey
CPAN PPCP Survey	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
				TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	
CPAN PPCP Survey	survey_date	Date the survey was started	text		TIEHM Survey
CPAN PPCP Survey	gender	I identify my gender as	radio	1 = Male 2 = Female 3 = Other 4 = Prefer not to answer	TIEHM Survey
CPAN PPCP Survey	ethnicity	I identify my ethnicity as	checkbox	1, Black/African 2, Hispanic/Latinx 3, Asian 4, White/Caucasian 5, Native American 6, Pacific Islander 7, Prefer not to answer	TIEHM Survey
CPAN PPCP Survey	zip	What is the zip code of your practice?	text		TIEHM Survey
CPAN PPCP Survey	city	City	text		TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN PPCP Survey	county	County	text		TIEHM Survey
CPAN PPCP Survey	learn_about	How did you learn about CPAN?	radio	1 = Heard about it from a colleague 2 = Heard about it from the regional medical school 3 = Heard about it at a conference or meeting 4 = Saw marketing materials (brochures, magnets, etc.) 5 = Heard about it from a patient or family 6 = Other	TIEHM Survey
CPAN PPCP Survey	learn_about_other	Specify:	text		TIEHM Survey
CPAN PPCP Survey	initial_cpan_reason	What led you to call CPAN today? (check all that apply)	checkbox	1 = Wanted to learn more about CPAN 2 = Wanted consultation 3 = Wanted referral assistance 4 = Wanted additional resources or information 5 = Other	TIEHM Survey
CPAN PPCP Survey	initial_cpan_reason_other	Specify:	text		TIEHM Survey
CPAN PPCP Survey	initial_satisfied_consult	Overall, how satisfied are you with the consultation through CPAN?	radio	1 = Very satisfied 2 = Satisfied 3 = Neither satisfied nor dissatisfied 4 = Dissatisfied 5 = Very dissatisfied	TIEHM Survey
CPAN PPCP Survey	initial_satisfied_time	How satisfied are you with the timeliness of the response from the consultant?	radio	1 = Very satisfied 2 = Satisfied 3 = Neither satisfied nor dissatisfied 4 = Dissatisfied 5 = Very dissatisfied	TIEHM Survey
CPAN PPCP Survey	initial_helpful_info	How helpful was the information or resources that you received for your patient's care?	radio	1 = Very helpful 2 = Helpful 3 = Somewhat helpful 4 = A little helpful 5 = Not at all helpful	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN PPCP Survey	initial_recommend_cpan	How likely are you to recommend CPAN to a colleague?	radio	1 = Extremely likely 2 = Likely 3 = Neutral 4 = Unlikely 5 = Extremely unlikely	TIEHM Survey
CPAN PPCP Survey	initial_feedback	What additional feedback or educational needs would you like to share?	text		TIEHM Survey
CPAN PPCP Survey	initial_contactme	Would you be willing to have a representative contact you further about your experience to ensure that we are meeting your needs?	radio	1 = Yes 2 = No	TIEHM Survey
CPAN PPCP Survey	cpan_reason	What led you to call CPAN today? (check all that apply)	checkbox	1 = Wanted to learn more about CPAN 2 = Wanted consultation 3 = Wanted referral assistance 4 = Wanted additional resources or information 5 = Other	TIEHM Survey
CPAN PPCP Survey	cpan_reason_other	Specify:	text		TIEHM Survey
CPAN PPCP Survey	satisfied_consult	Overall, how satisfied are you with the consultation through CPAN?	radio	1 = Very satisfied 2 = Satisfied 3 = Neither satisfied nor dissatisfied 4 = Dissatisfied 5 = Very dissatisfied	TIEHM Survey
CPAN PPCP Survey	satisfied_time	How satisfied are you with the timeliness of the response from the consultant?	radio	1 = Very satisfied 2 = Satisfied 3 = Neither satisfied nor dissatisfied 4 = Dissatisfied 5 = Very dissatisfied	TIEHM Survey
CPAN PPCP Survey	helpful_info	How helpful was the information or resources that you received for your patient's care?	radio	1 = Very helpful 2 = Helpful 3 = Somewhat helpful	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
				4 = A little helpful 5 = Not at all helpful	
CPAN PPCP Survey	recommend_cpan	How likely are you to recommend CPAN to a colleague?	radio	1 = Extremely likely 2 = Likely 3 = Neutral 4 = Unlikely 5 = Extremely unlikely	TIEHM Survey
CPAN PPCP Survey	feedback	What additional feedback or educational needs would you like to share?	text		TIEHM Survey
CPAN PPCP Survey	contactme	Would you be willing to have a representative contact you further about your experience to ensure that we are meeting your needs?	radio	1 = Yes 2 = No	TIEHM Survey
CPAN PPCP Survey	role	Which best describes your professional role?	radio	1 = Pediatrician 2 = Family Physician 3 = Other Physician 4 = Nurse Practitioner 5 = Physician Assistant 6 = Other Medical Staff	TIEHM Survey
CPAN PPCP Survey	region	What best describes the region in which you practice?	radio	1 = Urban 2 = Suburban 3 = Rural	TIEHM Survey
CPAN PPCP Survey	access_psych	I have adequate access to child psychiatry for my patients.	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey
CPAN PPCP Survey	psych_needs	I am usually able to meet the needs of children with psychiatric problems with existing resources	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN PPCP Survey	psych_consult	I am able to consult with a child psychiatrist in a timely manner	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey
CPAN PPCP Survey	attention	Attention disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	behavioral	Behavioral disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	depressive	Depressive disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	anxiety	Anxiety disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	psychotic	Psychotic disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	traumatuc_stress	Traumatic stress disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
				uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	
CPAN PPCP Survey	eating	Eating disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	additional_info	Is there any other information about your needs that you would like to share?	text		TIEHM Survey
CPAN PPCP Survey	annual_role	Which best describes your professional role?	radio	1 = Pediatrician 2 = Family Physician 3 = Other Physician 4 = Nurse Practitioner 5 = Physician Assistant 6 = Other Medical Staff	TIEHM Survey
CPAN PPCP Survey	annual_region	What best describes the region in which you practice?	radio	1 = Urban 2 = Suburban 3 = Rural	TIEHM Survey
CPAN PPCP Survey	use_cpan_consult	How often did you use the CPAN consultation over the past 12 months?	radio	1 = Not at all 2 = 1 - 2 times 3 = 3 - 5 times 4 = More than 5 times 5, Don't know	TIEHM Survey
CPAN PPCP Survey	use_cpan_training	How often did you use the CPAN training or resource materials over the past 12 months?	radio	1 = Not at all 2 = 1 - 2 times 3 = 3 - 5 times 4 = More than 5 times 5 = Don't know	TIEHM Survey
CPAN PPCP Survey	cpan_useful	I find the CPAN consults to be useful.	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN PPCP Survey	annual_access_psych	I have adequate access to child psychiatry for my patients.	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey
CPAN PPCP Survey	annual_psych_needs	I am usually able to meet the needs of children with psychiatric problems with existing resources	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey
CPAN PPCP Survey	annual_psych_consult	I am able to consult with a child psychiatrist in a timely manner	radio	1 = Strongly disagree 2 = Disagree 3 = Agree 4 = Strongly agree	TIEHM Survey
CPAN PPCP Survey	annual_attention	Attention disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_behavioral	Behavioral disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_depressive	Depressive disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_anxiety	Anxiety disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN PPCP Survey	annual_psychotic	Psychotic disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_traumatic_stress	Traumatic stress disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_eating	Eating disorders	radio	1 = Extremely uncomfortable 2 = Moderately uncomfortable 3 = Neither comfortable nor uncomfortable 4 = Moderately comfortable 5 = Extremely comfortable	TIEHM Survey
CPAN PPCP Survey	annual_additional_info	Is there any other information about your needs that you would like to share?	text		TIEHM Survey
CPAN Encounter level	encounter_id	Record ID	text		
CPAN Encounter level	clinic_staff_id	Clinic Staff ID (PCP ID) from Trayt	text		
CPAN Encounter level	clinic_id	Affiliated Clinic ID from Trayt	text		
CPAN Encounter level	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center	

Project	Variable Name	Field Text	Field Type	Choices	Description
				TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	
CPAN Encounter level	trayt_hri	HRI ID from Trayt	text		Trayt: HubOrgID
CPAN Encounter level	start_date_f1	Form 1 Start Date	text		Trayt: CallFormPart1_createdDate
CPAN Encounter level	created_by_f1	Form1 Created BY (ID)	text		Trayt: CallFormPart1_createdbyUserId
CPAN Encounter level	created_by_name_f1	Form 1 Created By (Name)	text		Trayt: CallFormPart1_createdbyUserNa me
CPAN Encounter level	first_consult	Is this a first time PCP consult?	truefalse		
CPAN Encounter level	clinic_zip	Zipcode of clinic	text		
CPAN Encounter level	transferred_to_hri	HRI Trayt ID that the call was transferred to	text		Trayt: TransfertoHRIOrgID
CPAN Encounter level	call_back_contact	PCP Call back number	text		Trayt: PCPCallbackContact
CPAN Encounter level	about_patient	Was this call about a specific patient?	yesno		Trayt: ConsultisAboutSpecificPatient
CPAN Encounter level	repeat_patient	Have you called about this patient before?	yesno		Trayt: PCPhasCalledInAboutPatientBefor e

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	emergency	Is the consult about an emergency?	yesno		Trayt: ConsultEmergConcern
CPAN Encounter level	emergency_situation	Type of emergency	checkbox	1 = Suicide 2 = Violence 3 = Physical safety 4 = Other	Trayt: EmergConcern_suicide EmergConcern_violence EmergConcern_physicalsafety EmergConcern_other
CPAN Encounter level	emergency_note	Notes about emergency	text		
CPAN Encounter level	patient_id	Unique Patient ID	text		Trayt: Patient Unique ID
CPAN Encounter level	patient_mrn	Patient MRN	text		Trayt: MRN
CPAN Encounter level	patient_gender	Patient Gender	radio	1 = Male 2 = Female	Trayt: Patient_Gender
CPAN Encounter level	patient_dob	Patient DOB	text		Trayt: Patient_DOB
CPAN Encounter level	patient_ethnicity	Patient Ethnicity	checkbox	1 = Hispanic 2 = Non-Hispanic 3 = Declined	Trayt: Patient_Ethnicity_Hispanic Patient_Ethnicity_NonHispanic Patient_Ethnicity_Decline
CPAN Encounter level	patient_race	Patient Race	checkbox	1 = American Indian and Alaska Native 2 = Asian 3 = White 4 = Black or African American 5 = Native Hawaiian and Other Pacific Islander 6 = Declined	Trayt: Patient_Race_Am Ind or AK Native Patient_Race_White Patient_Race_Black Patient_Race_Asian Patient_Race_Islander Patient_Race_Decline
CPAN Encounter level	patient_multirace	Patient Multiracial?	yesno		Trayt: Patient_Race_Multiracial
CPAN Encounter level	call_purpose	Call Purpose	checkbox	1 = Assessment 2 = Diagnosis 3 = Behavioral Management 4 = Medication Management 5 = Referral Assistance 6 = General Resources	Trayt: part1CallPurpose_Assessment part1CallPurpose_Diagnosis part1CallPurpose_Behavior Mgmt part1CallPurpose_Medication Management part1CallPurpose_Referral

Project	Variable Name	Field Text	Field Type	Choices	Description
					Assistancepart1CallPurpose_General Resources
CPAN Encounter level	call_purpose_notes	Call Purpose Notes	text		Trayt: Call purposes notes
CPAN Encounter level	consult_recommendation	Recommended consultation follow-up	text		Trayt: ConsultRecResult
CPAN Encounter level	consult_assignedto	Consult Assigned to	text		Trayt: ConsultAssignment
CPAN Encounter level	general_notes	General Notes	text		Trayt: generalNotes (unstructured)
CPAN Encounter level	end_date_f1	Form 1 End Date	text		Trayt: Call Form Part 1 Complete Date
CPAN Encounter level	start_date_f2	Form 2 Start Date	text		Trayt: Call Form Part 2 Create Date (1st attempt)
CPAN Encounter level	created_by_name_f2	Form 2 Created By (Name)	text		Trayt: CallFormPart2_createdByUserName
CPAN Encounter level	psych_consult	Was this assigned to a Psychiatrist?	yesno		
CPAN Encounter level	scheduled_callback	Was the callback scheduled?	yesno		Trayt: Was call back scheduled?
CPAN Encounter level	callback_30min	Is this consult subject to 30 mintes call-back window?	yesno		Trayt: Is consult subject to 30 min call-back window?
CPAN Encounter level	callback_response_time	Callback Response time (minutes)	text		Trayt: Response Time Calculation
CPAN Encounter level	total_time	Total Lapsed Time (minutes)	text		
CPAN Encounter level	callback_times	Number of times contacted to resolve consult	text		Trayt: Number of Times Contacted to resolve consult
CPAN Encounter level	callback_attempts	Number of failed call attempts to reach PCP on Initial Callback	text		Trayt: Call attempts to reach PCP on Initial call-back

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	first_resolve_date	Consult First Resolve Date	text		
CPAN Encounter level	resolve_date	Consult Resolved Date	text		Trayt: Consult Resolved Date
CPAN Encounter level	chief_complaint_1	Chief Compliant 1	text		Trayt: BehavioralConsultations.symptoms 1
CPAN Encounter level	chief_complaint_2	Chief Compliant 2	text		Trayt: BehavioralConsultations.symptoms 2
CPAN Encounter level	chief_complaint_3	Chief Compliant 3	text		Trayt: BehavioralConsultations.symptoms 3
CPAN Encounter level	chief_complaint_4	Chief Compliant 4	text		Trayt: BehavioralConsultations.symptoms 4
CPAN Encounter level	chief_complaint_5	Chief Compliant 5	text		Trayt: BehavioralConsultations.symptoms 5
CPAN Encounter level	chief_complaint_6	Chief Compliant 6	text		Trayt: BehavioralConsultations.symptoms 6
CPAN Encounter level	chief_complaint_7	Chief Compliant 7	text		Trayt: BehavioralConsultations.symptoms 7
CPAN Encounter level	chief_complaint_8	Chief Compliant 8	text		Trayt: BehavioralConsultations.symptoms 8
CPAN Encounter level	chief_complaint_9	Chief Compliant 9	text		Trayt: BehavioralConsultations.symptoms 9
CPAN Encounter level	chief_complaint_10	Chief Compliant 10	text		Trayt: BehavioralConsultations.symptoms 10

