Cautious Optimism: Service Patterns in the Child and Adolescent Mental Health Division During the COVID-19 Pandemic

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Introduction

Since 2020, the coronavirus pandemic has led to considerable life disruption for young people, bringing with it concerns regarding mental health impacts, treatment utilization, treatment outcomes, and other public health challenges. School closures and limits on organized social activities have impacted the educational and psychosocial development of children worldwide.[1] National research warns us to anticipate widespread increases in suicidal ideation, self-harm, depression, and anxiety in youth and adolescents.[2,3] Research also suggests that we might see increases in stress,[4] depression, and substance use among caregivers,[5] as well as greater risks of family violence,[6] intimate partner violence,[7] and adverse childhood experiences.[8]

Children, youth, and families in Hawaiʻi seem to be experiencing many of the same challenges as those seen nationally. In May 2021, a community survey of 117 caregivers found that 46% of respondents indicated the pandemic has had a negative impact on the mental health of their children.[9] A little over half of these caregivers indicated their child(ren) were exhibiting feelings of depression (58%) and anxiety (57%).

Access to effective mental health services during and after periods of community stress is essential for youth and family well-being. Across the state of Hawaiʻi, the Department of Health's Child and Adolescent Mental Health Division (CAMHD) provides mental health services for thousands of eligible youth and their families with serious emotional and behavioral challenges. Services include assessment, case management, and an array of intensive therapeutic support provided in the home and community or in temporary out-of-home placements. Throughout the pandemic, the CAMHD and its contracted providers have relied heavily on telehealth technology to ensure that mental health services could be provided to youth and families with limited disruption. The goals of this column are to report youth enrollment, functional impairment at intake, and treatment progress patterns in the CAMHD before and after the start of the COVID-19 pandemic and to recommend next steps in ensuring continuous access to effective mental health services for young people in Hawaiʻi.

The CAMHD Youth Enrollment

Figure 1 displays the CAMHD open case counts (enrollment) for each month in the year before and after the start of the COVID-19 pandemic (set at March 1, 2020, since the first presumptive positive case in Hawaiʻi was identified in early March). The expected open case numbers based on the one-year pre-COVID-19 pattern are displayed. Although monthly enrollments vary historically, the onset of the pandemic saw a noticeable drop in the CAMHD cases (54% decrease in applications from March to April 2020), primarily due to fewer new referrals for treatment. Naturally as cases are closed, the total caseload continues to decline. Application numbers began to increase in the summer of 2020 but remained low compared to the corresponding month in the prior year. The recent increase in referrals might relate to the return of in-person schooling and the loosening of social gathering restrictions for many youth. That said, there is no indication of a greater number of new youth and family applications, which would be predicted by both the stressors and mental health challenges posed by the pandemic and the presumed pent-up demand given the nearly year-long service utilization reductions. Thus, the CAMHD has instituted a variety of outreach efforts to increase access and utilization, including expanded statewide campaigns such as Children's Mental Health Awareness Month (for more information visit https://health.hawaii.gov/camhd/cmha21/), community and media appearances by advocates within the CAMHD, partnerships with provider agencies in pro-active screening, and promotion of its public health information web pages and social media accounts (@CAMHDHAWAII).

