ATTACHMENT STYLE AND TREATMENT-SEEKING BEHAVIOR IN THE TELEMENTAL HEALTH CONTEXT

A Dissertation

by

KENDALL CHEYENNE JOHN

Submitted to the Graduate and Professional School of
Texas A&M University
in partial fulfillment of the requirements for the degree of

DOCTOR OF PHILOSOPHY

Chair of Committee,	Carly McCord
Co-Chair of Committee,	Gerianne Alexander
Committee Members,	Robert Heffer
	William S. Rholes
Head of Department,	Mindy Bergman

August 2022

Major Subject: Clinical Psychology

ABSTRACT

Telemental health modalities have been increasingly adopted over the past several years, creating more choices for treatment seekers pursuing psychotherapy. This study uses a mixed-methods approach to examine how attachment style impacts treatment-seeking behavior in the context of telemental health services such as videoconferencing, phone, and messaging psychotherapy. A total of 24 psychotherapy clients and 195 university students were recruited to participate in a survey of their attitudes about telemental health. The results include that the best predictor of telehealth participation is previous telehealth experience, along with preliminary evidence that attachment anxiety increases willingness to engage in treatment across telemental health modalities. Qualitative analysis reveals that individuals consider individual differences, accessibility, technology, sensation and perception, time, environment, treatment efficacy, relationship factors, individual factors, communication, and ease when evaluating psychotherapy modalities.

ACKNOWLEDGEMENTS

I would like to thank my committee chair, Dr. McCord, my co-chair, Dr. Alexander, and my committee members, Dr. Heffer and Dr. Rholes, for their guidance and support throughout the course of this project. Thanks also to my cohort and dear friends, Namrata Nanavaty, Tristin Nyman, and Tim Regan, for their support and comradery throughout graduate school alongside all the other friends we made. Finally, I would like to thank my husband, Riley John, for his love, support, and faith in me throughout this endeavor.

CONTRIBUTORS AND FUNDING SOURCES

Contributors

This work was supervised by a dissertation committee consisting of Professor Carly McCord of the Departments of Psychiatry and Behavioral Science and Educational Psychology and Professors Gerianne Alexander, Robert Heffer, and William S. Rholes of the Department of Psychological and Brain Sciences. All work for the dissertation was completed by the student under the advisement of Dr. Carly McCord.

Funding Sources

There are no outside funding contributions to acknowledge related to the research and compilation of this document.

TABLE OF CONTENTS

Page

Page

Page

LIST OF FIGURES

Page

LIST OF TABLES

Page

Page

1. INTRODUCTION

Telemental health describes new modes of mental health services using telecommunication devices, such as phones and computers. This sector of mental health services has grown rapidly because of COVID-19 and includes relatively recently adapted modes of psychotherapy like videoconferencing psychotherapy, phone psychotherapy, and messaging psychotherapy. With the shift in available mental health resources that COVID-19 caused, a need exists to examine how treatment seekers will evaluate and adopt these new modalities. This study aims to uncover what factors individuals consider when evaluating their many options for receiving psychotherapy, including telemental health modalities. In addition, this study aims to extend the current research on how attachment theory impacts treatment-seeking behavior to telemental health modalities by examining how attachment style impacts willingness to engage in different telemental health modalities.

1.1. Attachment Theory

Attachment Theory is a theory of interpersonal and intrapersonal patterns with developmental roots. John Bowlby (1977) found that children interacted with their parents in predictable patterns. These repeated experiences, over time, allow a child to develop a theory of their self, the world, and how to operate in the world. If caregivers are responsive, the world is viewed as a safe place in which individuals can enact their thoughts, motivations, goals, and lives. However, if a caregiver is unresponsive or unpredictable, children experience the world as unpredictable and have less opportunity to integrate a well-integrated theory of self from which to operate in the world. The

working models generated from these childhood experiences, called attachment style, have important implications for emotional regulation, interpersonal relationships, and resilience to life's stressors.

The many different taxonomies that have been proposed for attachment theory since its conception in the 1960s complicate the current research on attachment theory (Mikulincer & Shaver, 2007). Therefore, a brief overview is necessary to provide context for interpreting research that relies upon different taxonomic frameworks. Attachment theory is predicated on the idea that people have "attachment needs," or interpersonal needs, such as the need for closeness, support, and a felt sense of security. These needs are activated by the perception of a threat to an individual or their relationships and are met by making a connection with an attachment figure.

Attachment style can be conceptualized first with two categories: secure attachment and insecure attachment. Individuals with secure attachment receive reliable, predictable caregiving and thus tend to show resilience in the face of life challenges, regulate their emotions effectively, and interact and communicate with others well. Insecure attachment is learned through thwarted attempts to seek comfort and proximity from the attachment figure. When an attachment figure is not reliably responsive to their needs or cues, children develop alternative strategies to manage their attachment needs for closeness and comfort. It is primarily within the construct of insecure attachment that many revisions and modifications have been made throughout the years.