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	diagnosis_1	Diagnosis 1	text		Trayt: BehavioralConsultations.diagnoses 1
CPAN Encounter level	diagnosis_2	Diagnosis 2	text		Trayt: BehavioralConsultations.diagnoses 2
CPAN Encounter level	diagnosis_3	Diagnosis 3	text		Trayt: BehavioralConsultations.diagnoses 3
CPAN Encounter level	diagnosis_4	Diagnosis 4	text		Trayt: BehavioralConsultations.diagnoses 4
CPAN Encounter level	diagnosis_5	Diagnosis 5	text		Trayt: BehavioralConsultations.diagnoses 5
CPAN Encounter level	diagnosis_6	Diagnosis 6	text		Trayt: BehavioralConsultations.diagnoses 6
CPAN Encounter level	diagnosis_7	Diagnosis 7	text		Trayt: BehavioralConsultations.diagnoses 7
CPAN Encounter level	diagnosis_8	Diagnosis 8	text		Trayt: BehavioralConsultations.diagnoses 8
CPAN Encounter level	diagnosis_9	Diagnosis 9	text		Trayt: BehavioralConsultations.diagnoses 9
CPAN Encounter level	diagnosis_10	Diagnosis 10	text		Trayt: BehavioralConsultations.diagnoses 10
CPAN Encounter level	therapist_1	Therapist 1	text		Trayt: BehavioralConsultations.therapists 1

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	therapist_2	Therapist 2	text		Trayt: BehavioralConsultations.therapists 2
CPAN Encounter level	therapist_3	Therapist 3	text		Trayt: BehavioralConsultations.therapists 3
CPAN Encounter level	therapist_4	Therapist 4	text		Trayt: BehavioralConsultations.therapists 4
CPAN Encounter level	therapist_5	Therapist 5	text		Trayt: BehavioralConsultations.therapists 5
CPAN Encounter level	therapist_6	Therapist 6	text		Trayt: BehavioralConsultations.therapists 6
CPAN Encounter level	therapist_7	Therapist 7	text		Trayt: BehavioralConsultations.therapists 7
CPAN Encounter level	therapist_8	Therapist 8	text		
CPAN Encounter level	therapist_9	Therapist 9	text		
CPAN Encounter level	therapist_10	Therapist 10	text		
CPAN Encounter level	medication_1	Medication_1	text		Trayt: BehavioralConsultations.medications 1
CPAN Encounter level	medication_2	Medication_2	text		Trayt: BehavioralConsultations.medications 2
CPAN Encounter level	medication_3	Medication_3	text		Trayt: BehavioralConsultations.medications 3

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	medication_4	Medication_4	text		Trayt: BehavioralConsultations.medications 4
CPAN Encounter level	medication_5	Medication_5	text		Trayt: BehavioralConsultations.medications 5
CPAN Encounter level	medication_6	Medication_6	text		Trayt: BehavioralConsultations.medications 6
CPAN Encounter level	medication_7	Medication_7	text		Trayt: BehavioralConsultations.medications 7
CPAN Encounter level	medication_8	Medication_8	text		Trayt: BehavioralConsultations.medications 8
CPAN Encounter level	medication_9	Medication_9	text		Trayt: BehavioralConsultations.medications 9
CPAN Encounter level	medication_10	Medication_10	text		Trayt: BehavioralConsultations.medications 10
CPAN Encounter level	behavior_notes	Behavior Consultation Notes	text		Trayt: BehavioralConsultations.notes
CPAN Encounter level	diagnosis_change	Recommended Changes in Diagnosis?	yesno		Trayt: DiagnosisChangeRec
CPAN Encounter level	diag_recommend_1	Diagnosis Recommendations 1	text		Trayt:
CPAN Encounter level	diag_recommend_2	Diagnosis Recommendations 2	text		Trayt:
CPAN Encounter level	diag_recommend_3	Diagnosis Recommendations 3	text		Trayt:
CPAN Encounter level	diag_recommend_4	Diagnosis Recommendations 4	text		Trayt:
CPAN Encounter level	diag_recommend_5	Diagnosis Recommendations 5	text		Trayt:

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	diag_recommend_6	Diagnosis Recommendations 6	text		Trayt:
CPAN Encounter level	diag_recommend_7	Diagnosis Recommendations 7	text		Trayt:
CPAN Encounter level	diag_recommend_8	Diagnosis Recommendations 8	text		Trayt:
CPAN Encounter level	diag_recommend_9	Diagnosis Recommendations 9	text		Trayt:
CPAN Encounter level	diag_recommend_10	Diagnosis Recommendations 10	text		Trayt:
CPAN Encounter level	diag_recommend_notes	Diagnosis Recommendations Notes	text		Trayt: Diagnosis Recommendations Notes
CPAN Encounter level	medication_change	Recommended Changes in Medication?	yesno		Trayt: MedicationChangeRec
CPAN Encounter level	med_recommend_stop	Number of Medication Changes: Stop	text		Trayt: MedicationChange_Stop
CPAN Encounter level	med_recommend_taper	Number of Medication Changes: Taper	text		Trayt: MedicationChange_Taper
CPAN Encounter level	med_recommend_add	Number of Medication Changes: Add	text		Trayt: MedicationChangeAdd
CPAN Encounter level	med_recommend_notes	Medication Recommendations Notes	text		Trayt: Medication Recommendations Notes
CPAN Encounter level	diagnostic_change	Recommended Changes in Diagnostics?	yesno		Trayt: DiagnosticRec
CPAN Encounter level	diagnostic_notes	Diagnostic Recommendation Notes	text		Trayt: Diagnosis Recommendations Notes
CPAN Encounter level	referral	Does PCP require a referral?	yesno		Trayt: ReferralOutcomeNeeded
CPAN Encounter level	cap_cpan	CAP within CPAN Hub Team	truefalse		Trayt: LocalCAP_CPAN

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	cap_tchatt	CAP within TCHAT Team	truefalse		Trayt: LocalCAP_TCHAT
CPAN Encounter level	cap_community	CAP within surrounding community	truefalse		Trayt: LocalCAP_Community
CPAN Encounter level	referral_type	Referral for:	checkbox	1 = Individual Therapy 2 = Family Therapy 3 = Parent Management Training 4 = Parent Mental Health Services 5 = Inpatient Psychiatric Care 6 = Intensive Outpatient Therapy 7 = Residential 8 = Group Therapy 9 = Other	Trayt: localBhpReferral_IndividuallocalBhpReferral_FamilylocalBhpReferral_Parent MgmtlocalBhpReferral_Parent MHlocalBhpReferral_InpatientlocalBhpReferral_ResidentiallocalBhpReferral_GrouplocalBhpReferral_Other
CPAN Encounter level	referral_lmha	Are any referrals handled by the Local Mental Health Authority (LMHA)?	yesno		Trayt: Referral_LMHA
CPAN Encounter level	general_resources	General Resources Referral	checkbox	1 = Educational Resource 2 = Local Support Groups 3 = Food Banks 4 = Domestic Violence Resources 5 = Wrap Around Services 6 = Other	Trayt: General Resources_Educational General Resources_Local Support General Resources_Food General Resources_Domestic Violence General Resources_Wraparound General Resources_Other
CPAN Encounter level	special_referral_notes	Special Referral Outcome Notes	text		Trayt: Special_Referral_Outcome_Notes
CPAN Encounter level	additional_consult	Additional Consultation	checkbox	1 = Assessment 2 = Diagnosis 3 = Behavioral Management 4 = Medication Management 5 = Referral Assistance 6 = General Resources	Trayt: Additional_Assessment Consult
CPAN Encounter level	add_consult_assigned_to	Additional Consultation Assigned to	checkbox	1 = Assign to Therapist 2 = Assign to Psychiatrist 3 = Assign to Resource Coordinator	Trayt: Involved_Therapist

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	severity	How Severe?	radio	1 = Mild 2 = Moderate 3 = Severe 4 = Very Severe	Trayt: Staff Eval_How Severe
CPAN Encounter level	complexity	How Complex?	radio	1 = Simple 2 = Somewhat Complex 3 = Complex 4 = Very Complex	Trayt: Staff Eval_How Complex
CPAN Encounter level	knowledge	General Knowledge	radio	1 = Poor 2 = Fair 3 = Good 4 = Excellent	Trayt: Staff Eval_How Knowledgeable
CPAN Encounter level	comfort	How Comfortable?	radio	1 = Uncomfortable 2 = Somewhat Comfortable 3 = Comfortable 4 = Very Comfortable	Trayt: Staff Eval_How Comfortable

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	encounter_id	Record ID	text		
CPAN Encounter level	clinic_staff_id	Clinic Staff ID (PCP ID) from Trayt	text		
CPAN Encounter level	clinic_id	Affiliated Clinic ID from Trayt	text		
CPAN Encounter level	hri	HRI	dropdown	BCM, Baylor College of Medicine UT_Dell, Dell Medical School at the University of Texas at Austin TAMUHSC, Texas A&M University / Baylor Scott and White UNTHSC, University of North Texas Health Science Center at Fort Worth TTUHSC, Texas Tech University Health Science Center TTUHSC_EP, Texas Tech University Health Science Center at El Paso UTHSC_SA, University of Texas Health Science Center at San Antonio UTHSCT, University of Texas Health Science Center at Tyler UTHSCH, University of Texas Health Science Center at Houston UTMB, University of Texas Medical Branch at Galveston UTSW, University of Texas Southwestern Medical Center UTRGV, University of Texas Rio Grande Valley	
CPAN Encounter level	trayt_hri	HRI ID from Trayt	text		
CPAN Encounter level	start_date_f1	Form 1 Start Date	text		
CPAN Encounter level	created_by_f1	Form1 Created BY (ID)	text		
CPAN Encounter level	created_by_name_f1	Form 1 Created By (Name)	text		
CPAN Encounter level	first_consult	Is this a first time PCP consult?	truefalse		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	clinic_zip	Zipcode of clinic	text		
CPAN Encounter level	transferred_to_hri	HRI Trayt ID that the call was transferred to	text		
CPAN Encounter level	call_back_contact	PCP Call back number	text		
CPAN Encounter level	about_patient	Was this call about a specific patient?	yesno		
CPAN Encounter level	repeat_patient	Have you called about this patient before?	radio	1, Yes 0, No 2, Unsure	
CPAN Encounter level	emergency	Is the consult about an emergency?	radio	1, Yes 0, No 2, Unsure	
CPAN Encounter level	emergency_situation	Type of emergency	checkbox	1, Suicide 2, Violence 3, Physical safety 4, Other	
CPAN Encounter level	emergency_note	Notes about emergency	notes		
CPAN Encounter level	patient_id	Unique Patient ID	text		
CPAN Encounter level	patient_mrn	Patient MRN	text		
CPAN Encounter level	patient_gender	Patient Gender	radio	1, Male 2, Female 3, Other	
CPAN Encounter level	patient_dob	Patient DOB	text		
CPAN Encounter level	patient_ethnicity	Patient Ethnicity	radio	1, Hispanic 2, Non-Hispanic 3, Declined	
CPAN Encounter level	patient_race	Patient Race	checkbox	1, American Indian and Alaska Native 2, Asian 3, White 4, Black or African American 5, Native Hawaiian and Other Pacific Islander 6, Declined	
CPAN Encounter level	patient_multirace	Patient Multiracial?	truefalse		
CPAN Encounter level	call_purpose	Call Purpose	checkbox	1, Assessment 2, Diagnosis 3, Behavioral Management 4,	