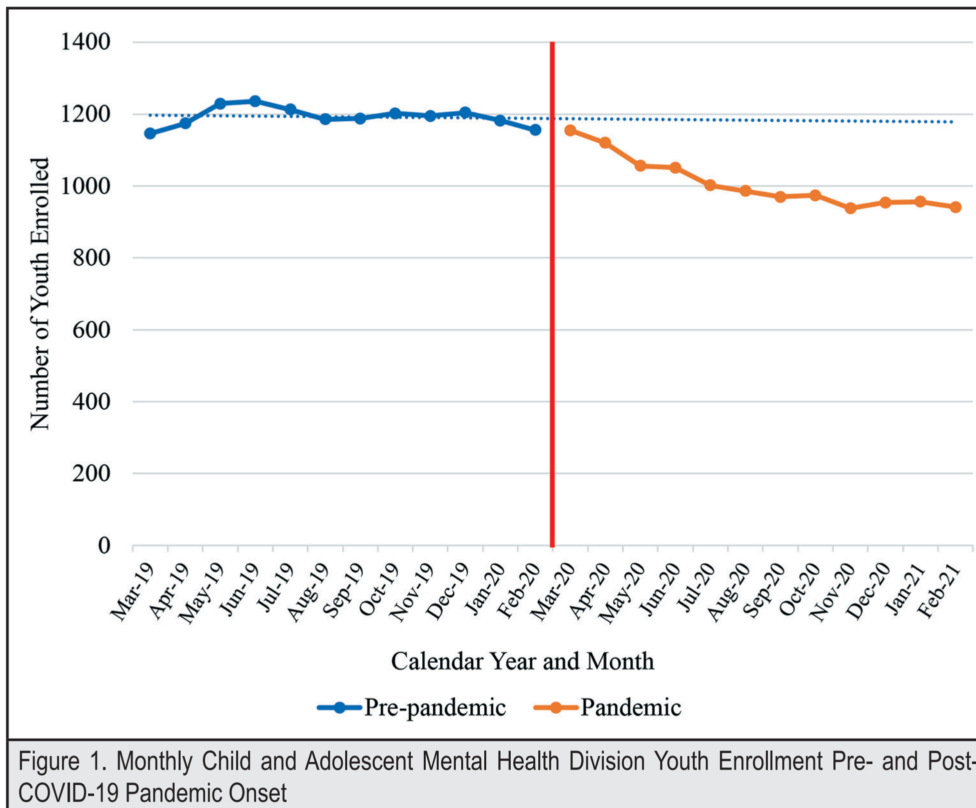

Figure 1. Monthly Child and Adolescent Mental Health Division Youth Enrollment Pre- and Post-COVID-19 Pandemic Onset

Note. COVID-19 onset date set at March 1, 2020. Dotted blue line reflects anticipated linear trend based on 12-month pre-COVID patterns. Enrollment refers to number of open cases within the CAMHD in the given month.

Youth Clinical Status at the CAMHD Entry

Given reported increases in mental health challenges for young people, both locally and nationally, it is natural to expect similar increases in the initial severity of clinical problems for clients entering mental health services. The CAMHD routinely collects and monitors standardized measures of youth status, at intake and periodically throughout treatment. The Child and Adolescent Functional Assessment Scale (CAFAS) is completed by the assigned care coordinator and assesses functional impairment over the preceding 90 days across multiple domains (School, Home, Community, Behavior Toward Others, Moods/emotions, Self-Harm, Substance Use, and Thinking).[10,11] The Ohio Scales Problem Severity scale, Parent Form assesses emotional and behavioral problems and is completed monthly by caregivers.[12] Lower scores indicate fewer challenges and problems (CAFAS range 0-240 and Ohio Scales Problem Severity Scale range 0-100). Both measures have demonstrated reliability and validity in numerous large, community studies including as used in the CAMHD.[13-17]

Figure 2 displays initial total (1) functional impairment (CAFAS) and (2) parent-reported problem severity (Ohio Scales) scores for children and youth admitted during each of the 12 months preceding and following the beginning of the COVID-19 outbreak. While the CAMHD anticipated serving more highly impaired youth with more severe emotional and behavioral problems during the pandemic (ie, higher initial scores), that has not manifested in the data. Instead, the average functional impairment scores (CAFAS) are about the same compared to the prior 12 months and are lower than expected given the upward linear trend projected from the prior 12-month pattern. Similarly, initial levels of emotional and behavioral problems (Ohio Scale) have not considerably changed after COVID-19 onset. These trends might be related to (among other things) limited opportunity for youth to engage in problematic behavior or fewer occasions for adults or caregivers to observe such behavior. Thus, these patterns need to be interpreted with caution. That said, the clinical meaning is mixed. On one hand, new youth in the CAMHD are not reporting unusually high levels of symptoms or functional impairment as initially predicted. On the other hand, given lower enrollment in the CAMHD and the likely higher levels of societal stress, these same data (the absence of a bump up in scores) suggest that there are a good number of youth and families in need who are not entering services with the CAMHD. With the lessening of COVID-19 restrictions, behavioral health services might anticipate increases in demand and should likely prepare for such an increase.