Insecure attachment is further subdivided based on an individual's coping style with unmet attachment needs. The two primary strategies for coping with unmet

attachment needs are often referred to as attachment avoidance or attachment anxiety. Attachment avoidance is characterized by attempts to deactivate attachment needs or ignore internal or external distress signals in which one would seek support from an attachment figure. The strategy of attachment avoidance has been most often given the categorical label of "avoidant attachment style" in previous research, such as the seminal work of Mary Ainsworth and the Strange Situation task (Ainsworth et al., 1978). Attachment anxiety is the inverse strategy, characterized by the hyperactivation of attachment needs, over attending to internal and external distress signals, and increasing efforts to obtain support from an attachment figure. Those with high attachment anxiety have also been referred to as having a preoccupied, anxious, or ambivalent attachment style (Bartholomew, 1990; Hazan & Shaver, 1987). Other styles, such as disorganized attachment, have also been proposed (Ainsworth et al., 1978; Main & Solomon, 1990; Paetzold et al., 2015) but are typically found to have low base rates, making them beyond the scope of the current study.

The study of attachment style has gradually shifted from a categorical taxonomic structure to a dimensional one, keeping with paradigm shifts in the studies of personality and mental health (Haslam, 2003; Huprich & Bornstein, 2007; Widiger, 1992). Fraley and Waller (1998) found that attachment is best assessed using dimensional measures, which allows for attachment anxiety and avoidance to be used as distinct continuous predictors. The most common self-report measures used in modern studies of attachment theory, including the Experiences in Close Relationships Scale (ECR), look at

attachment anxiety and attachment avoidance as two-dimensional constructs (Brennan et al., 1998).

This project will use this dimensional conceptualization of attachment, in which attachment avoidance and attachment anxiety are looked at as two distinct dimensions on which one, both, or neither can be elevated in any given individual (Fraley et al., 2015; Fraley & Waller, 1998; Griffin & Bartholomew, 1994). So, rather than discussing those with an "anxious attachment style," this study will discuss those who have "high attachment anxiety." In this conceptualization, secure attachment is reflected by low attachment anxiety and low attachment avoidance.

Attachment patterns are relatively stable, though changeable, over time (Sroufe, 2005) and generalize to new and novel adult relationships such as romantic partners or therapists (Brumbaugh & Fraley, 2006, 2007). For instance, in a land-mark study of attachment in adult romantic relationships, Simpson and Rholes (1992) found that in an anxiety-invoking situation, women with a secure attachment style tend to seek out greater support from their romantic partner as their level of anxiety rose, while women high in attachment avoidance seek out less support from their attachment figures (e.g., their male romantic partners) as their anxiety rose. Within the men, those with a secure attachment style offered more support as their partner displayed greater anxiety, whereas men with high attachment avoidance offered less support as anxiety increased within their partner.

Attachment patterns are observed across cultures, with measures such as the ECR validated in more than 17 languages (Mikulincer & Shaver, 2007). However, it is

essential to note that attachment strategies may be interpreted differently within different cultural contexts (Brown et al., 2008; Van Ijzendoorn & Sagi-Schwartz, 2008). For example, individualistic cultures that value independence and autonomy in functioning may be more like to attribute help-seeking behaviors and co-regulation emotional strategies that involve getting support from others as signals of insecure attachment or maladaptive coping, whereas collectivist cultures may be more likely to consider those strategies effective and appropriate signals of secure attachment (Brown et al., 2008).

1.1.1. Attachment Theory and Mental Health Services

Attachment style has long been applied to the therapeutic context, most often to examine the concepts of therapeutic alliance and treatment-seeking behavior. Secure attachment style is associated with stronger therapeutic alliance (Diener & Monroe, 2011), which is the most robust predictor of positive change in therapy (Flückiger et al., 2018; Martin et al., 2000). Conversely, meta-analytic data show that attachment anxiety and attachment avoidance are associated with weaker therapeutic alliances (Bernecker et al., 2014).

Attachment style has been shown to be changeable with therapeutic treatment (Mikulincer et al., 2013), and there are theories of psychotherapy that conceptualize attachment style as the agent of change within the therapeutic context. For instance, Emotion-Focused (or Emotionally-Focused) Therapy (Johnson, 2019; Johnson & Greenberg, 1992) aims to use the attachment style to help conceptualize dysfunction in adult relationships and uses the therapist as an attachment figure or "secure base" from which clients can implement a more functional working model of the self and improve

their relationship functioning. Other therapeutic approaches, such as Schema Therapy (Young et al., 2003), posit that the common factor of the therapeutic relationship increases positive working models within the client by responding to specific patterns of attachment in corrective ways (Levy & Johnson, 2019; Mallinckrodt, 2010; Mallinckrodt & Jeong, 2015). In short, attachment style is stable over time but changeable with experience.