Project	Variable Name	Field Text	Field Type	Choices	Description
				Medication Management 5, Referral Assistance 6, General Resources	
CPAN Encounter level	call_purpose_notes	Call Purpose Notes	notes		
CPAN Encounter level	consult_recommendation	Recommended consultation follow-up	notes		
CPAN Encounter level	consult_assignedto	Consult Assigned to	checkbox	1, Therapist 2, Psychiatrist 3, Resource Coordinator 4, HRI Leadership	
CPAN Encounter level	general_notes	General Notes	notes		
CPAN Encounter level	end_date_f1	Form 1 End Date	text		
CPAN Encounter level	start_date_f2	Form 2 Start Date	text		
CPAN Encounter level	created_by_name_f2	Form 2 Created By (Name)	text		
CPAN Encounter level	psych_consult	Was this assigned to a Psychiatrist?	yesno		
CPAN Encounter level	scheduled_callback	Was the callback scheduled?	yesno		
CPAN Encounter level	callback_30min	Is this consult subject to 30 mintes call-back window?	yesno		
CPAN Encounter level	callback_response_time	Callback Response time (minutes)	text		
CPAN Encounter level	total_time	Total Lapsed Time (minutes)	text		
CPAN Encounter level	callback_times	Number of times contacted to resolve consult	text		
CPAN Encounter level	callback_attempts	Number of failed call attempts to reach PCP on Initial Callback	text		
CPAN Encounter level	first_resolve_date	Consult First Resolve Date	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	resolve_date	Consult Resolved Date	text		
CPAN Encounter level	chief_complaint_1	Chief Complaint 1	notes		
CPAN Encounter level	chief_complaint_2	Chief Complaint 2	notes		
CPAN Encounter level	chief_complaint_3	Chief Complaint 3	notes		
CPAN Encounter level	chief_complaint_4	Chief Complaint 4	notes		
CPAN Encounter level	chief_complaint_5	Chief Complaint 5	notes		
CPAN Encounter level	chief_complaint_6	Chief Complaint 6	notes		
CPAN Encounter level	chief_complaint_7	Chief Complaint 7	notes		
CPAN Encounter level	chief_complaint_8	Chief Complaint 8	notes		
CPAN Encounter level	chief_complaint_9	Chief Complaint 9	notes		
CPAN Encounter level	chief_complaint_10	Chief Complaint 10	notes		
CPAN Encounter level	diagnosis_1	Diagnosis 1	notes		
CPAN Encounter level	diagnosis_2	Diagnosis 2	notes		
CPAN Encounter level	diagnosis_3	Diagnosis 3	notes		
CPAN Encounter level	diagnosis_4	Diagnosis 4	notes		
CPAN Encounter level	diagnosis_5	Diagnosis 5	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	diagnosis_6	Diagnosis 6	notes		
CPAN Encounter level	diagnosis_7	Diagnosis 7	notes		
CPAN Encounter level	diagnosis_8	Diagnosis 8	notes		
CPAN Encounter level	diagnosis_9	Diagnosis 9	notes		
CPAN Encounter level	diagnosis_10	Diagnosis 10	notes		
CPAN Encounter level	therapist_1	Therapist 1	notes		
CPAN Encounter level	therapist_2	Therapist 2	notes		
CPAN Encounter level	therapist_3	Therapist 3	notes		
CPAN Encounter level	therapist_4	Therapist 4	notes		
CPAN Encounter level	therapist_5	Therapist 5	notes		
CPAN Encounter level	therapist_6	Therapist 6	notes		
CPAN Encounter level	therapist_7	Therapist 7	notes		
CPAN Encounter level	therapist_8	Therapist 8	notes		
CPAN Encounter level	therapist_9	Therapist 9	notes		
CPAN Encounter level	therapist_10	Therapist 10	notes		
CPAN Encounter level	medication_1	Medication_1	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	medication_2	Medication_2	notes		
CPAN Encounter level	medication_3	Medication_3	notes		
CPAN Encounter level	medication_4	Medication_4	notes		
CPAN Encounter level	medication_5	Medication_5	notes		
CPAN Encounter level	medication_6	Medication_6	notes		
CPAN Encounter level	medication_7	Medication_7	notes		
CPAN Encounter level	medication_8	Medication_8	notes		
CPAN Encounter level	medication_9	Medication_9	notes		
CPAN Encounter level	medication_10	Medication_10	notes		
CPAN Encounter level	behavior_notes	Behavior Consultation Notes	notes		
CPAN Encounter level	diagnosis_change	Recommended Changes in Diagnosis?	yesno		
CPAN Encounter level	diag_recommend_1	Diagnosis Recommendations 1	notes		
CPAN Encounter level	diag_recommend_2	Diagnosis Recommendations 2	notes		
CPAN Encounter level	diag_recommend_3	Diagnosis Recommendations 3	notes		
CPAN Encounter level	diag_recommend_4	Diagnosis Recommendations 4	notes		
CPAN Encounter level	diag_recommend_5	Diagnosis Recommendations 5	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
CPAN Encounter level	diag_recommend_6	Diagnosis Recommendations 6	notes		
CPAN Encounter level	diag_recommend_7	Diagnosis Recommendations 7	notes		
CPAN Encounter level	diag_recommend_8	Diagnosis Recommendations 8	notes		
CPAN Encounter level	diag_recommend_9	Diagnosis Recommendations 9	notes		
CPAN Encounter level	diag_recommend_10	Diagnosis Recommendations 10	notes		
CPAN Encounter level	diag_recommend_notes	Diagnosis Recommendations Notes	notes		
CPAN Encounter level	medication_change	Recommended Changes in Medication?	yesno		
CPAN Encounter level	med_recommend_stop	Number of Medication Changes: Stop	text		
CPAN Encounter level	med_recommend_taper	Number of Medication Changes: Taper	text		
CPAN Encounter level	med_recommend_add	Number of Medication Changes: Add	text		
CPAN Encounter level	med_recommend_notes	Medication Recommendations Notes	notes		
CPAN Encounter level	diagnostic_change	Recommended Changes in Diagnostics?	yesno		
CPAN Encounter level	diagnostic_notes	Diagnostic Recommendation Notes	notes		
CPAN Encounter level	referral	Does PCP require a referral?	yesno		
CPAN Encounter level	referral_type	Referral for:	checkbox	1, CAP within CPAN Hub Team 2, CAP within TCATT Hub Team 3, CAP within Surrounding Community 4, Individual Therapy 5, Family Therapy 6, Parent Management Training 7, Parent Mental Health	

Project	Variable Name	Field Text	Field Type	Choices	Description
				Services 8, Inpatient Psychiatric Care 9, Intensive Outpatient Therapy 10, Residential 11, Group Therapy 12, Other	
CPAN Encounter level	referral_lmha	Are any referrals handled by the Local Mental Health Authority (LMHA)?	yesno		
CPAN Encounter level	general_resources	General Resources Referral	checkbox	1, Educational Resource 2, Local Support Groups 3, Food Banks 4, Domestic Violence Resources 5, Wrap Around Services 6, Other	
CPAN Encounter level	special_referral_notes	Special Referral Outcome Notes	notes		
CPAN Encounter level	additional_consult	Additional Consultation	checkbox	1, Assessment 2, Diagnosis 3, Behavioral Management 4, Medication Management 5, Referral Assistance 6, General Resources	
CPAN Encounter level	add_consult_assigned_to	Additional Consultation Assigned to	checkbox	1, Assign to Therapist 2, Assign to Psychiatrist 3, Assign to Resource Coordinator	
CPAN Encounter level	severity	How Severe?	radio	1, Mild 2, Moderate 3, Severe 4, Very Severe	
CPAN Encounter level	complexity	How Complex?	radio	1, Simple 2, Somewhat Complex 3, Complex 4, Very Complex	
CPAN Encounter level	knowledge	General Knowledge	radio	1, Poor 2, Fair 3, Good 4, Excellent	
CPAN Encounter level	comfort	How Comfortable?	radio	1, Uncomfortable 2, Somewhat Comfortable 3, Comfortable 4, Very Comfortable	

TCHATT Codebook

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT HRI-level	hri	HRI Name	text		Trayt: HRI Name
TCHATT HRI-level	hri_fullname	HRI Full Name	text		Trayt: HRI Name
TCHATT HRI-level	hri_trayt_id	Trayt HRI ID	text		Trayt: HRI Org ID - Unique Identifier (HRI)
TCHATT HRI-level	hri_trayt_acro	Trayt HRI Acronym	text		
TCHATT HRI-level	hri_ie_id	Internal Evaluation ID	text		HRI ID used by internal team, example: 01BAYCOM00
TCHATT HRI-level	create_date	Creation Date	date_mdy		
TCHATT HRI-level	update_date	Update Date	date_mdy		
TCHATT HRI-level	initial_school_goal	Goal number of schools from HRI PDD	number		
TCHATT HRI-level	initial_district_goal	Initial District PDD Goal	number		
TCHATT District-level	dist_num	District Number	text		TEA Directory
TCHATT District-level	esc_region	Education Service Center (ESC) region	dropdown	01 = 01 02 = 02 03 = 03 04 = 04 05 = 05 06 = 06 07 = 07 08 = 08 09 = 09 10 = 10 11 = 11 12 = 12 13 = 13	TEA Directory

Project	Variable Name	Field Text	Field Type	Choices	Description
				14 = 14 15 = 15 16 = 16 17 = 17 18 = 18 19 = 19 20 = 20	
TCHATT District-level	dist_name	District Name	text		Trayt: School ISD Name - Independent School District (ISD) Name
TCHATT District-level	dist_county	District County	text		TEA Directory
TCHATT District-level	tea_type	TEA Type	dropdown	A = Major Urban B = Major Suburban C = Other Central City D = Other Central City Suburban E = Independent Town F = Non-metropolitan Fast Growing G = Non-metropolitan Stable H = Rural I = Charters	TEA Directory
TCHATT District-level	enrollment	District Enrollment	text		TEA Directory
TCHATT District-level	campus	School Campuses	text		TEA Directory
TCHATT District-level	cns_date	Census Date	dropdown	1 = 2018-2019 2 = 2019-2020	TEA Directory
TCHATT District-level	african_am	Proportion of African American Enrollment	text		TEA Directory
TCHATT District-level	hispanic	Proportion of Hispanic Enrollment	text		TEA Directory
TCHATT District-level	white	Proportion of Caucasian Enrollment	text		TEA Directory
TCHATT District-level	am_indian	Proportion of American Indian Enrollment	text		TEA Directory

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT District-level	asian	Proportion of Asian Enrollment	text		TEA Directory
TCHATT District-level	pacific_is	Proportion of Pacific Islander Enrollment	text		TEA Directory
TCHATT District-level	two_or_more	Proportion of students classified as two or more races	text		TEA Directory
TCHATT District-level	school_lunch	Eligibility for Free and Reduced Lunch Program (NSLP)	text		TEA Directory
TCHATT District-level	enr_cat	School Size Categorization	dropdown	1 = Small 2 = Medium 3 = High	TEA Directory
TCHATT District-level	schlunch_cat	Free and Reduced Lunch Eligibility Categorization	dropdown	1 = Low 2 = Medium 3 = High	TEA Directory
TCHATT District-level	afram_cat	African American Enrollment Categorization	dropdown	1 = Low 2 = Medium 3 = High	TEA Directory
TCHATT District-level	hisp_cat	Hispanic Enrollment Categorization	dropdown	2 = Low 2 = Medium 3 = High	TEA Directory
TCHATT District-level	asian_cat	Asian Enrollment Categorization	dropdown	3 = Low 2 = Medium 3 = High	TEA Directory
TCHATT District-level	hri	HRI	dropdown	BCM_UTHSCH = Baylor College of Medicine/University of Texas Health Science Center at Houston BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC, Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University	Trayt: HRI Name

Project	Variable Name	Field Text	Field Type	Choices	Description
				Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley NA = Not applicable	
TCHATT District-level	mou_campus	Campuses Reached	number		
TCHATT District-level	mou_in_place	MOU (in Place)	yesno	1 = Yes 0 = No	
TCHATT District-level	mou_in_progress	MOU (in Progress)	yesno	1 = Yes 0 = No	
TCHATT District-level	interview_sample	Interview sample	yesno	1 = Yes 0 = No	
TCHATT District-level	survey_sample	Survey sample	yesno	1 = Yes 0 = No	
TCHATT School-level	campus_num	TEA Campus Number	integer		TEA Directory
TCHATT School-level	dist_num	TEA District Number	integer		TEA Directory
TCHATT School-level	hri	HRI	dropdown	BCM_UTHSCT = Baylor COM & UTHSCH BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White	Trayt: HRI Name

Project	Variable Name	Field Text	Field Type	Choices	Description
				UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	
TCHATT School-level	campus_name	Campus Name	text		TEA Directory
TCHATT School-level	campus_address	Campus Address	text		TEA Directory
TCHATT School-level	campus_city	Campus City	text		TEA Directory
TCHATT School-level	campus_zip	Campus Zip	zipcode		Trayt: School ZIP - Zip Code of record for school
TCHATT School-level	campus_census	Student Census	number		TEA Directory
TCHATT School-level	campus_census_date	Census Date	dropdown	1 = 2018-2019 2 = 2019-2020 3 = TED 2021	TEA Directory
TCHATT School-level	min_grade	School Minimum Grade Year	text		TEA Directory
TCHATT School-level	max_grade	School Maximum Grade Year	text		TEA Directory

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT School-level	latitude	Latitude of Campus	text		
TCHATT School-level	longitude	Longitude of Campus	text		
TCHATT School-level	campus_survey_sample	Included in the campus sample to receive the Implementation survey:	yesno	1 = Yes 0 = No	
TCHATT Family Surveys	record_id	Record ID	text		
TCHATT Family Surveys	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	Trayt: HRI Name
TCHATT Family Surveys	campus_num	TEA Campus Number	text		TEA Directory
TCHATT Family Surveys	survey_date	Date the survey was started.	date_mdy		TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Family Surveys	language	Language that the survey was taken.	text		TIEHM Survey
TCHATT Family Surveys	zip	Zip code	text		TIEHM Survey
TCHATT Family Surveys	city	City	text		TIEHM Survey
TCHATT Family Surveys	county	County	text		TIEHM Survey
TCHATT Family Surveys	gender	What is your/your child's gender?	radio	1 = Male 2 = Female 3 = Other 4 = Prefer not to answer	TIEHM Survey
TCHATT Family Surveys	race	What is your/your child's race?	checkbox	1 = American Indian or Alaskan Native 2 = Asian 3 = White 4 = Black 5 = Native Hawaiian or Pacific Islander 6 = Prefer not to answer	TIEHM Survey
TCHATT Family Surveys	ethnicity	What is your/your child's ethnicity?	radio	1 = Hispanic or Latino/a 2 = Not Hispanic or Latino/a 3 = Prefer not to answer	TIEHM Survey
TCHATT Family Surveys	grade_level	What is your/your child's grade level?	radio	1 = Pre-kindergarten - Kindergarten 2 = 1st - 5th grade 3 = 6th - 8th grade 4 = 9th - 12th grade 5 = Prefer not to answer	TIEHM Survey
TCHATT Family Surveys	stu_satisfaction	Overall, I am satisfied with TCHATT services.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	stu_fit	The TCHATT services I received were right for me.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Family Surveys	stu_respect	TCHAT staff treated me with respect.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHAT Family Surveys	stu_convenience	TCHAT services were available at convenient times.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHAT Family Surveys	stu_understand	TCHAT staff spoke with me in a way I understood.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHAT Family Surveys	stu_suggest	I would suggest TCHAT services to other students.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHAT Family Surveys	stu_help	I feel that TCHAT services have helped me.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHAT Family Surveys	stu_result	As a result of TCHAT services, I am:	radio	1 = Doing a lot better 2 = Doing a little better 3 = Doing about the same 4 = Doing a little worse 5 = Doing a lot worse	TIEHM Survey
TCHAT Family Surveys	stu_improve	How can we improve TCHAT services?	text		TIEHM Survey
TCHAT Family Surveys	parent_satisfaction	I am satisfied with my child's TCHAT services.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Family Surveys	parent_respect	TCHATT staff treated me with respect.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_convenient	TCHATT services were offered at convenient times.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_participate	I participated in my child's treatment.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_understand	TCHATT staff spoke with me in a way I understood.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_suggest	I would suggest TCHATT services to other families.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_help	I feel that TCHATT services have helped my child and family.	radio	1 = Strongly Agree 2 = Agree 3 = Unsure 4 = Disagree 5 = Strongly Disagree	TIEHM Survey
TCHATT Family Surveys	parent_result	As a result of TCHATT services, my child or family is:	radio	1 = Doing a lot better 2 = Doing a little better 3 = Doing about the same 4 = Doing a little worse 5 = Doing a lot worse	TIEHM Survey
TCHATT Family Surveys	parent_improve	How can we improve TCHATT services?	text		TIEHM Survey