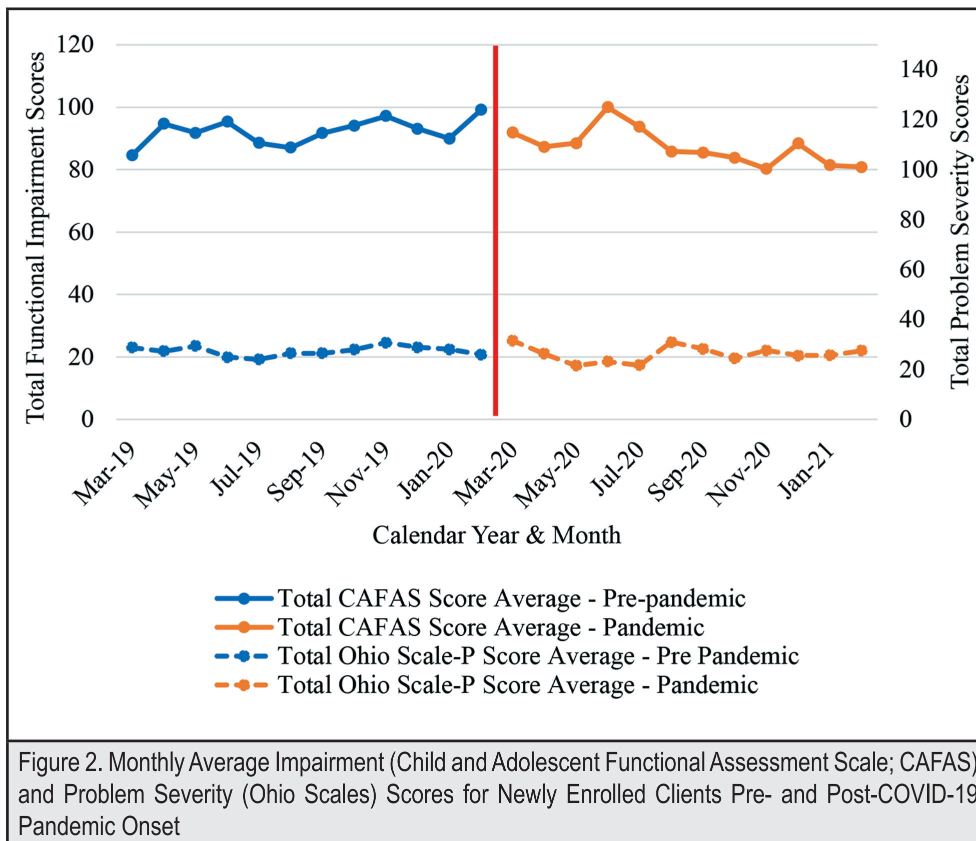

Figure 2. Monthly Average Impairment (Child and Adolescent Functional Assessment Scale; CAFAS) and Problem Severity (Ohio Scales) Scores for Newly Enrolled Clients Pre- and Post-COVID-19 Pandemic Onset

Note. COVID-19 onset date set at March 1, 2020. Impairment scores derived from CAFAS total scores (range 0 -240) and severity scores derived from Ohio Problem Severity Scale – Parent Form (range 0 – 100). Number of CAFAS responses each month ranged from 30 to 73 and number of Ohio Problem Severity Scale – Parent Form responses each month ranged from 19 to 67.