In addition to providing a lens for case conceptualization within psychotherapy, attachment style has also been used to examine treatment-seeking behavior. People with anxious attachment styles, marked by the pursuit of closeness and comfort, utilize healthcare services at a higher rate than those with secure or avoidant styles (Berry et al., 2014; Ciechanowski et al., 2002). This is consistent with the notion that people with high attachment anxiety over attend to signals of internal distress and increase efforts to obtain the support of others, while those with avoidant attachment style are more likely to ignore signs of distress and devalue the importance of others when in need (Vogel & Wei, 2005). As such, it is not surprising that high attachment avoidance is associated with decreased treatment-seeking behavior (Lopez et al., 1998) as well as lower treatment motivation while engaging in treatment (Tekin et al., 2021).

COVID-19 also had an impact on treatment seeking-behavior. A recent study demonstrated a significant decrease in missed psychotherapy appointments in a hospital outpatient setting during the COVID-19 pandemic (Silver et al., 2020). One hypothesis proposed for this finding is that the implementation of telehealth removed logistic barriers to attendance, which is undoubtedly supported by the evidence discussed in the

following section. However, the authors also hypothesize that perhaps there was an increased need for interpersonal interaction during stay-at-home orders that led to this decrease in missed appointments. This would suggest that the events around COIVD-19 served as an attachment threat that activated the need to seek closeness or comfort from others.

1.1.2. Attachment Theory and Digital Relationships

Unsurprisingly, the bulk of attachment theory research has predominately been limited to studying in-person rather than online digital relationships. However, there is some preliminary evidence that attachment style influences interpersonal behavior in online, digital relationships as well. Though this area of research has yet to expand to the online therapeutic relationship, other digital relationships such as anonymous interview forums, online video game play with friends, online dating, and social media use can be considered (Blackhart et al., 2014; Chin et al., 2019; Hart et al., 2015; Ye, 2007).

Multiple studies examining anonymous forums found that those with a fearful attachment style (high anxiety and high avoidance) self-disclosed more online than those with secure, preoccupied, and avoidant attachment styles (Buote et al., 2009; Ye, 2007). Researchers speculated several reasons for this difference, including that perhaps those with a fearful attachment style were less concerned with online safety and privacy or that those with a fearful style used online self-disclosure as a substitute for insufficiently met in-person social needs. In addition, those with a preoccupied (high anxiety) style did not significantly differ in their ratings between satisfaction with in-person or online friendships. While the other attachment styles reported greater satisfaction with in-

person friendships, preoccupied individuals were equally dissatisfied with both types of relationships (Buote et al., 2009). This is consistent with the notion that those high in attachment style feel that their attachment figures will not be sufficient to meet their needs.

A study of video game play found that attachment style did not relate to a preference for playing video games in-person versus online but did find that those with an insecure attachment style were more likely to use gameplay for social comfort, while secure attachment styles used online gameplay for entertainment. In contrast to anxious and secure individuals, avoidant individuals preferred online game play for social comfort to in-vivo game play (Kowert & Oldmeadow, 2014). These researchers suggest that the anonymity of online play may be a qualitative difference that may allow those with avoidant attachment to have needs for social closeness met without the intimacy of in-person interactions.

Another online relationship in which attachment style has been examined is the use of online dating apps. Online dating has more in common with telemental health therapy modes than previous examples as it is typically not anonymous, involves the expectation of vulnerable self-disclosure, and may activate attachment needs. Chin et al.'s (2019) study of attachment's impact on online dating behavior found that individuals who scored high on attachment anxiety self-reported higher use of dating apps than those who scored low on attachment anxiety. However, they found a discrepancy between self-report use of dating apps and actual behavior, and those with high attachment anxiety did not differ from those with low attachment anxiety in their

actual dating app use. The concept of anxious ambivalence, the ambivalence between wanting connection and fearing rejection, may explain this discrepancy between anxiously attached participants' self-reports and behavior. On the other hand, attachment avoidance was associated with a lower self-reported likelihood of using a dating app and lower actual use of dating apps (Chin et al., 2019).

Finally, social media is another type of telecommunication that could provide insight into how the digital nature of communication may influence the interpersonal styles of those with different attachment styles. Attachment anxiety is associated with more engagement on Facebook (e.g., posting more, "liking" others' posts more, etc.) (Hart et al., 2015) as well as excessive, "addiction-like," Facebook use (Vaillancourt-Morel et al., 2020). Likewise, people with anxious and disorganized attachment styles (i.e., high in attachment anxiety) were most likely to endorse perceiving social networking interaction as intimate and use social networking sites as a substitute for in-person interactions (Nitzburg & Farber, 2013). However, the relationship between attachment avoidance and social media is more ambiguous. Attachment avoidance was not associated with restricted Facebook use, as one might expect. Hart et al. (2015) hypothesized that the interpersonal distance afforded by using social media did not produce the same attachment threat that in-person relationships produce.

These examples demonstrate that attachment style does influence digital interpersonal interactions. There is also significant evidence that attachment style influences treatment-seeking behavior in wider healthcare use and specifically within mental healthcare. As mental health care branches into the digital world, it is essential to

see how these contexts intersect and how attachment style might influence treatment-seeking within telemental health.