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	implementer_id	Implementer ID	text		
TCHATT Implementater-level / TCHATT June 14th Session	airtable_timestamp	Airtable Registration Date:	text		
TCHATT Implementater-level / TCHATT June 14th Session	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	Trayt: HRI Name
TCHATT Implementater-level / TCHATT June 14th Session	dist_num	District number	text		TEA Directory

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	dist_name	TEA District Name	text		Trayt: School ISD Name - Independent School District (ISD) Name
TCHATT Implementater-level / TCHATT June 14th Session	campus_num	Campus number	text		TEA Directory
TCHATT Implementater-level / TCHATT June 14th Session	campus_name	Campus Name	notes		TEA Directory
TCHATT Implementater-level / TCHATT June 14th Session	implementer_first_name	Implementer First Name	text		
TCHATT Implementater-level / TCHATT June 14th Session	implementer_last_name	Implementer Last Name	text		
TCHATT Implementater-level / TCHATT June 14th Session	implementer_email	Implementer email	text		
TCHATT Implementater-level / TCHATT June 14th Session	implementer_role_base	Implementer role	radio	1 = Principal/Assistant Principal/School Administrator 2 = Counselor 3 = Social worker 4 = School psychologist 5 = Nurse	

Project	Variable Name	Field Text	Field Type	Choices	Description
				6 = Teacher 7 = Other (please specify)	
TCHATT Implementater-level / TCHATT June 14th Session	other_role	Other role	text		
TCHATT Implementater-level / TCHATT June 14th Session	zoom_session	Please select a date and time to join the live Zoom.	radio	1 = Tuesday, June 8th at 5 pm 2 = Thursday, June 10th at 5 pm 3 = Friday, June 11th at 9 am 4 = Monday, June 14th at 9 am 5 = Mock Session	
TCHATT Implementater-level / TCHATT June 14th Session	none_above	At registration, you were asked at which TEA school campus are you involved in TCHATT, and you selected "None of the above." What was the reason for this selection?	radio	1 = The campus I work at was not listed 2 = Other	
TCHATT Implementater-level / TCHATT June 14th Session	none_above_campus	Please type the name of the campus you work at:	text		
TCHATT Implementater-level / TCHATT June 14th Session	none_above_elaborate	Please elaborate:	text		
TCHATT Implementater-level / TCHATT June 14th Session	input_campus_name	Please type the name of the school campus you spend the most time on TCHATT from the following: [campus_name]	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	aware	How true is the following statement for you? "I am aware of the Texas Children's Health Access Through Telemedicine (TCHATT) program."	radio	1 = Not at all true 2 = Slightly true 3 = Somewhat true 4 = Very true	
TCHATT Implementater-level / TCHATT June 14th Session	implement	Has your district or school implemented TCHATT during the past 12 months?	radio	1 = No, and we have no plans to do so. 2 = No, but we are planning to implement TCHATT in the future. 3 = Yes, we are at an early stage of implementing TCHATT. 4 = Yes, we have implemented TCHATT, but it is inconsistently implemented across the district or school. 5 = Yes, we have implemented TCHATT fully and systematically across the district or school. 6 = Don't know	Walker, 2018
TCHATT Implementater-level / TCHATT June 14th Session	implement_time	How many months have you been implementing TCHATT in your school?	text		
TCHATT Implementater-level / TCHATT June 14th Session	involvement	How involved are you with the implementation of TCHATT at your district or school?	radio	1 = Not at all involved 2 = Somewhat involved 3 = Very involved	Livet, 2020
TCHATT Implementater-level / TCHATT June 14th Session	attend_training	Did you attend any trainings, or receive materials and/or resources to help prepare you to implement the TCHATT program in your school or district?	radio	1 = Yes 2 = No 3 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	helpful_training	How helpful were these trainings, material, and/or resources?	radio	1 = Not at all helpful 2 = Somewhat helpful 3 = Very helpful 4 = Extremely helpful	
TCHATT Implementater-level / TCHATT June 14th Session	parent_interest	In your best estimate, of those students referred to TCHATT at your school, how many parents/guardians were interested in obtaining TCHATT services for their child?	radio	1 = Less than 25% 2 = 25-49% 3 = 50-75% 4 = Greater than 75% 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	more_involved	These students are more involved in school.	radio	1 = Strongly Agree 2 = Agree 3 = Neither Agree nor Disagree 4 = Disagree 5 = Strongly Disagree	Wilder Research
TCHATT Implementater-level / TCHATT June 14th Session	less_incidents	These students had a decrease in behavioral incidents.	radio	1 = Strongly Agree 2 = Agree 3 = Neither Agree nor Disagree 4 = Disagree 5 = Strongly Disagree	Wilder Research
TCHATT Implementater-level / TCHATT June 14th Session	better_attendance	These students had better attendance at school.	radio	1 = Strongly Agree 2 = Agree 3 = Neither Agree nor Disagree 4 = Disagree 5 = Strongly Disagree	HB 906
TCHATT Implementater-level / TCHATT June 14th Session	better_grades	These students had better grades at school.	radio	1 = Strongly Agree 2 = Agree 3 = Neither Agree nor Disagree 4 = Disagree 5 = Strongly Disagree	Wilder Research
TCHATT Implementater-level / TCHATT	equity_q3	Please indicate how much you agree or disagree with the following statement:	radio	1 = Strongly Agree 2 = Agree 3 = Neither Agree nor Disagree	

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session		"TCHATT increased school staff capacity to meet the non-educational needs of students."		4 = Disagree 5 = Strongly Disagree	
TCHATT Implementater-level / TCHATT June 14th Session	aware_1	My school obtained buy-in from counselors and school leadership prior to enrolling in TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	aware_2	My school receives material about TCHATT and how to refer students.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	imp_support_1	My school received training to implement TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	imp_support_2	My school provided training to implement TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	imp_support_3	My school receives ongoing information (e.g., newsletter, videos, additional trainings, etc.) from the health-related institution (HRI) to support implementation of TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	imp_support_4	My school discusses TCHATT regularly in staff development meetings.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	school_1	School personnel refer students in need of TCHATT services to counselors or other designated TCHATT Campus Liaison.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_2	School counselor/Campus Liaison submits student referrals to TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_3	Counselor/Campus Liaison explains TCHATT to family.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_4	My school provides a translator to explain TCHATT to families who do not speak English.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_5	School counselor/Campus Liaison obtains verbal consent from families to receive TCHATT services.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_7	Parents/legal guardians who refuse TCHATT services are asked if they are willing to talk to someone at the HRI or consider TCHATT in future.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT	school_8	Counselor/Campus Liaison follows up with HRI or family after	radio	1 = Often 2 = Sometimes 3 = Rarely	

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session		referral is made to make sure student is connected to TCHATT.		4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_9	Counselor/Campus Liaison coordinates scheduling of on-campus appointments with student/family and TCHATT.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_10	School personnel secure a room for TCHATT visits.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_11	School personnel pulls student from class and escorts them to the identified room at the time of appointment.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_12	Parent/legal guardian attends the first appointment.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	school_13	My school has IT support available for TCHATT visits.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	ongoing_1	Counselor/Campus Liaison follows up with students after TCHATT sessions are completed to see if additional support is needed.	radio	1 = Often 2 = Sometimes 3 = Rarely 4 = Never 5 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	language_1	Has your school translated TCHATT brochures or other educational material available for families that do not speak English?	radio	1 = Yes 2 = No 3 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	language_2	What languages, other than English, are TCHATT brochures or other educational materials provided in?	checkbox	1 = Spanish 2 = Vietnamese 3 = Chinese language such as Mandarin or Cantonese 4 = Korean 5 = Urdu 6 = Hindi 7 = Farsi 8 = Other, please specify.	
TCHATT Implementater-level / TCHATT June 14th Session	language_3	Please specify other language(s):	text		
TCHATT Implementater-level / TCHATT June 14th Session	activities_comments	Do you have any additional comments related to the activities that you conduct as part of TCHATT? If so, please enter them there.	notes		
TCHATT Implementater-level / TCHATT June 14th Session	counselor_ratio	What is your student to counselor ratio at your school? (For example, 15:1)	text		SHPPS, 2016
TCHATT Implementater-level / TCHATT June 14th Session	state_programs	Besides TCHATT, please indicate which of the following state-funded programs that your school or district has used in the past 12	checkbox	1 = Community mental health services (i.e., use of local mental health authorities) 2 = Communities in School of Texas 3 = Community mental health grants 4 = Safe School allotments	HB 906

Project	Variable Name	Field Text	Field Type	Choices	Description
		months to support school-based mental health services or educator training. Please select all that apply.		5 = Mental Health First Aid Training program 6 = Non-physician mental health professional in education service center 7 = Don't know 8 = None of the above 9 = Other, please specify.	
TCHATT Implementater-level / TCHATT June 14th Session	state_programs_other	Please specify state-funded programs that your school or district has used.	text		HB 906
TCHATT Implementater-level / TCHATT June 14th Session	mh_assess	During the past 12 months, has your school undertaken efforts to assess the mental health needs of your students other than TCHATT?	radio	1 = Yes 2 = No 3 = Don't know	HB 906
TCHATT Implementater-level / TCHATT June 14th Session	mental_health_mou	Besides TCHATT, does your school or district have a formal agreement or memorandum of understanding (MOU) with one or more external providers to provide mental health services to students?	radio	1 = Yes 2 = No 3 = Don't know	
TCHATT Implementater-level / TCHATT June 14th Session	mental_health_providers	Which of the following external providers does your school or district have a formal agreement or MOU to provide mental health services to students? Please select all that apply.	checkbox	1 = Local mental health center 2 = Community health center 3 = Social services organization 4 = Private counselor 5 = School-linked health center 6 = School-based health center 7 = Drug prevention agency 8 = Local health department 9 = Private psychologist 10 = Drug treatment provider	HB 906

Project	Variable Name	Field Text	Field Type	Choices	Description
				11 = Telehealth provider 12 = University or medical school 13 = Don't know 14 = Other, please specify. 15 = None of the above	
TCHATT Implementater-level / TCHATT June 14th Session	mh_providers_other	Please specify other external providers that your school or district has a formal agreement or MOU to provide mental health services.	text		HB 906
TCHATT Implementater-level / TCHATT June 14th Session	equity_q1	In your best estimate, what percentage of the student population has need of non-educational supports such as meals, clothing, and/or counseling or behavioral therapy?	radio	1 = Less than 5% 2 = 6-15% 3 = 16-25% 4 = 26-50% 5 = Greater than 50% 6 = Don't know	HB 906
TCHATT Implementater-level / TCHATT June 14th Session	equity_q2	In your best estimate, how much time does school staff spend addressing non-educational needs such as behavioral problems, hunger, sleep deprivation and/or need of adequate school supplies or clothing.	radio	1 = Less than 15% 2 = 15-25% 3 = 26-49% 4 = Greater than 50% 5 = Don't know	HB 906
TCHATT Implementater-level / TCHATT June 14th Session	learning_climate_1	Our rules and regulation allow for creativity.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT	learning_climate_2	If someone wants to try something new, he or she is given the chance.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session				4 = Agree 5 = Strongly Agree	
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_3	We regularly take time to consider ways to improve how we do things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_4	After trying something new, we take the time to think about how it worked.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_5	People in our school actively try to improve how we do things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_6	People in this school generally reflect on how things are going.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_7	Our school listens to people who have new ideas about the ways we do things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_8	Our school learns from its mistakes.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	learning_climate_9	When we experience a problem in our school, we make a serious effort to find a new way of doing things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	learning_climate_10	Our school can quickly change procedures to meet new conditions as they arise.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	learning_climate_11	We share information generally in the team rather than keeping it to ourselves.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	learning_climate_12	Everyone's view is listened to even if it is in a minority.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	resource_util_1	Our school has the ability to access a wide range of resources for innovations (e.g., innovation could be a new policy or program).	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	resource_util_2	There is a clear financial plan for us to maintain innovations.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	resource_util_3	There is a clear process by which we prioritize and distribute resources.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	resource_util_4	We know how to allocate resources effectively.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-	resource_util_5	We know how to tap into potential resources.	radio	1 = Strongly Disagree 2 = Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
level / TCHATT June 14th Session				3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHATT Implementater- level / TCHATT June 14th Session	resource_util_6	Our school is able to allocate resources to new things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	resource_util_7	Our school is able to find new resources to support new things.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	leadership_1	Our school leadership expresses confidence in the capabilities of others.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	leadership_2	Our school leadership praises/recognizes when someone has done something well.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	leadership_3	Our school leadership recognizes and appreciates team efforts that help us successfully implement projects.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	leadership_4	Our school leadership supports us in dealing with challenges of implementation.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT	leadership_5	Our school leadership reacts to critical issues regarding the implementation of our	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session		projects by openly and effectively addressing the problem(s).		4 = Agree 5 = Strongly Agree	
TCHATT Implementater-level / TCHATT June 14th Session	leadership_6	Our school leadership encourages staff feedback in choosing new program goals.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	leadership_7	Our school leadership considers staff needs when setting new program goals.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	leadership_8	Our school leadership provides opportunities for staff members to take primary responsibility over tasks.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	leadership_9	Our school leadership sees that authority is granted to staff in order to get tasks completed.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	leadership_10	Our school leadership conveys confidence in staff members' ability to accomplish tasks.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	staff_capacity_1	Staffing levels are sufficient right now to accomplish our day-to-day tasks.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT	staff_capacity_2	People who work within our school have sufficient knowledge to carry out our day-to-day tasks.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session				4 = Agree 5 = Strongly Agree	
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_3	People who work in our school have the necessary experience to carry out their role.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_4	People in our school are able to take on new tasks when needed.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_5	People in our school have unique skills that contribute to the team.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_6	The number of staff are sufficient for the tasks we have.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_7	People in our school can adapt to changing work demands.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_8	People in our school have good communication skills.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHAT Implementater-level / TCHAT June 14th Session	staff_capacity_9	Turnover is not a problem in our district/school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_1	TCHATT is better than other services we have used before in our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_2	TCHATT is better than other services we have considered using in our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_3	TCHATT represents an advance over other services that are already available in our field.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_4	TCHATT represents improvement over how we have done things before.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_5	TCHATT has advantages for our school compared to other innovations.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_6	TCHATT meets our school needs better than what we have been doing.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_7	TCHATT represents a better option over what we have been doing.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	relative_adv_8	There is evidence that TCHATT works better than other services.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_1	TCHATT fits well with other initiatives in our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_2	TCHATT helps us meet the needs of the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_3	TCHATT is timely given the current needs of the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_4	TCHATT fits well with our school's culture.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_5	TCHATT fits well with our school's values.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	compatability_6	TCHATT fits well with our school's mission.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	compatability_7	We can see how using TCHATT helps meet our school's needs.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_1	TCHATT is difficult to use.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_2	TCHATT is hard to understand.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_3	The many different parts involved in TCHATT make it complicated.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_4	It is difficult to use TCHATT because it is complicated.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_5	It is easy for us to use TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	complexity_6	TCHATT is easy for us to understand.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	observability_1	We can see how using TCHATT will help meet our school's goals.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_2	We see how TCHATT will work in the short-term.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_3	We can see how TCHATT can benefit the people we serve.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_4	In the near future, we expect to see the benefits of TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_5	We expect to see a good return on our investment in TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_6	We are able/will be able to see short-term gains from TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	observability_7	We will be able to see/are seeing tangible benefits from TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-	observability_8	There is evidence that TCHATT works.	radio	1 = Strongly Disagree 2 = Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
level / TCHATT June 14th Session				3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHATT Implementater- level / TCHATT June 14th Session	priority_1	Using TCHATT is one of our top priorities.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	priority_2	Our school emphasizes that implementing TCHATT is very important.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	priority_3	TCHATT is important for our school right now.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	priority_4	Decision makers believe TCHATT is important.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	priority_5	It is important that we implement TCHATT right now.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT June 14th Session	priority_6	There is an urgent need for TCHATT at our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater- level / TCHATT	priority_7	External reasons make TCHATT a priority for our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session				4 = Agree 5 = Strongly Agree	
TCHATT Implementater-level / TCHATT June 14th Session	priority_8	Internal reasons make TCHATT a priority for our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	priority_9	Our school is committed to implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_1	We have the ability to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_2	We have the knowledge to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_3	We have the skills needed to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_4	We can describe the steps needed to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_5	We know what it takes to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_6	We feel confident in our ability to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	knowledge_skills_7	We know the core components of TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_1	An influential person in our school strongly promotes TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_2	At least one person we work with clearly communicates the benefits of using TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_3	We have a person(s) who shares progress on how implementation is going.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_4	We have a person(s) who shares our progress on TCHATT with other schools.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_5	There is an influential person in our school who tries to get others to use TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-	program_champ_6	At least one person in our school has the skills to	radio	1 = Strongly Disagree 2 = Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
level / TCHATT June 14th Session		promote TCHATT to our colleagues.		3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHATT Implementater-level / TCHATT June 14th Session	program_champ_7	We have an individual within our school who takes a lead role in making sure TCHATT is used.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_1	If needed, our school provides technical assistance or coaching to use TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_2	Our school provides high quality trainings that are useful for implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_3	Our school asks staff about their training needs for TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_4	Supervisors monitor how TCHATT is implemented.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_5	Supervisors give feedback to staff about how they are implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT	imp_climate_6	Our school effectively deals with turnover to keep implementation of TCHATT on track.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session				4 = Agree 5 = Strongly Agree	
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_7	There is a process in place to help new employees understand the expectation of using TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_8	Our school dedicates sufficient resources to implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_9	Supervisors expect us to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_10	Supervisors support implementation of TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_11	Supervisors have expressed the importance of implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_12	Staff get the support they need to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_13	Supervisors acknowledge staff for implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	imp_climate_14	People who use TCHATT are valued in this school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_1	We are able to get support for delivering TCHATT by collaborating with the Health-related institution (HRI).	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_2	We communicate well with the HRI staff to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_3	We obtain support from the HRI to help us implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_4	We can problem-solve with the HRI staff to help deliver TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_5	We can get advice from the HRI to deliver TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_6	We are on the same page as the HRI in regards to TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	inter_relations_7	Relationships to the HRI important for delivering TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_1	We can communicate well with other teams within our school about TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_2	We can coordinate well with each other when trying to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_3	We get implementation support for TCHATT from other teams in our school.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_4	Individuals within our school help support each other in implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_5	We regularly meet with other units/teams within our school about implementing TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-level / TCHATT June 14th Session	intra_relations_6	We have an implementation team that consists of people from different departments to implement TCHATT.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	Walker, 2020 Scaccia, 2015
TCHATT Implementater-	intra_relations_7	Intra-organizational relationships are	radio	1 = Strongly Disagree 2 = Disagree	Walker, 2020 Scaccia, 2015