Treatment Progress for the CAMHD Youth

Figure 3 utilizes data from routine system outcome reporting to examine treatment progress for clients in the CAMHD, comparing the periods before and after the start of the COVID-19 pandemic. The pre-and post-COVID onset scores are similar in pattern. During each time period, clients' initial assessment score, final assessment score, and the amount of improvement over time are relatively comparable. This can tentatively be interpreted as a considerable success for clients, the CAMHD, and its provider partners, particularly considering the added COVID-19 related stressors and additional barriers to treatment. Whether or not treatment progress patterns will be sustained through the evolving stages of the pandemic are unknown and should be tracked.

Conclusions and Recommendations

While the CAMHD enrollment rates following the initial COVID-19 outbreak have been lower than expected, there is some evidence that they are slowly returning to baseline. However, given known community stress and impairment levels and a period of lower utilization, the need for the CAMHD services is likely to be higher than it was pre-COVID. Level of youth impairment at entry to the CAMHD has not changed and positive treatment progress remains comparable.

Overall, these findings can be interpreted with both caution and optimism. While the reported data is solely from the CAMHD, it provides insight on mental health services among youth affected by the pandemic. Lower service utilization during presumed increased community need suggests that some youth and families who could benefit from these services are not getting them or being served by other means (eg, outpatient therapy, school counseling, primary care, self-help). These lowered utilization rates also suggest that there might be a built-up need (and eventual demand) for services both due to COVID-19 related stressors and the under-identification of youth and families due to reduced opportunities for adults to observe problem behaviors. On the positive side, youth who are treated by the CAMHD and its provider agencies during the pandemic present with similar levels of functional impairment and show comparable progress over the course of treatment. Ongoing monitoring of such patterns of enrollment and outcomes by the CAMHD and other child-serving entities will be vital in the next stages of the pandemic so that policymakers and administrators can rapidly adjust interventions as needed.