1.2. Telemental Health

Telehealth is an umbrella term covering the delivery of health services at a distance. The Department of Health and Human Services defines telehealth as "the use of electronic information and telecommunications technologies to support and promote long-distance clinical health care, patient and professional health-related education, and public health and health administration" (What Is Telehealth?, 2020). It includes three broad modalities including the real-time provision of care in which patient and provider meet in real-time, the "store and forward" provision of care, in which information is sent digitally between patient and provider, and remote patient monitoring, in which a patient uses monitoring equipment that transmits health information to the provider.

Telehealth is a resource that continues to close gaps in the provision of health services well beyond those created by the COVID-19 pandemic. Increased access to telehealth has reduced disparities for rural populations (Hirko et al., 2020) and increased access for people living with long-term chronic illnesses or disabilities (Valdez et al., 2021).

Telemental health, a term used throughout this study, is a more specific discipline defined as "mental health and substance abuse services provided from a distance" (American Hospital Association, 2015). As with telehealth, this encompasses a broad scope of providing care (including real-time care, "store and forward" care, and remote monitoring discussed previously) and facilitating mental health education and

administration. Telemental health includes synchronous services such as real-time audio and videoconferencing psychotherapy and asynchronous services such as messaging psychotherapy and computer-assisted psychotherapy. This study examines three modalities of telemental health for psychotherapy: videoconferencing psychotherapy, phone psychotherapy, and messaging psychotherapy.

Videoconferencing psychotherapy is a face-to-face, real-time meeting over a digital platform using both video and audio. Phone psychotherapy uses phone lines to communicate using only an audio connection in real-time, with no visual component. Finally, messaging psychotherapy is the exchange of text-only messages over a digital platform in synchronous, or more commonly, asynchronous treatment (Hull et al., 2020).

Telemental health has been shown to be effective across many platforms to treat a wide variety of disorders (for review, see Hilty et al., 2013). This includes videoconferencing psychotherapy (Backhaus et al., 2012; Fernandez et al., 2021), telephone psychotherapy (Dobkin et al., 2020; Lins et al., 2014), and asynchronous messaging (Hull et al., 2020; Hull & Mahan, 2016; Senanayake et al., 2019). Videoconferencing psychotherapy specifically has been demonstrated to improve functioning over a large variety of disorders, including Post-Traumatic Stress Disorder (Germain et al., 2009; Tuerk et al., 2010), depression (Nelson et al., 2003; Ruskin et al., 2004) and panic disorder (Bouchard et al., 2000, 2004).

However, though efficacy studies demonstrate that those who engage in telehealth services have comparable outcomes with in-person services, there is still a considerable bias against using well-validated telehealth platforms (Helou et al., 2020;

Toscos et al., 2018), especially among individuals who have not yet utilized telehealth (Moise et al., 2020). In fact, studies involving clients who have already engaged in telehealth services typically report that client satisfaction is comparable to in-person treatment (Drago et al., 2016; Hilty et al., 2013; Shigekawa et al., 2018). Clients and clinicians who have taken part in telehealth services are more likely to do so in the future (Connolly et al., 2020; Toscos et al., 2018).

Various factors, including unfamiliarity with telehealth platforms, technophobia, or beliefs that online psychotherapy is less effective than traditional psychotherapy, drive the bias against telemedical health platforms. One study that conducted focus groups across rural Nebraska found that while participants felt telemental health would help improve access to care within their communities, they had misgivings about the quality of the therapeutic relationship maintained at a distance rather than in-person (Jameson et al., 2011).

The bias against telemental health extends to practitioners (Connolly et al., 2020), who likewise report fear that the therapeutic alliance may be compromised by the decrease in non-verbal cues they anticipate over videoconferencing psychotherapy (Jameson et al., 2011; Jarrette-Kenny, 2022). However, evidence suggests that satisfaction with the therapeutic alliance is comparable between in-person and videoconferencing psychotherapy for patients, with treatment dissatisfaction most contributed to technological issues such as limited internet bandwidth (Jenkins-Guarnieri et al., 2015).

One factor contributing to bias against telemental health is a deficit in telemental health training. While many training programs hastily adapted a telehealth approach and associated curriculum during the COVID-19 pandemic (Hames et al., 2020), historical neglect of telemental health training means that clinicians already in practice may not have felt as equipped to adopt telemental health practices. There are considerations to developing a therapeutic alliance unique to the telehealth context, such as the positioning of the camera, the perception of eye contact, and decision decision-making when technical issues arise (i.e., deciding to reschedule or switch to a different platform, such as telephone). Clinicians trained in these issues are less intimidated by telemental health, view telemental health more positively (Garcia et al., 2021; Sanchez Gonzalez et al., 2019), and are more likely to utilize it and recommend it to clients (Simms et al., 2011).

1.2.1. Attachment Style and Telemental Health

Telemental health was slowly rising before the COVID-19 pandemic (Barnett & Huskamp, 2019), but the stay-at-home mandates that limited non-emergent travel certainly fast-tracked its implementation (Secon, 2020; Appleton et al., 2021). With such a substantial clinical shift in relatively little time, research is still catching up to the rapid change in the mental health landscape, and a need remains to examine the impact of attachment style in the context of telemental health service provision. Given the earlier exploration of the impact of attachment style in evaluating other online relationships like online dating and social media, there is reason to believe that attachment style may influence the evaluation of telemental health modalities and willingness to participate in those modalities.