Project	Variable Name	Field Text	Field Type	Choices	Description
level / TCHAT June 14th Session		important for implementation.		3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHAT Implementater- level / TCHAT June 14th Session	other_1	I would recommend the TCHAT program to other schools.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHAT Implementater- level / TCHAT June 14th Session	other_2	My school intends to continue using the TCHAT program in the next 6 months.	radio	1 = Strongly Disagree 2 = Disagree 3 = Neither Agree nor Disagree 4 = Agree 5 = Strongly Agree	
TCHAT Implementater- level / TCHAT June 14th Session	benefit	Overall, what do you see as the biggest benefit of having the TCHAT program available in your school?	notes		
TCHAT Implementater- level / TCHAT June 14th Session	improve	How can the TCHAT program be improved?	notes		
TCHAT Implementater- level / TCHAT June 14th Session	gender	Are you male or female?	radio	1 = Male 2 = Female 3 = Neither Male, nor Female	
TCHAT Implementater- level / TCHAT June 14th Session	ethnicity	What is your race/ethnicity?	radio	1 = White, not of Hispanic origin 2 = Black, not of Hispanic origin 3 = Hispanic 4 = Asian or Pacific Islander 5 = Native American, American Indian, or Alaska Native 6 = Other, please specify 7 = Prefer not to answer	

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementater-level / TCHATT June 14th Session	ethnicity_other	Please specify, "Other"	text		
TCHATT Implementater-level / TCHATT June 14th Session	age	What is your age?	radio	1 = 20-29 2 = 30-39 3 = 40-49 4 = 50-59 5 = 60 or older	
TCHATT Implementater-level / TCHATT June 14th Session	education	What is your highest level of education?	radio	1 = High school 2 = Associate's degree 3 = Bachelor of Arts/Bachelor of Science 4 = Master of Arts/Master of Science 5 = Master's degree plus 15 or more additional course hours 6 = EdD/PhD 7 = Other professional degree	
TCHATT Implementater-level / TCHATT June 14th Session	other_education	Please specify, "Other professional degree"	text		
TCHATT Implementater-level / TCHATT June 14th Session	years_worked	Counting this year as a full year, how many years have you served in your primary role?	text		
TCHATT Implementater-level / TCHATT June 14th Session	coordinate	Are you the person who coordinates TCHATT at your school or school district?	radio	1 = Yes 2 = No 3 = Don't know	
TCHATT Implementater-level / TCHATT	decision_making	Would you describe your school as having a centralized or	radio	1 = Centralized 2 = Decentralized 3 = Don't know	

Project	Variable Name	Field Text	Field Type	Choices	Description
June 14th Session		decentralized decision-making structure?			
TCHATT Implementater-level / TCHATT June 14th Session	teachers	Are there any teachers that have a role in implementing TCHATT (e.g., those who refer students, reach out to families, etc). who you would recommend completing this survey? If so, please can you provide those teachers' names and emails?	notes		
TCHATT Implementer-level (additional surveys)	implementer_id	Implementer ID	text		
TCHATT Implementer-level (additional surveys)	hri	HRI Affiliation	text		
TCHATT Implementer-level (additional surveys)	dist_num	TEA District Number	text		
TCHATT Implementer-level (additional surveys)	campus_num_pre	TEA Campus Number	text		
TCHATT Implementer-level (additional surveys)	campus_name_pre_text	Campus Name	text		
TCHATT Implementer-level (additional surveys)	first_name	Implementer First Name	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATT Implementer-level (additional surveys)	last_name	Implementer Last Name	text		
TCHATT Implementer-level (additional surveys)	email	Implementer Email	text		
TCHATT Implementer-level (additional surveys)	time_campus	Which of the following statements best describes your interaction with the TCHATT program?	radio	1 = I spend all my time on TCHATT with one school campus. 2 = I split my time on TCHATT among multiple school campuses. 3 = I do not spend any time on TCHATT with a specific school campus (e.x. Mental Health Referral Coordinator, Family Resource Center).	Questions to accommodate modified survey administration method
TCHATT Implementer-level (additional surveys)	one_campus	Please enter the name of the school campus where you work on TCHATT.	text		Questions to accommodate modified survey administration method
TCHATT Implementer-level (additional surveys)	multiple_campus	Please enter the name of the ONE campus where most of your time is spent on TCHATT.	text		Questions to accommodate modified survey administration method
TCHATT Implementer-level (additional surveys)	subcontract	Are you a sub-contractor of a school or school district?	yesno	1 = Employed by a school district 2 = Sub-contracted by a school or school district	Questions to accommodate modified survey administration method
TCHATT Implementer-level (additional surveys)	subcontract_name	Please enter the name of the organization that employs you.	text		Questions to accommodate modified survey administration method
TCHATT Encounter	referral_id	Encounter (Referral) ID from Trayt	text		Trayt: Referral ID - Unique ID for each TCHATT student referral, assigned with Referral creation

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	implementer_id	Campus Staff ID	text		
TCHAT Encounter	hri	HRI	dropdown	BCM = Baylor College of Medicine UT_Dell = Dell Medical School at the University of Texas at Austin TAMUHSC = Texas A&M University / Baylor Scott and White UNTHSC = University of North Texas Health Science Center at Fort Worth TTUHSC = Texas Tech University Health Science Center TTUHSC_EP = Texas Tech University Health Science Center at El Paso UTHSC_SA = University of Texas Health Science Center at San Antonio UTHSCT = University of Texas Health Science Center at Tyler UTHSCH = University of Texas Health Science Center at Houston UTMB = University of Texas Medical Branch at Galveston UTSW = University of Texas Southwestern Medical Center UTRGV = University of Texas Rio Grande Valley	Trayt: HRI Name
TCHAT Encounter	trayt_hri	HRI ID from Trayt	text		Trayt: HRI Org ID - Unique Identifier (HRI)
TCHAT Encounter	dist_num	District number (TEA)	text		TEA Directory
TCHAT Encounter	campus_num	Campus Number (TEA)	text		TEA Directory
TCHAT Encounter	nces_school_id	NCES School ID	text		Trayt: NCES School ID - School ID as defined by the National Center for Education Statistics (NCES) includes public schools, private schools, colleges

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHATTEncounter	referral_status	Referral Status	radio	1 = Enrolled 2 = Referral 3 = Archived	Trayt - Service Status - Current Status of Referral Record: Active Referral / Enrolled Patient / Archived Record
TCHATTEncounter	referral_created_date	Referral Created Date	text		Trayt: Referral Create Date - Date referral documented
TCHATTEncounter	student_gender	Student Gender	radio	1 = Male 2 = Female	Trayt: Student Gender
TCHATTEncounter	student_age	Student Age	text		Trayt: Student Age
TCHATTEncounter	student_grade	Student Grade	text		Trayt: Student Grade
TCHATTEncounter	student_ethnicity	Student Ethnicity	radio	1 = Hispanic 2 = Non-Hispanic 3 = Decline	Trayt: Student_Ethnicity_Hispanic Student_Ethnicity_NonHispanic Student_Ethnicity_Decline
TCHATTEncounter	student_race	Student Race	checkbox	1 = American Indian or Alaska Native 2 = Asian 3 = White 4 = Black or African American 5 = Native Hawaiian or Pacific Islander 6 = Decline	Trayt: Student_Race_American Indian or AK Native Student_Race_Asian Student_Race_White Student_Race_Black Student_Race_Islander Student_Race_Decline
TCHATTEncounter	student_multirace	Student MultiRacial	yesno		Trayt: Student_Race_Multiracial - If more than one race category, calculate "yes"
TCHATTEncounter	student_zip	Student Zipcode	text		Trayt: STUDENT ZIP - Student Zip Code
TCHATTEncounter	impaired	Does this student have any intellectual or cognitive disability?	yesno		Trayt: Impaired - Does this student have any

Project	Variable Name	Field Text	Field Type	Choices	Description
					intellectual or cognitive disability?
TCHAT Encounter	school_type	School Type/Level as defined by NCES	radio	1 = Elementary 2 = Middle School 3 = High School	Trayt: School Type - School type as defined by the National Center for Education Statistics (NCES) (Elementary, Middle School, High School, Secondary, PreK, Not Reported, Adult Ed, Other)
TCHAT Encounter	call_reason	Counselor provided reason for student referral	checkbox	1 = Changes in Sleep 2 = Changes in appetite 3 = Trouble paying attention 4 = Disruptive behaviors 5 = Anxiety or excessive worry 6 = Depressed mood 7 = Suicidal thoughts 8 = Thoughts of self harm 9 = Increased aggression 10 = Thoughts of harming others 11 = Trauma 12 = Other	Trayt: Referral Reason - Changes in sleep Referral Reason - Changes in appetite Referral Reason - Trouble paying attention Referral Reason - Disruptive behaviors Referral Reason - Anxiety or excessive worry Referral Reason - Depressed mood Referral Reason - Suicidal thoughts Referral Reason - Thoughts of self harm Referral Reason - Increased aggression Referral Reason - Thoughts of harming others Referral Reason - Trauma Referral Reason - Other - Counselor-provided reason for student referral - at least one response required, can choose multiple options

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	call_reason_other	Referral Reason Other	text		Trayt: Referral Reason - Other (text) - Counselor-provided reason for referral (write-in response)
TCHAT Encounter	same_day	Does the student require a same-day urgent appointment?	yesno		Trayt: Same Day Urgent - Does the student require a same-day urgent appointment?
TCHAT Encounter	decline_service_reason	Reasonfor Decline of Service (HRI must report)	checkbox	1 = Family prefers in-person treatment 2 = Family does not want care at school 3 = Patient is already receiving care 4 = Family denies mental health concerns 5 = Other reason for decline 6 = Unable to reach family	Trayt: Reason for Decline of Service - If family declines consent to service; HRI must document reason for decline Family prefers in-person treatment Family does not want care at school Patient is already receiving care Family denies mental health concerns Other reason for decline Unable to reach family
TCHAT Encounter	tchat_id	TCHAT ID received at enrollment/ parental consent	text		Trayt: TCHAT ID - Unique ID for each Patient; Assigned at enrollment; Family has consented to care
TCHAT Encounter	enrollment_date	Enrollment Created Date	text		Trayt: Enrollment Create Date - Date enrollment form is created; student is now an "active" patient
TCHAT Encounter	decline_care_reason	Reason for declining TCHAT service	checkbox	1 = Family prefers in-person treatment 2 = Family does not want care at school 3 = Patient is already receiving care 4 = Family denies mental health	Trayt: Reason for Decline Consent to Care - Reason for declining TCHAT service Family prefers in-person