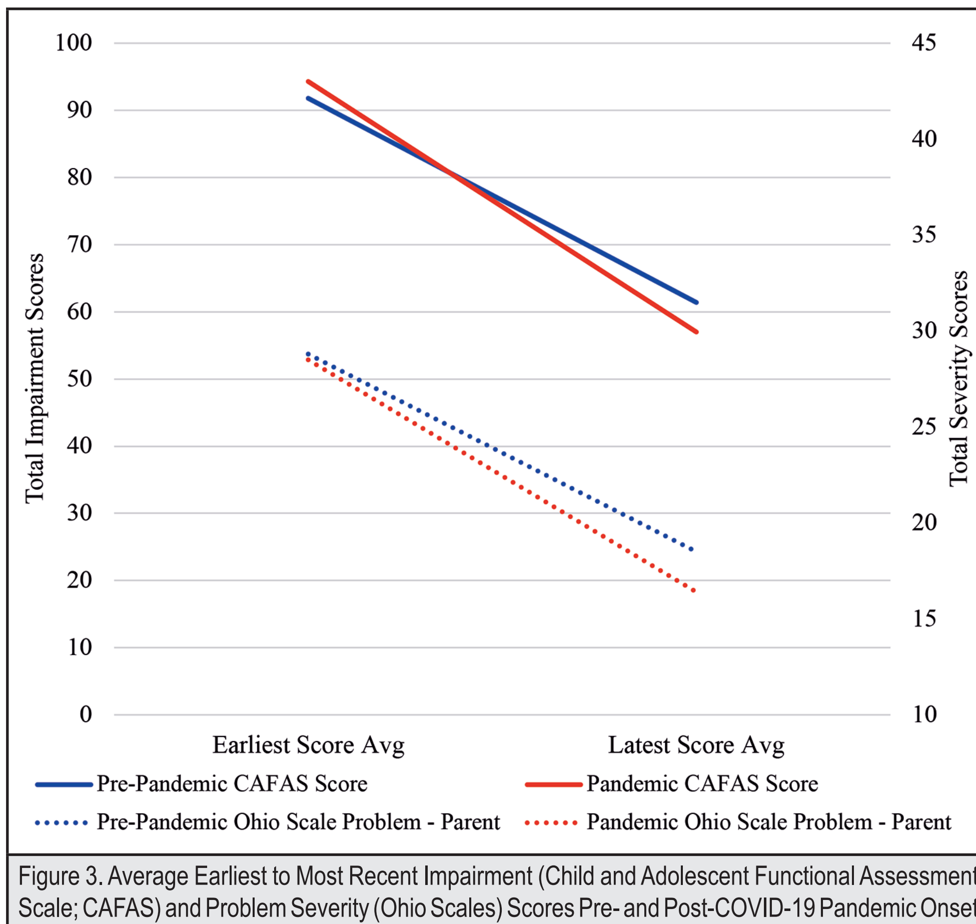

Figure 3. Average Earliest to Most Recent Impairment (Child and Adolescent Functional Assessment Scale; CAFAS) and Problem Severity (Ohio Scales) Scores Pre- and Post-COVID-19 Pandemic Onset

Note. COVID-19 onset date set at March 1, 2020. Impairment scores derived from CAFAS total scores (range 0 -240) and severity scores derived from Ohio Scales Problem Severity Scale – Parent Form (range 0 – 100). CAFAS Pre-Pandemic N = 402; Post-Pandemic N = 592. Ohio Scales Problem Severity Scale - Parent Form Pre-Pandemic N = 493, Post-Pandemic N = 364

At a broader level, and despite the numerous challenges posed by COVID-19, the pandemic has served as a stimulus for moving mental health systems of care forward by expanding the provision of, and demand for, telehealth services. Since the start of the pandemic, telehealth services have been offered to virtually all clients in the CAMHD, when clinically indicated. The CAMHD's early adoption of telehealth services has been a crucial mechanism for maintaining effective treatment services. Not only did this decrease treatment barriers for clients, but it also allowed therapists on different islands to serve youth and families more readily in geographical locations with therapist shortages. Importantly, a large body of research suggests that clinical outcomes within telehealth are equivalent to standard care.[18] While telehealth has helped to facilitate access to services, it continues to be a challenge for many families with limited internet access or hardware, difficulty in navigating the technology, challenges with developing rapport with treatment teams in a virtual context or struggles in helping children sustain attention for sessions. There is still a need for the child- and youth-serving systems to determine how best to maximize telehealth by understanding and identifying the optimal conditions for each client. For example, this might include considering blended therapy formats (ie, part telehealth, part in-person), decreasing session lengths while increasing session frequency, creatively engaging clients via online platforms, and incorporating different technology tools (eg, texting, therapy applications).

The pandemic has also led to the heightened importance of easily accessible, virtual, mental health informational resources for children, youth, families, and their providers. The locally-developed Help Your Keiki website (helpyourkeiki.com) had already been serving as a hub for evidence-based self-care resources, information on common problems, treatments that have proven to work, and ways to seek help when needed. At the onset of the pandemic, the CAMHD's Evidence-Based Services Committee recognized the need for a central location of resource links on youth and family mental health during COVID-19 and began updating the Help Your Keiki page and social media accounts with relevant local and national information (https://www.helpyourkeiki.com/covid19; @helpyourkeiki on Instagram). While these recent page updates were built for the initial stress of the pandemic, such resources might benefit

from long-term strategic communication planning to ensure that families in need can both quickly find and easily access mental health information and services.

Children, youth, and families have arguably been the most impacted by the pandemic and there is a clear opportunity to strengthen the mental health system of care during the current crisis. Certainly, every effort must be made to monitor ongoing service patterns and continue to break down barriers to mental health access.

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