With the perception that telemental health is less intimate, one possibility is that engaging in telemental health may allow those high in attachment avoidance to engage in mental health treatment without activating their attachment needs or activating "attachment threat," which the avoidant style is motivated to minimize. If true, this would allow for more suitable treatment recommendations for individuals with this interpersonal style that values independence and self-reliance. Research shows that those with avoidant attachment styles are less likely to pursue treatment in traditional, in-person psychotherapy formats (Adams et al., 2018). However, it is also possible that people with avoidant attachment styles would devalue the digital therapeutic relationship in the same manner as in-person, as devaluing the importance of relationships is characteristic of the avoidant strategy of dealing with unmet attachment needs.

Conversely, attachment anxiety is characterized by ambivalence- the desire to pull closer to others with the underlying belief that the care given will be insufficient (Mikulincer et al., 2010). Thus, telemental health options may appeal less to those with anxious attachment, the attachment strategy characterized by fear that the attachment figure's responsiveness will be insufficient to meet their needs. The bias against telemental health may be more substantial for those who are hypervigilant to threats to a relationship. However, attachment anxiety is typically associated with higher engagement in treatment and greater treatment-seeking behavior, so it is also possible that this pattern will generalize to these novel psychotherapy methods.

1.3. Present Study

This study examines the relationship between attachment style and treatment-seeking behavior in the telemental health context. This study utilizes two different population samples. A non-clinical sample, students from a university, were recruited to illuminate the attitudes and experiences of a population that may have limited exposure to mental health treatment and thus different expectations of telemental health modalities. A clinical sample, individuals who have personal experience engaging in individual psychotherapy, was recruited to provide the perspective of current consumers of telemental health services. The clinical sample was restricted to those who have both in-person and telemental health experience due to the implementation of stay-at-home orders that forced a shift to telemental health during the 2020 COVID-19 pandemic. Therefore, this clinical sample can directly compare their in-person and telemental psychotherapy experiences.

The study is a mixed-methods design, using both quantitative and qualitative approaches to accomplish two distinct aims. The present study's first aim takes a quantitative approach to examine how attachment style influences willingness to pursue psychotherapy treatment across four modalities: in-person psychotherapy, videoconferencing psychotherapy, phone psychotherapy, and messaging psychotherapy.

The second aim of the present study takes a qualitative approach, specifically using a grounded theory methodology in which the data preempts the theory that arises (Glaser & Strauss, 1967; Strauss & Corbin, 1998) to uncover what factors emerge across an individual’s evaluation of different modalities of psychotherapy. In addition, this study examines the impact of attachment style on ongoing therapy clients' decisions to

continue or discontinue treatment at the onset of COVID-19 when nationwide lockdowns transitioned therapy services online.

The influence of attachment style on telemental health treatment is an essential consideration for clinicians utilizing and recommending telemental health treatment modalities. Telemental health has been a key element in reducing healthcare disparities. This study aims to increase the understanding of how attachment style interacts with treatment-seeking behavior in telemental health, hoping to provide insights into further reducing barriers to receiving mental health treatment.

2. STUDY ONE – NON-CLINICAL POPULATION

2.1. Methods

2.1.1. Participants and procedure

The first sample aimed to capture the experiences of a non-clinical population to evaluate the attitudes of those who may engage in treatment-seeking without prior experience. For this sample, 195 participants were recruited from the Psychology Department subject pool at Texas A&M University. These participants were awarded class credit for their participation in the study. The study was distributed by the online survey platform Qualtrics. The IRB granted this study a waiver of signed informed consent. The first item on the Qualtrics survey was an information sheet describing the study. After reading, the participants elected to participate or not by either choosing "I agree: I wish to participate," which then redirected to the survey, or "I disagree: I do not wish to participate," which closed the study and automatically granted participation credit. Participants who chose to participate completed the survey on their own devices in approximately 30 minutes, after which their class credit was automatically granted.

The age of these participants ranged from 18 years to 23 years (M=18.53, SD=0.95), with the majority self-identifying as White (n=125) and as women (n=145) (See Table 1). Of these 195 participants, the majority had no experience participating in a telehealth visit with a health care professional (n=111; 56.09%), with few having experience before COVID-19 (n=19; 9.5%) and few after the beginning of the COVID-19 lockdown (n=32, 33%). A surprising number of these participants had previously

engaged in mental health services (n=56), though they were not asked to describe them to limit privacy concerns.

2.1.2. Materials

Demographic questionnaire

Participants self-identified their age, sex, employment status, level of education, and race. In addition, participants were asked about their previous exposure and experience with telehealth platforms, whether they had previously engaged in mental health services, and their general comfort level with videoconferencing technology such as Skype, Facetime, or Zoom.