Project	Variable Name	Field Text	Field Type	Choices	Description
				concerns 5 = Other reason for decline 6 = Unable to reach family	treatment Family does not want care at school Patient is already receiving care Family denies mental health concerns Other reason for decline Unable to reach family
TCHATT Encounter	care_team	Care Team includes:	checkbox	1 = PS 2 = Therapist 3 = Other providers	Trayt: Care Team - PSY Care Team - Therapist Care Team - Others - Assigned care team includes PSY Assigned Care Team includes a therapist Assigned Care Team includes other providers
TCHATT Encounter	intake_complete	Intake Complete?	yesno		Trayt: Intake completed - Patient and/or guardian has completed mobile intake form (all assigned parties must have completed intake for Yes)
TCHATT Encounter	pcp_roi	PCP ROI is on file (name and date)?	yesno		Trayt: ROI PCP Rcvd - Staff confirms PCP ROI is on file - name & date
TCHATT Encounter	school_roi	School ROI is on file (name and date)?	yesno		Trayt: ROI School Rcvd - Staff confirms School ROI is on file - name & date
TCHATT Encounter	referral_id	Encounter (Referral) ID from Trayt	text		
TCHATT Encounter	implementer_id	Campus Staff ID	text		
TCHATT Encounter	hri	HRI	dropdown	BCM_UTHSCT, Baylor COM & UTHSCH BCM, Baylor College of Medicine UT_Dell, Dell Medical	

Project	Variable Name	Field Text	Field Type	Choices	Description
				School at the University of Texas at Austin TAMUHSC, Texas A&M University / Baylor Scott and White UNTHSC, University of North Texas Health Science Center at Fort Worth TTUHSC, Texas Tech University Health Science Center TTUHSC_EP, Texas Tech University Health Science Center at El Paso UTHSC_SA, University of Texas Health Science Center at San Antonio UTHSCT, University of Texas Health Science Center at Tyler UTHSCH, University of Texas Health Science Center at Houston UTMB, University of Texas Medical Branch at Galveston UTSW, University of Texas Southwestern Medical Center UTRGV, University of Texas Rio Grande Valley	
TCHATTEncounter	trayt_hri	HRI ID from Trayt	text		
TCHATTEncounter	dist_num	District number (TEA)	text		
TCHATTEncounter	campus_num	Campus Number (TEA)	text		
TCHATTEncounter	nces_school_id	NCES School ID	text		
TCHATTEncounter	referral_status	Referral Status	radio	1, Open 2, Enrolled 3, Duplicate Referral (Mistake Made) 4, Other 5, Declined 6, No Response	
TCHATTEncounter	referral_incomplete	Open Referall Incomplete?	truefalse		
TCHATTEncounter	referral_date	Referral Date	text		
TCHATTEncounter	referral_created_date	Referral Created Date	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	student_gender	Student Gender	radio	1, Male 2, Female 3, Other	
TCHAT Encounter	student_age	Student Age	text		
TCHAT Encounter	student_grade	Student Grade	text		
TCHAT Encounter	student_ethnicity	Student Ethnicity	radio	1, Hispanic 2, Non-Hispanic 3, Decline	
TCHAT Encounter	student_race	Student Race	checkbox	1, American Indian or Alaska Native 2, Asian 3, White 4, Black or African American 5, Native Hawaiian or Pacific Islander 6, Decline	
TCHAT Encounter	student_multirace	Student MultiRacial	truefalse		
TCHAT Encounter	student_zip	Student Zipcode	text		
TCHAT Encounter	impaired	Does this student have any intellectual or cognitive disability?	radio	1, Yes 0, No 2, Unsure	
TCHAT Encounter	school_type	School Type/Level as defined by NCES	radio	1, Elementary 2, Middle School 3, High School 4, Secondary School 5, PreK 6, Adult Education 7, Other 8, Not reported	
TCHAT Encounter	call_reason	Counselor provided reason for student referral	checkbox	1, Changes in Sleep 2, Trauma 3, Harm to Others 4, Agression 5, Self harm behaviors 6, Self harm thoughts 7, Trouble paying attention 8, Suicidal Thoughts 9, Depressed 10, Anxiety 11, Disruptive Behaviors 12, Attention 13, Changes in Appetite 14, Other	
TCHAT Encounter	call_reason_other	Referral Reason Other	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	same_day	Does the student require a same-day urgent appointment?	radio	1, Yes 0, No 2, Unsure	
TCHAT Encounter	decline_service_reason	Reasonfor Decline of Service (parent consent)	radio	1, Family prefers in-person treatment 2, Family does not want care at school 3, Patient is already receiving care 4, Family denies mental health concerns 5, Other reason for decline 6, Unable to reach family	
TCHAT Encounter	decline_service_other	Other reason to decline service (parent):	notes		
TCHAT Encounter	enrollment_date	Enrollment Created Date	text		
TCHAT Encounter	decline_care_reason	Reason for declining TCHAT care (child assent)	radio	1, Family prefers in-person treatment 2, Family does not want care at school 3, Patient is already receiving care 4, Family denies mental health concerns 5, Other reason for decline 6, Unable to reach family	
TCHAT Encounter	decline_other	Decline Other Reasons	notes		
TCHAT Encounter	care_team	Care Team includes:	checkbox	1, Psychiatrist 2, Therapist 3, Other providers	
TCHAT Encounter	intake_complete	Patient and/or guardian has completed mobile intake form	truefalse		
TCHAT Encounter	pcp_roi	PCP ROI is on file (name and date)?	truefalse		
TCHAT Encounter	school_roi	School ROI is on file (name and date)?	truefalse		
TCHAT Encounter	family_mobile_track	Family Mobile Tracker	text		
TCHAT Encounter	tchat_id	Unique ID for each Patient -- assigned at	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
		enrollment (parent consent)			
TCHATT Encounter	service_status	Service Status	radio	1, Open 2, Archived	
TCHATT Encounter	encounter_all	Total number of documented encounters (assessment + intervention). Max 5 per patient.	text		
TCHATT Encounter	encounter_psy	Number of encounters (assessment + interventions) involving a psychiatrist	text		
TCHATT Encounter	encounter_psychol	Number of encounters (assessment + interventions) involving a psychologist	text		
TCHATT Encounter	encounter_lpcmhmc	Number of encounters (assessment + interventions) involving an LPC-LMHC - standard episode only	text		
TCHATT Encounter	encounter_lcswh	Number of encounters (assessment + interventions) involving an LCSW-LMSW - standard episode only	text		
TCHATT Encounter	encounter_np	Number of encounters (assessment + interventions) involving a nurse practitioner-standard episode only	text		
TCHATT Encounter	encounter_op	Number of encounters (assessment + interventions) involving an other provider-standard episode only	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	encounter_casemgmt	Number of encounters (assessment + interventions) involving case management	text		
TCHAT Encounter	encounter_schoolcoord	Number of encounters (assessment + interventions) involving school based coordination	text		
TCHAT Encounter	encounter_support	Number of encounters (assessment + interventions) involving supportive therapy	text		
TCHAT Encounter	encounter_cbt	Number of encounters (assessment + interventions) involving cognitive behavioral therapy	text		
TCHAT Encounter	encounter_parentmgmt	Number of encounters (assessment + interventions) involving parent management therapy	text		
TCHAT Encounter	encounter_psydyn	Number of encounters (assessment + interventions) involving psychodynamic therapy	text		
TCHAT Encounter	encounter_family	Number of encounters (assessment + interventions) involving family therapy	text		
TCHAT Encounter	encounter_crisismgmt	Number of encounters (assessment + interventions) involving crisis management/safety	text		
TCHAT Encounter	encounter_hbm	Number of encounters (assessment +	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
		interventions) involving health behavior management			
TCHATT Encounter	encounter_substance	Number of encounters (assessment + interventions) involving substance abuse counseling	text		
TCHATT Encounter	encounter_uniproto	Number of encounters (assessment + interventions) involving unified protocol	text		
TCHATT Encounter	encounter_other	Number of encounters (assessment + interventions) tracked as "None of the above"	text		
TCHATT Encounter	encounter_psyassess	Number of encounters (assessment + interventions) involving a psychiatrist assessment	text		
TCHATT Encounter	encounter_psychassess	Number of encounters (assessment + interventions) involving a psychologist assessment	text		
TCHATT Encounter	encounter_therapasses	Number of encounters (assessment + interventions) involving a therapist assessment	text		
TCHATT Encounter	encounter_npassess	Number of encounters (assessment + interventions) involving a nurse practitioner assessment- standard episode only	text		
TCHATT Encounter	encounter_psymgmtassess	Number of encounters (assessment + interventions) involving a	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
		psychiatrist management assessment			
TCHAT Encounter	encounter_psychmgass ess	Number of encounters (assessment + interventions) involving a psychologist management assessment	text		
TCHAT Encounter	encounter_theramgmta ssess	Number of encounters (assessment + interventions) involving a therapist management assessment	text		
TCHAT Encounter	encounter_npmgmtasse ss	Number of encounters (assessment + interventions) involving a nurse practitioner management assessment- standard episode only	text		
TCHAT Encounter	encounter_otherassess	Number of encounters (assessment + interventions) tracked as "None of the above" assessment	text		
TCHAT Encounter	disposition	Disposition status documented at conclusion of standard episode of care (at or before encounter 6, once archived)	radio	1, Completed Service within Standard (5 or less) 2, Extension (At least one provider requested)	
TCHAT Encounter	extension_all	Total number of completed extension encounters.	text		
TCHAT Encounter	extension_psy	Number of extension encounters involving a psychiatrist	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	extension_psychol	Number of extension encounters involving a psychologist	text		
TCHAT Encounter	extension_lpcmhch	Number of extension encounters involving an LPC-LMHC - standard episode only	text		
TCHAT Encounter	extension_lcswh	Number of extension encounters involving an LCSW-LMSW - standard episode only	text		
TCHAT Encounter	extension_np	Number of extension encounters involving a nurse practitioner- standard episode only	text		
TCHAT Encounter	extension_op	Number of extension encounters involving an other provider- standard episode only	text		
TCHAT Encounter	extension_casemgmt	Number of extension encounters involving case management	text		
TCHAT Encounter	extension_schoolcoord	Number of extension encounters involving school based coordination	text		
TCHAT Encounter	extension_support	Number of extension encounters involving supportive therapy	text		
TCHAT Encounter	extension_cbt	Number of extension encounters involving cognitive behavioral therapy	text		
TCHAT Encounter	extension_parentmgmt	Number of extension encounters involving	text		

Project	Variable Name	Field Text	Field Type	Choices	Description
		parent management therapy			
TCHAT Encounter	extension_psydyn	Number of extension encounters involving psychodynamic therapy	text		
TCHAT Encounter	extension_family	Number of extension encounters involving family therapy	text		
TCHAT Encounter	extension_crisismgmt	Number of extension encounters involving crisis management/safety	text		
TCHAT Encounter	extension_hbm	Number of extension encounters involving health behavior management	text		
TCHAT Encounter	extension_substance	Number of extension encounters involving substance abuse counseling	text		
TCHAT Encounter	extension_uniproto	Number of extension encounters involving unified protocol	text		
TCHAT Encounter	extension_other	Number of extension encounters tracked as "None of the above"	text		
TCHAT Encounter	total_encounters	Grand total # of documented patient encounters (includes standard episode and all extension encounters)	text		
TCHAT Encounter	end_service_date	Service Completed date from End of Care summary report	text		
TCHAT Encounter	key_problem_notes	Key problem notes	notes		

Project	Variable Name	Field Text	Field Type	Choices	Description
TCHAT Encounter	general_notes	General Notes	notes		
TCHAT Encounter	first_archived_date	Timestamp for first time an episode of care is archived	text		
TCHAT Encounter	care_ref_any	Was the student referred for any additional services following TCHAT?	truefalse		
TCHAT Encounter	care_referral	Which additional services was the student referred?	checkbox	1, Psychiatrist within a HUB organization 2, Psychiatrist in the community 3, Individual therapy services 4, Family therapy services 5, Parent management therapy services 6, Parent mental health services 7, Inpatient psychiatric care therapy services 8, IOP therapy services 9, Residual therapy services 10, Group therapy services 11, Other therapy services 12, Any school-based intervention 13, 504 Recommendations 14, OHI recommendations 15, IEP recommendations 16, Psychoeducational assessment for learning disorders 17, At school counseling 18, Other social support 19, Any general resources 20, Local support groups 21, Food banks 22, Domestic violence resources 23, Wrap around services 24, Other general resources 25, PCP provider with CPAN support 26, Other referral	

Appendix I. CPWE Resident Interview Guide

CPWE Resident Interview Guide

Introductions

- Briefly introduce oneself as part of the Rice Baker Institute and UTHealth SPH Team, an external group evaluating the programs under the SB11 legislation.
- We are interested in learning about your experience as a resident in regards to your training experience and experience working with the local mental health authority.
- We intend to understand your perspective of the program strengths and weaknesses, and the potential influence of the experience on your future career
- There are no right or wrong answers, and everything you share will be confidential. Encourage transparency in responses.

Ask for verbal consent to be recorded and for information to be used:

“This discussion will be recorded. By participating in this discussion, you are consenting to the recording and the confidential use of information collected. However, as stated this information will not be reported back to your program, and information reported will be in aggregated form based on thematic qualitative analysis. Therefore, the information reported out will not be able to be traced back to you, and everything you say will be confidential.”

Interview Questions for CPWE Residents

1. Can you please describe the quality of your training experience at the local mental health authority (LMHA)?
 - a. Additional probes:
 - i. What additional skills do trainees obtain by working at a LMHA (clinical, education, research)?
 - ii. What previous skills or experiences are needed to be effective as a resident at a LMHA?
 - iii. What do you wish you would have known prior to rotating at a LMHA?
 - iv. How do you think the training experience prepares you to provide psychiatric care to adolescents across a range of mental health care needs?
2. Can you please describe your attitude towards local mental health authorities prior to this training experience?