Experiences in Close Relationships Scale (ECR)

The Experiences in Close Relationships (ECR) is a scale of 36 self-report items that measure adult attachment avoidance and attachment anxiety on two separate continuums (Brennan et al., 1998). This scale has been shown to be reliable in clinical samples and non-clinical samples (Picardi et al., 2011). It has also demonstrated good test-retest reliability (Mikulincer & Shaver, 2007). A meta-analysis of more than 500 studies that have used the ECR found high average Cronbach's alphas for both scales: attachment anxiety (*Cronbach's α*=.89) and attachment avoidance *(Cronbach's α* = .90) (Graham & Unterschute, 2015). In the current study, the internal consistency of these scales was also found to be in the high average range for both attachment anxiety (*Cronbach's α*=.92) and attachment avoidance (*Cronbach's α*=.94). These scales are designed with discriminant validity in mind and typically correlate with each other at around .15, according to a 2012 meta-analysis (Cameron et al., 2012).

Personality Assessment Screener

The PAS is a 22-item screener for the potential for behavioral and emotional difficulties, which produces 10 elemental scores representing 10 domains of psychopathology (Morey, 1997). The total score represents the potential for the presence of problems of clinical significance. This screener has been validated for use in multiple populations (Creech et al., 2010; Kelley et al., 2018), including clinical and non-clinical populations. It has been shown to have test-retest reliability at a one-month follow-up (Morey, 1997) and reliably reflect meaningful changes in symptomatology (McCredie et al., 2020).

In the current study, the screener was used as a proxy for the presence and severity of clinically significant behavioral/emotional difficulties, with higher total scores representing a higher likelihood that the participant is experiencing behavioral or emotional difficulties. An internal consistency analysis showed a low internal consistency (*Cronbach's* α=.609), suggesting the items on this scale do not necessarily relate to the same construct. There are several possible explanations for this, including the brevity of the questionnaire or lower incidence of emotional/behavioral difficulties within this sample.

Willingness to engage in psychotherapy

Participants in this sample were asked to rate their willingness to engage in four therapy modalities on a 5-point Likert scale, with 1 representing "extremely unwilling" and 5 representing "extremely willing." The four modalities were described as "traditional, in-person psychotherapy," "videoconferencing with audio and visual psychotherapy,"

"telephone, audio-only, psychotherapy," and "messaging, text-based psychotherapy." Notably, the messaging psychotherapy item did not specify synchronous or asynchronous service provision.

Participants in this sample were also given a single, forced-choice question: "If you were in need of mental health services, would you participate in videoconferencing psychotherapy?" to which they could answer "yes" or "no," Participants in the non-clinical sample also responded to open-ended, qualitative questions inquiring about the advantages and disadvantages of all four modes of psychotherapy.

2.2. Results

2.2.1. Simple correlations

Each continuous variable explored in the following analysis was assessed for linearity and was found to be distributed normally by Shapiro-Wilk's test ($p > .05$). There were two outliers in both attachment anxiety and attachment avoidance, adjusted to the sum of one mean plus one standard deviation of their respective scales (Erceg-Hurn & Mirosevich, 2008; Ghosh & Vogt, 2012).

Pearson *r* correlations were used to examine relationships between variables that may influence willingness to engage in various modes of psychotherapy.
Comfort with videoconferencing technology (such as Zoom, Facetime, or Skype) had a moderate, positive correlation with the willingness to engage in videoconferencing psychotherapy $r(191)=.328$, $p<.001$, but not with the willingness to engage in any other modes of psychotherapy (e.g., in-person, phone, or messaging) (See Table 2).

Behavioral/emotional difficulties, as measured by the Personality Assessment Screener (PAS), had small, positive associations with the willingness to engage in in-person psychotherapy $r(194)=.24$, $p<.001$, videoconferencing psychotherapy $r(194)=.206$, $p<.01$, and phone psychotherapy $r(194)=.245$, $p<.001$, but not messaging psychotherapy. The PAS had a small, positive association with attachment anxiety, $r(194)=.195$, $p<.01$ (See Table 2).

There was a moderate positive correlation between attachment anxiety and attachment avoidance, $r(191)=.443$, $p<0.001$, indicating that as attachment anxiety increases, so does attachment avoidance. However, neither attachment anxiety nor avoidance was directly associated with willingness to engage in any of the four psychotherapy modalities (in-person, videoconferencing, phone, or messaging) (See Table 2).

2.2.2. Group differences

Sex differences

Independent samples t-tests demonstrate that across all four modes of psychotherapy, women ($n=145$) report highly a higher likelihood of engaging than men ($n=48$) (see Table 3 for independent samples t-test values). However, independent sample t-tests also show that men and women in the sample did not significantly differ in their comfort operating video conferencing platforms, level of psychopathology symptoms (PAS), or attachment anxiety or avoidance (See Table 3 for values).

Prior mental health treatment

Within the non-clinical sample, participants were asked whether they had previously engaged in any form of mental health service. The majority had not engaged in mental health services before (n=133); however, a portion of the sample had received some mental health treatment (n=56). Independent samples t-tests demonstrate that students who had previously engaged in mental health services rated themselves significantly more willing to engage in in-person $t(187)=2.78$, $p<.05$, *Cohen's d*=.45 and videoconferencing psychotherapy $t(187)=2.42$, $p<05$, *Cohen's d*=.39 than those who had not engaged in mental health services. In addition, those who had engaged in mental health services reported higher attachment anxiety and reported more emotional/behavioral difficulties $t(187)=2.09$, $p<.05$, *Cohen's d*=.34 (See Table 4).

Further analysis showed that *among* participants who had engaged in mental health services (n=56), anxious attachment had a moderate, positive correlation to the willingness to engage in in-person psychotherapy $r(56)=.356$, $p<.001$, but not other modes of psychotherapy. For the participants who had not received mental health services (n=133), avoidant attachment had a small, negative correlation with the willingness to engage in in-person psychotherapy $r(133)=-.174$, $p<.05$.

Prior telehealth experience

Participants in the non-clinical sample were also asked whether they had participated in any form of telehealth visit with any health professional not specific to mental health. Participants who had previously engaged in telehealth appointments rated themselves significantly more willing to engage in videoconferencing psychotherapy (n=84, M=3.76, SD=3.04) than participants who had never completed a telehealth

appointment (*n*=111, *M*=3.04, *SD*=1.35), *t*(193)=4.34, *p*<.001, *Cohen's d*=.615. Similarly, those who completed telehealth appts were significantly more willing to complete telephone appointments (*M*=2.75, *SD*=1.22) than those who had not participated (*M*=2.37, *SD*=1.22), *t*(193)=2.149, *p*<.05, *Cohen's d*=.311. These differences between those versed in telehealth and those inexperienced in telehealth did not extend to the willingness to participate in in-person or messaging psychotherapy or personality factors such as attachment anxiety, avoidance, or PAS (See Table 5).

2.2.3. Sex and previous healthcare experiences

Given the observed differences between men and women in willingness to engage in psychotherapy of all modes and differences between those with a history of MH services, a 2 x 2 analysis of variance (ANOVA) of the interaction of sex and history of mental health (MH) services on willingness to engage in videoconferencing psychotherapy was conducted. There was a statistically significant interaction between sex and MH services, *F*(1, 187)= 5.07, *p*<.05, *partial η2*=.027. Therefore, simple main effects were analyzed for both sex and a history of MH services. There was no simple main effect of sex on willingness to engage in videoconferencing psychotherapy, *F*(1, 187)=2.96, *p*=.087, *partial η2*=0.016. There was, however, a significant main effect of history of MH services, *F*(1, 187)=12.058, *p*<.007, *partial η2*=.062. Thus, pairwise comparisons, with a Bonferroni adjustments for multiple comparisons, were examined.

Among participants who had not previously received mental health services, men differed significantly from women in their willingness to engage in videoconferencing psychotherapy. Men's willingness to engage in video conferencing therapy (*M*=2.54,

SD=1.26) was significantly lower than women's willingness to engage in video conference psychotherapy (*M*=3.44, *SD*=1.10), with a mean difference of .898, 95%CI[.437, 1.355], *F*(1, 183)=14.852, *p*<.001 *partial η2*=0.075. In contrast, among those who had previously received MH treatment, there was no difference between men's and women's willingness to engage in videoconferencing psychotherapy *F*(1,183)=.095, *p*>.05, *partial η2*=0.001.

Within men, men who previously received MH services had a significantly higher willingness to participate in videoconferencing psychotherapy (*M*=3.83 *SD*=1.11) compared to men who had not previously received MH services (*M*=2.54, *SD*=1.26), with a mean differencing of 1.29, 95% CI [.511,2.01], *F*(1,183)=10.67, *p*<.001, *partial η2*=0.055. In contrast, women did not significantly differ in their willingness to engage in videoconferencing psychotherapy depending on their prior MH services experience *F*(1,183)=1.601, *p*>.05, *partial η2*=0.01. See Figure 1.

An additional two-way ANOVA was conducted to examine whether sex would interact with telehealth experience in the same manner. However, a two-way ANOVA examining sex and prior telehealth experience found no significant interaction between sex and prior telehealth experience *F*(2, 193)=.756, p>.05, *partial η2*= .004. Further analysis of main effects showed that the main effect for prior telehealth experience was statistically significant, *F*(1,193)=11.029, *p*<.001, *partial η2*=.055; however, there was no main effect of sex *F*(1,193)=1.25, *p*>.05, *partial η2*=.007. For prior telehealth experience, both men and women were more likely to engage in a video conference

psychotherapy appointment if they had previously participated in a telehealth appointment, as demonstrated by previously conducted t-tests (see Table 5).