(NOTE TO INTERVIEWER: Attitudes = Perspective, feeling, belief systems)

 - a. Additional probes:
 - i. We understand that there can be difficulties and challenges faced within local mental health authority?

- ii. How have those attitudes changed?
 - 1. Why have attitudes changed?
- 3. Can you please describe either actual or possible benefits of training at a local mental health authority?
 - a. Additional probes:
 - i. What is unique about training at a LMHA that contributed to those benefits?
 - ii. How does this training experience compare to other prior clinical training experiences in private settings?
 (NOTE TO INTERVIEWER: Probe to get resident to be explicit about what makes the LMHA unique and how they are comparing this experience to previous clinical training experiences in private settings.)
- 4. Can you please describe either actual or possible challenges with training at a local mental health authority?
 - a. Additional probes:
 - i. What is unique about training at a LMHA that contributed to those challenges?
 - ii. How do the challenges experienced while training at a LMHA compare to challenges experienced while training at a private practice or hospital?
- 5. What descriptive words would you use to describe the patients seen during your residency training at the LMHA?
 (NOTE TO INTERVIEWER: We want to understand the lens with which people are viewing the patients they see during residency.)
 - a. How are the patients who come to the local mental health authority similar to those who you've seen in private practice?
 - i. How are they different?
 - ii. Please describe prior experiences working with this patient population.
 - iii. How would you describe your level of comfort with serving a similar patient population as seen during your residency program?
- 6. Often times, residents serve patients from cultures different than their own, how well did your residency program provide the training and support to improve your cultural competence?
 - a. How would you define cultural competence?
 - b. Have you observed physician-patient encounters that could have benefited from cultural competence and/or implicit bias training?

- c. How would you rate your residency program's intentionality in providing supports and trainings for residents to understand implicit bias and the need for cultural competence?
7. What type of clinical setting do you envision yourself working in after residency?
(NOTE TO INTERVIEWER: We want to understand if the experience at the LMHA influenced them to want to serve in LMHA, post residency)
- a. Did your idea of where you wanted to practice change during residency? Why or why not?
 - b. How has your rotation in the local mental health authority influenced your decision of where you want to practice post-residency?
 - c. How much time will you spend working in a local mental health authority post-residency (volunteer, moonlighting, working full-time, etc.)
(NOTE TO INTERVIEWER: We are looking for how attitudes may have changed during residency and whether attitudes relates to desire to continue to practice at a local mental health authority)
8. Any remaining thoughts or suggestions for improvement of your residency program?

Closing

Thank you for taking the time to talk with us today! Your feedback is very valuable to our evaluation. You will be provided with a \$50 Amazon gift card in appreciation of your time. The gift card will be delivered to you via email within the next 2 weeks. If you have any questions, feel free to reach out to our program manager, Erica Frost [Provide Erica's contact information if requested: Erica.L.Frost@uth.tmc.edu, 713-500-9669].

Appendix J. Time-Driven Activity-Based Costing Model Results

Time-Driven Activity-Based Costing Model Results for CPAN Procedure

Site 1

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Department Chair	37	147.2356	5447.72
1. Time spent planning outreach prior to beginning outreach	Medical Director	275	147.2356	40489.78
1. Time spent planning outreach prior to beginning outreach	Project Manager	74	55	4070
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Administrator	24	128.726	3089.42
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Child and Adolescent Psychiatrist	143	180.2885	25781.25
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Child and Adolescent Psychiatrist	43	180.2885	7752.40
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Child and Adolescent Psychiatrist	20	180.2885	3605.77
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Coordinator	169	59.375	10034.38
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Department Chair	47	147.2356	6920.072
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Medical Director	344	147.2356	50649.04
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Project Manager	372	55	20460
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Sr. Mental Health Clinician	320	40.625	13000
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Administrator	380	128.726	48915.87
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Child and Adolescent Psychiatrist	763	180.2885	137560.1
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Child and Adolescent Psychiatrist	85	180.2885	15324.52
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Child and Adolescent Psychiatrist	27	180.2885	4867.79
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Coordinator	899	59.375	53378.13
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Data Analyst	506	56.25	28462.5

3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Data Analyst	192	56.25	10800
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Data Analyst	742	56.25	41737.5
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Data Analyst	17	56.25	956.25
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Department Chair	149	147.2356	21938.1
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Medical Director	1101	147.2356	162106.4
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Post Doctoral Fellow, Psychology	400	59.375	23750
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Program Coordinator	1280	59.375	76000
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Project Manager	1191	55	65505
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Psychologist	440	59.375	26125
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Sr Office Assistant	960	21.875	21000
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Sr. Mental Health Clinician	2560	40.625	104000
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Sr. Mental Health Clinician	1280	40.625	52000

Site 2

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Director	150	150.24	22536.06
1. Time spent planning outreach prior to beginning outreach	Program manager	8	75	600
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral health consultant	96	40.625	3900
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Coordinator	12	40.625	487.5
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Director	128	150.24	19230.77
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Program manager	6	75	450
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral health consultant	120	40.625	4875
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Coordinator	30	40.625	1218.75
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Director	96	150.24	14423.08
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	MMHP subcontract for outreach and start-up	164.4	40.625	6678.75
4.Time spent on other relevant start-up activities	Behavioral health consultant	20	40.625	812.5

4.Time spent on other relevant start-up activities	Coordinator	10	40.625	406.25
4.Time spent on other relevant start-up activities	MMHP subcontract for outreach and start-up	162.3	40.625	6593.44
4.Time spent on other relevant start-up activities	Program manager	2	75	150

Site 3

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Consultant	288	46.875	13500
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Other-Pediatric Psychiatrist	144	156.49	22534.34
4.Time spent on other relevant start-up activities	Administrator	136	87.5	11900
4.Time spent on other relevant start-up activities	Behavioral Health Consultant	110	46.875	5156.25
4.Time spent on other relevant start-up activities	Director	1400	59.375	83125
4.Time spent on other relevant start-up activities	Other-Pediatric Psychiatrist	48	156.49	7511.45
4.Time spent on other relevant start-up activities	Other-Psychiatrist	28	156.49	4381.68

Site 4

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Behavioral health consultant	30	40.625	1218.75
1. Time spent planning outreach prior to beginning outreach	Coordinator	5	40.625	203.125
1. Time spent planning outreach prior to beginning outreach	Director	20	150.24	3004.80
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral health consultant	240	40.625	9750
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Coordinator	16	40.625	650
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Director	8	150.24	1201.92
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral health consultant	120	40.625	4875
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Coordinator	12	40.625	487.5

Site 5

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Director - Medical	40	150.24	6009.62
1. Time spent planning outreach prior to beginning outreach	Program Manager	228	56.25	12825
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Consultant	96	40.625	3900
1. Time spent planning outreach prior to beginning outreach	Administrator	50	75	3750
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Consultant	96	40.625	3900
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Director - Medical	52	150.24	7812.5
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Program Manager	1140	56.25	64125
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Consultant	1248	40.625	50700
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Administrator	10	75	750
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Consultant	1000	40.625	40625
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Program Manager	400	56.25	22500
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Consultant	92	40.625	3737.5
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Consultant	138	40.625	5606.25
4. Time spent on other relevant start-up activities	Director - Medical	80	150.24	12019.23
4. Time spent on other relevant start-up activities	Program Manager	357	56.25	20081.25
4. Time spent on other relevant start-up activities	Behavioral Health Consultant	416	40.625	16900
4. Time spent on other relevant start-up activities	Administrator	150	75	11250
4. Time spent on other relevant start-up activities	Behavioral Health Consultant	416	40.625	16900

Site 6

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Specialist (LCSW)	120	40.625	4,875
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Specialist (LCSW)	124	40.625	5,037.5
1. Time spent planning outreach prior to beginning outreach	Coordinator	10	40.625	406.25
1. Time spent planning outreach prior to beginning outreach	Psychiatrists - Division Head	100	165.26	16,526.44
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Specialist (LCSW)	60	40.625	2,437.5
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Specialist (LCSW)	60	40.625	2,437.5
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Coordinator	10	40.625	406.25
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Specialist (LCSW)	100	40.625	4,062.5
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Specialist (LCSW)	200	40.625	8,125
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Coordinator	840	40.625	3,4125
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Psychiatrists - Asst/Assoc	100	150.24	15,024.03
4. Time spent on other relevant start-up activities	Behavioral Health Specialist (LCSW)	75	40.625	3,046.875
4. Time spent on other relevant start-up activities	Behavioral Health Specialist (LCSW)	85	40.625	3,453.125
4. Time spent on other relevant start-up activities	Coordinator	100	40.625	4,062.5
4. Time spent on other relevant start-up activities	Psychiatrists - Asst/Assoc	75	150.24	11,268.03
4. Time spent on other relevant start-up activities	Psychiatrists - Division Head	150	165.26	24,789.66

Site 7

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Director	10	162.5	1625
1. Time spent planning outreach prior to beginning outreach	Administrator	10	112.5	1125
1. Time spent planning outreach prior to beginning outreach	Assistant Director	30	162.5	4875

2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Director	32	162.5	5200
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Administrator	16	112.5	1800
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Assistant Director	80	162.5	13000
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Assistant Director	32	162.5	5200
4.Time spent on other relevant start-up activities	Assistant Director	12	162.5	1950

Site 8

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Director	5	150.24	751.20
1. Time spent planning outreach prior to beginning outreach	Program Manager	10	75	750
1. Time spent planning outreach prior to beginning outreach	Behavioral Health Consultant	20	40.625	812.5
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Consultant	240	40.625	9750
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Director	40	150.24	6009.62
2.Time spent conducting outreach from beginning of outreach up until "go-live" date	Program Manager	80	75	6000
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Behavioral Health Consultant	120	40.63	4875
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Director	0	150.24	0
3.Time spent enrolling clinics/PCPs from beginning of enrollment through now	Program Manager	40	75	3000
4.Time spent on other relevant start-up activities	Behavioral Health Consultant	10	40.625	406.25
4.Time spent on other relevant start-up activities	Director	5	150.24	751.20

4. Time spent on other relevant start-up activities	Program Manager	8	75	600
---	-----------------	---	----	-----

Site 9

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1. Time spent planning outreach prior to beginning outreach	Administrator	3	75	225
1. Time spent planning outreach prior to beginning outreach	Director	3	150.24	450.72
1. Time spent planning outreach prior to beginning outreach	Implementation lead	6	150.24	901.44
1. Time spent planning outreach prior to beginning outreach	Program Manager	36	56.25	2025
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Administrator	3	75	225
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Director	3	150.24	450.72
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Implementation lead	9	150.24	1352.16
2. Time spent conducting outreach from beginning of outreach up until "go-live" date	Program Manager	60	56.25	3375
3. Time spent enrolling clinics/PCPs from beginning of enrollment through now	Program Manager	12	56.25	675
4. Time spent on other relevant start-up activities	Administrator	8	75	600
4. Time spent on other relevant start-up activities	Director	8	150.24	1201.92
4. Time spent on other relevant start-up activities	Implementation lead	16	150.24	2403.85
4. Time spent on other relevant start-up activities	Program Manager	80	56.25	4500

Time-Driven Activity-Based Costing Model Results for TCHATT Procedure

Site 1

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Department Chair	128	147.24	18846.15
1) Time spent on planning outreach prior to beginning outreach	Medical Director	256	147.24	37692.31
1) Time spent on planning outreach prior to beginning outreach	Project Manager	74	55	4070
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Child and Adolescent Psychiatrist	52	180.29	9375
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Data Manager	72	56.25	4050
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Data Manager	48	56.25	2700
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Data Manager	24	56.25	1350
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Department Chair	160	147.24	23557.69
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Medical Director	320	147.24	47115.38
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program Coordinator	161	28.125	4528.125
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program Coordinator	320	28.125	9000
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Project Manager	372	55	20460
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Sr. Mental Health Clinician	480	40.625	19500
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Sr. Mental Health Clinician	320	40.625	13000
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Sr. Mental Health Clinician	160	40.625	6500
3) Time spent on enrolling ISDs from beginning of enrollment through now	Child and Adolescent Psychiatrist	1760	180.29	317307.7

3) Time spent on enrolling ISDs from beginning of enrollment through now	Child and Adolescent Psychiatrist	69	180.29	12439.9
3) Time spent on enrolling ISDs from beginning of enrollment through now	Data Manager	385	56.25	21656.25
3) Time spent on enrolling ISDs from beginning of enrollment through now	Data Manager	256	56.25	14400
3) Time spent on enrolling ISDs from beginning of enrollment through now	Data Manager	128	56.25	7200
3) Time spent on enrolling ISDs from beginning of enrollment through now	Department Chair	512	147.24	75384.62
3) Time spent on enrolling ISDs from beginning of enrollment through now	Medical Director	1024	147.24	150769.2
3) Time spent on enrolling ISDs from beginning of enrollment through now	Post Doctoral Fellow, Psychology	400	57.09	22836.54
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Coordinator	2570	28.125	72281.25
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Coordinator	2560	28.125	72000
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Coordinator	480	28.125	13500
3) Time spent on enrolling ISDs from beginning of enrollment through now	Project Manager	1191	55	65505
3) Time spent on enrolling ISDs from beginning of enrollment through now	PSS/CMA	1120	21.875	24500
3) Time spent on enrolling ISDs from beginning of enrollment through now	Psychologist	520	57.09	29687.5
3) Time spent on enrolling ISDs from beginning of enrollment through now	Sr. Mental Health Clinician	2560	40.625	104000
3) Time spent on enrolling ISDs from beginning of enrollment through now	Sr. Mental Health Clinician	2560	40.625	104000
3) Time spent on enrolling ISDs from beginning of enrollment through now	Sr. Mental Health Clinician	2560	40.625	104000

Site 2

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Program manager	10	59.375	593.75
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program manager	230	59.375	13656.25
3) Time spent on enrolling ISDs from beginning of enrollment through now	Behavioral Health Consultant	220	46.875	10312.5
3) Time spent on enrolling ISDs from beginning of enrollment through now	Data manager/care manager	352	56.25	19800
3) Time spent on enrolling ISDs from beginning of enrollment through now	Outreach coordinator	220	43.75	9625

3) Time spent on enrolling ISDs from beginning of enrollment through now	Program manager	220	59.375	13062.5
4) Time spent on other relevant start-up activities	Administrator	10	87.5	875
4) Time spent on other relevant start-up activities	Medical director	54	156.49	8450.377

Site 3

Steps	Resource	Estimated Activity Time	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Outreach coordinator	50	39.06	1953.125
1) Time spent on planning outreach prior to beginning outreach	Program manager	100	72.12	7211.5
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program manager	100	72.115	7211.54
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program manager	4	72.115	288.46

Site 4

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Administrator	30	112.5	3375
1) Time spent on planning outreach prior to beginning outreach	Medical Director	30	162.5	4875
1) Time spent on planning outreach prior to beginning outreach	Outreach coordinator	10	46.88	468.75
1) Time spent on planning outreach prior to beginning outreach	Program manager	100	25	2500
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Administrator	180	112.5	20250
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Medical Director	24	162.5	3900
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Outreach coordinator	360	162.5	58500
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program manager	360	25	9000

3) Time spent on enrolling ISDs from beginning of enrollment through now	Administrator	360	112.5	40500
3) Time spent on enrolling ISDs from beginning of enrollment through now	Care manager/Data manager	400	59.38	23750
3) Time spent on enrolling ISDs from beginning of enrollment through now	Outreach coordinator	400	46.88	18750
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program manager	400	25	10000

Site 5

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Administrator	40	36.35	1453.85
1) Time spent on planning outreach prior to beginning outreach	Behavioral Health Consultant	80	39.375	3150
1) Time spent on planning outreach prior to beginning outreach	Medical Director	40	169.62	6784.62
1) Time spent on planning outreach prior to beginning outreach	Program Manager	300	54.52	16355.77
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Behavioral Health Consultant	20	39.375	787.5
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Medical Director	20	169.62	3392.31
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program Manager	156	54.52	8505
3) Time spent on enrolling ISDs from beginning of enrollment through now	Behavioral Health Consultant	20	39.375	787.5
3) Time spent on enrolling ISDs from beginning of enrollment through now	Medical Director	20	169.62	3392.31
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Manager	120	54.52	6542.31
4) Time spent on other relevant start-up activities	Care Manager/Data Manager	60	54.52	3271.15
4) Time spent on other relevant start-up activities	Medical Director	8	169.62	1356.92
4) Time spent on other relevant start-up activities	Program Manager	120	54.519	6542.31

Site 6

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Administrator	20	87.5	1750
1) Time spent on planning outreach prior to beginning outreach	Director	30	165.26	4957.93
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Administrator	180	87.5	15750
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Director	360	165.26	59495.19
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program manager	360	56.25	20250
3) Time spent on enrolling ISDs from beginning of enrollment through now	Administrator	360	87.5	31500
3) Time spent on enrolling ISDs from beginning of enrollment through now	Director	345	165.26	57016.23
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program manager	345	56.25	19406.25
4) Time spent on other relevant start-up activities	Administrator	6	87.5	525
4) Time spent on other relevant start-up activities	Director	6	165.26	991.59
4) Time spent on other relevant start-up activities	Program manager	6	56.25	337.5

Site 7

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Administrator	50	52.31	2615.38
1) Time spent on planning outreach prior to beginning outreach	Behavioral health consultant	1	40	40
1) Time spent on planning outreach prior to beginning outreach	Program Manager	800	46.15	36923.08
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Administrator	10	52.31	523.08
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Behavioral health consultant	30	40	1200

2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program Manager	160	46.15	7384.62
3) Time spent on enrolling ISDs from beginning of enrollment through now	Behavioral health consultant	20	40	800
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Manager	200	46.15	9230.77
4) Time spent on other relevant start-up activities	Administrator	150	52.31	7846.15
4) Time spent on other relevant start-up activities	Behavioral health consultant	50	40	2000
4) Time spent on other relevant start-up activities	Program Manager	100	46.15	4615.38

Site 8

Steps	Resource	Estimated Activity Time (hrs)	Capacity Cost Rate (\$)	Total Cost (\$)
1) Time spent on planning outreach prior to beginning outreach	Administrator	4	46.875	187.5
1) Time spent on planning outreach prior to beginning outreach	Lead Clinician	16	150.24	2403.85
1) Time spent on planning outreach prior to beginning outreach	Medical Director	4	39.375	157.5
1) Time spent on planning outreach prior to beginning outreach	Program Manager	36	68.75	2475
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Administrator	40	46.875	1875
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Lead Clinician	24	150.24	3605.77
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Medical Director	40	39.375	1575
2) Time spent on conducting outreach from beginning of outreach up until "go-live" date	Program Manager	120	68.75	8250
3) Time spent on enrolling ISDs from beginning of enrollment through now	Lead Clinician	24	150.24	3605.77
3) Time spent on enrolling ISDs from beginning of enrollment through now	Medical Director	200	39.375	7875
3) Time spent on enrolling ISDs from beginning of enrollment through now	Program Manager	120	68.75	8250
4) Time spent on other relevant start-up activities	Administrator	8	46.875	375

4) Time spent on other relevant start-up activities	Lead Clinician	32	150.24	4807.69
4) Time spent on other relevant start-up activities	Medical Director	8	39.375	315
4) Time spent on other relevant start-up activities	Program Manager	80	68.75	5500

Appendix K. Proposed Manuscript

Proposed Manuscript Topic. Using Geospatial Techniques to Evaluate Access to the Child Psychiatry Access Network (CPAN) in Vulnerable Populations

INTRODUCTION

This proposal aims to use a statistical modeling approach to assess the accessibility of mental health services and identify populations with the least access to mental health care services and the most need for these services. Access to mental health services can be limited because either conditions are underrepresented due to less access to primary care physicians (PCPs) and psychiatrists to diagnose mental health conditions or not knowing individual patient's location makes it unclear whether a clinic reached a population in need. This scenario creates a gap of knowledge between need and access to mental healthcare, and thus this proposed project aims to fill this gap using geospatial modeling techniques.

As part of an initiative to reduce disparities in access to mental healthcare, the Texas Child Mental Health Care Consortium (TCMHCC) started the Child Psychiatry Access Network (CPAN) program that aims to connect primary care physicians to trained psychiatrists for consults or advice on how to treat patients with mental health concerns [3]. An objective of CPAN is to enroll clinics within vulnerable populations or areas where there is little access to local psychiatrists. Using geospatial techniques, this project aims to develop statistical modeling methods to evaluate access to mental health care consultations in vulnerable populations provided by CPAN and to identify areas most at risk to guide future expansion of CPAN to reach medically underserved areas.

A common geospatial technique that works to fill this gap is the two-step floating catchment area (2SFCA) model. This model is popular because it incorporates both supply and demand into measuring spatial accessibility of resources. Additionally, it can be applied to varying scenarios such as access to COVID-19 testing clinics [1] and access to healthcare facilities and PCPs [2]. However, the 2SFCA approach requires an informed catchment area barrier that best represents a grouping of people, such as driving distance to a healthcare facility or testing center. This usually means having access to individual's locations, which may not be available in many studies. Our proposed approach addressed this problem by using the locations of the service provider, which is generally available as public available information, instead of the individual patients address. Moreover, the Bayesian geospatial model we developed can address a number of practical issues, such as missing data and spatial correlation, hence has much broader applications.

METHODS

STUDY POPULATION

This study will focus on the 5,254 census tracts in Texas. Texas has a population size of about 28 million people, with approximately 25.5% children under 18 years old. [6]

DATA

We use two main data sources: the publicly available census tract SVI data from the CDC [4] and clinic location data from the TCMHCC external evaluation team at the University of Texas Health Science Center at Houston.

The CDC SVI data includes data points for 15 variables from the U.S. Census for each of the 5,254 census tracts in Texas as well as four composite scores, and raw SVI scores and percentile rankings. The four composite scores correspond to socioeconomic status, household composition & disability, minority status & language, housing type & transportation. The raw SVI score are then calculated from these four composite scores and assigned their corresponding percentile ranking within Texas. [5] However, 45 census tracts were missing a raw SVI score either due to small population estimates or inability to collect the Census Bureau's American Community Survey (ACS) at those locations. These missing values will later be imputed using the INLA package.

The second data source will be provided by the Texas Child Mental Health Care Consortium (TCMHCC) external evaluation team at the University of Texas Health Science Center at Houston. This is a restricted dataset that includes only active clinics enrolled in CPAN and their clinic names and addresses. To find corresponding latitude and longitudes for each clinic, a Google geocode API will be utilized to extract this information.

STATISTICAL ANALYSIS

Our proposed method to evaluate access to care uses a two-step approach. Step 1 is to use the locations of the active CPAN clinics to quantify the accessibility. Step 2 is to use a multinomial logistic regression to assess the relationship between clinic access and SVI.

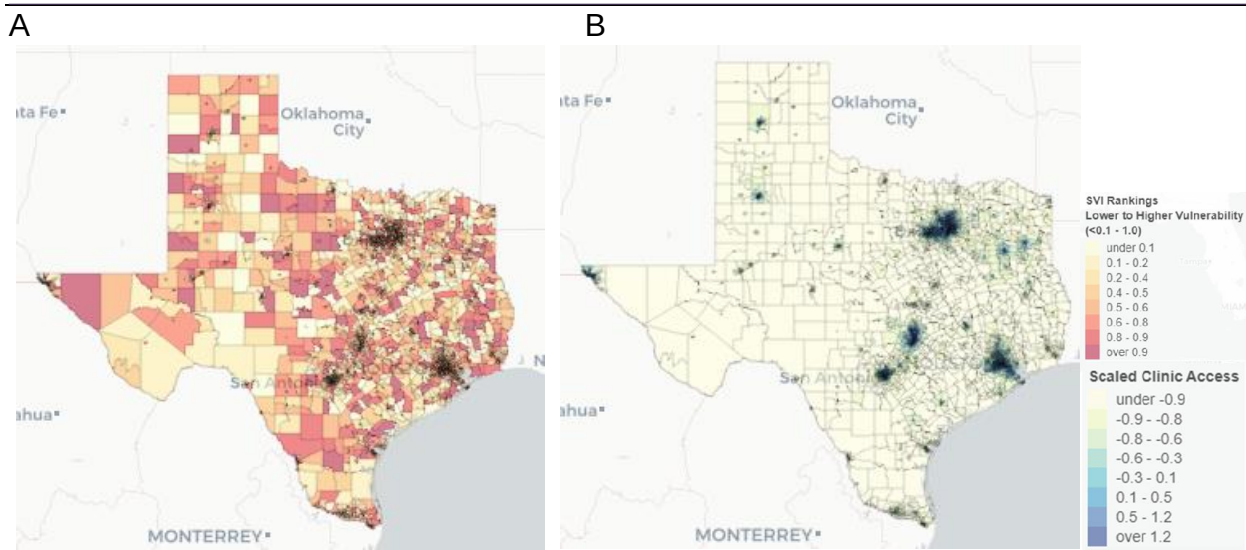
The first step uses the location of active CPAN clinics (Figure 1 (B)) and creates an "access surface" using the kernel density estimation approach. After this step, each location in the study region will have an estimate for access to a CPAN clinic, and area-level summaries (e.g., census tracts) can be obtained.

The second step is to use a multinomial model to quantify the association of area-level access summaries obtained from Step 1, and the measures of population vulnerability. For the latter, we use the 2018 Social Vulnerability Index (SVI) score provided by the Center for Disease Control (CDC) [4]. SVI is available at census tract level, which are subdivisions of counties at which the Census Bureau collects data on population, demographics, and other social determinants of health. Social Vulnerability Scores are calculated using 15 U.S. census variables focusing on socioeconomic status, household composition, demographics, and housing and transportation and are primarily used in preparation for natural disasters [5]. We extracted the SVI for all census tracts in TX (Figure 1(A)), and these scores represent the need for mental health care services in Texas. The challenge with directly using the SVI is that there are missing values. Among the total of 5,254 census tracts, we have 45 census tracts without an SVI score. To solve this problem, we

used a Bayesian spatial model to impute the missing SVI, where the imputation was done by borrowing information from the other census tracts.

After obtaining census tract level of accessibility to CPAN clinics, and the complete SVI scores, we performed a multinomial model to quantify the association between accessibility and SVI and identify the census tracts that have the lowest access predicted by the SVI score for that census tract. In the multinomial model, clinic access kernel-density estimates will be separated into five equal groups: extremely low, low, medium, sufficient, and high access. SVI, similarly, will be separated into five equal groups: extremely low, low, medium, sufficient, and high vulnerability. This multinomial model will use medium access and medium vulnerability as reference groups. Odds ratios comparing accessibility groups and SVI groups will be calculated, along with their 95% confidence intervals.

Figure 1: SVI Percentile Rankings (A) and Averaged-Scaled Clinic Density Estimates (B)



Proposed Manuscript for Publication:

We propose to write the following manuscript based on the data and modeling approach described above for publication.

Working Title: A Bayesian spatial approach to evaluate access to child psychiatry service in vulnerable populations using Texas Child Psychiatry Access Network (CPAN)

Authors (Order TBD):

Lead: Deason, Jeanette E*, Peskin, Melissa F., Savas, Lara S., Moore, Quianta L., Klotz, Jacqueline N., Bauer, Cici X (Corresponding).

REFERENCES

1. Tao, R., Downs, J., Beckie, T. M., Chen, Y., & McNelley, W. (2020). Examining spatial accessibility to COVID-19 testing sites in Florida. *Annals of GIS*, 26(4), 319–327. <https://doi.org/10.1080/19475683.2020.1833365>
2. Pan, X., Kwan, M. P., Yang, L., Zhou, S., Zuo, Z., & Wan, B. (2018). Evaluating the Accessibility of Healthcare Facilities Using an Integrated Catchment Area Approach. *International Journal of Environmental Research and Public Health*, 15(9), 2051. <https://doi.org/10.3390/ijerph15092051>
3. Texas Child Mental Health Care Consortium. (n.d.). Retrieved from <https://tcmhcc.utsystem.edu/>
4. CDC/ATSDR SVI Data and Documentation Download. (2021, April 28). Retrieved from https://www.atsdr.cdc.gov/placeandhealth/svi/data_documentation_download.html
5. CDC SVI Documentation 2018. (2020, August 12). Retrieved from https://www.atsdr.cdc.gov/placeandhealth/svi/documentation/SVI_documentation_2018.html
6. U.S. Census Bureau QuickFacts: Texas. (2019). Census Bureau QuickFacts. <https://www.census.gov/quickfacts/fact/table/TX/PST040219#PST040219>