2.2.4. Treatment preferences and personality

Another question of this analysis is whether those who prefer messaging, phone, or videoconferencing psychotherapy over in-person services differ in attachment style, emotional/behavioral difficulties, or other factors. As participants were not directly asked to rank their services preference, the researchers examined how participants responded to the 5-point Likert scale in terms of willingness to engage in each service. Thus, in the following analysis, those coded as "prefers in-person" psychotherapy are the participants in the sample who rated their willingness to engage in in-person services as higher than their willingness to engage in messaging-based psychotherapy, those coded as "prefers messaging" are those who rated their willingness to engage in in-person psychotherapy as lower than text messaging, and those coded "no preference" rated the two services the same on the Likert scale.

Three one-way ANOVAs were conducted to examine whether people who preferred messaging-based psychotherapy (n=10) differed in attachment style or emotional/behavioral difficulties compared to people who preferred in-person psychotherapy (n=138) or had no preference (n=47).

Attachment anxiety was highest among those who preferred in-person psychotherapy (M=3.66, SD=1.23), followed by those who had no preference (M=3.4, SD=1.22), with those who preferred messaging based psychotherapy the lowest (M=2.83, SD=0.99); however these differences were not statistically significant,

F(2,195)=2.69, *p*=.070, partial η2=.027. A post-hoc t-test showed that those who preferred in-person psychotherapy had significantly higher attachment anxiety than those who preferred messaging psychotherapy *t*(194)=2.01, *p*<.05. *Cohen's d*=.687 (See Figure 2).

Similarly, no differences were found in attachment avoidance between people who prefer in-person (*M*=2.96, *SD*=1.2), people who prefer messaging (*M*=2.92, *SD*=1.74), and people who have no preference (*M*=3.05, 1.069), *F*(2, 195)=.105, *p*=.901, *partial η2*=.001 (See Figure 3). No differences were found in PAS between people who prefer in-person (M=29.71, SD=6.44), people who prefer messaging (M=28.30, SD=5.33), and people who have no preference (M=28.09, SD=5.53), *F*(2,193)=.184, *p*=.830, *partial η2*= .002.

This analysis was also conducted by comparing those who prefer videoconferencing therapy to in-person therapy (*n*=15), those who prefer in-person to videoconferencing (*n*=83), and those who have no preference (*n*=96). There were no statistically significant differences in attachment anxiety *F*(2, 193)=.888, *p*=.412, *partial η2*=.009, attachment avoidance *F*(2, 194)=1.669, *p*=.919, *partial η2*=.017, or emotional/behavioral difficulties (PAS) *F*(2,193)=.184, *p*=.830, *partial η2*= .002 between these groups.

This analysis was also conducted with those who prefer phone psychotherapy (*n*=10), those who prefer in-person to phone (*n*=128), and those who have no preference (*n*=57). Again, there were no significant differences between these groups on attachment anxiety *F*(2, 194)=.482, *p*=.618, *partial η2*=.005, attachment avoidance *F*(2,194)=.882,

p=.415, *partial η2*=.009, or emotional/behavioral difficulties *F*(2,194)=.573, *p*=.565, *partial η2*=.006.

Overall, the results of this analysis do not demonstrate personality differences between those who prefer different modes of psychotherapy. However, this sample is limited in that a relatively low proportion of the sample had a preference for the three non-traditional modes of therapy.

2.2.5. Binomial regression

A binomial regression was performed to test the effects of attachment anxiety, attachment avoidance, psychopathology (PAS), comfort with video conferencing technology, and prior experience with telehealth on participants' response to the item, "If you believed you were in need of mental health treatment, would you engage in telehealth services?" Assumption testing was conducted. The linearity of the variables to the outcome variable was assessed using the Box and Tidwell (1962) procedure. A Bonferroni correction was applied for the five factors in the model, and all continuous variables were found to meet the assumption of linearity. For this analysis, multicollinearity was assessed using Pearson's *r* correlation. As the predictor variables were not associated with each other above a .8 Pearson *r* correlation, the assumption of multicollinearity was met (Tabachnick et al., 2007).

The logistic regression model was significant, $\chi 2(5) = 27.165$, $p < .001$. The model explained 19% (*Nagelkere* R^2) of the variance in whether or not someone would engage in videoconferencing psychotherapy, correctly classifying 68% of all cases. Sensitivity was 84.5%, while specificity was 35.6%. The positive predictive value was

72.1%, meaning of those who were predicted to be willing to participate in videoconferencing psychotherapy, 72.1% were correctly predicted. The negative predictive power was 53.8%, meaning of those cases who predicted not willing to participate in videoconferencing psychotherapy, 53.3% were correct.

Of the five predictor variables, only two were statistically significant: prior telehealth experience and comfort with video conferencing technology (See Table 6). Those who had previously engaged in a telehealth appointment with a provider were 2.74 times more likely to be willing to engage in videoconferencing psychotherapy. In addition, increasing comfort with videoconferencing platforms such as Zoom, Skype, etc., was associated with an increased likelihood of being willing to participate in videoconferencing psychotherapy.

3. STUDY TWO – CLINICAL POPULATION

3.1. Methods

3.1.1. Participants and procedures

To examine the impact of attachment on decisions about psychotherapy within a clinical population with previous experience engaging in psychotherapy, participants were recruited from a local psychology training clinic (e.g., "clinic sample") and a survey hosting site, Amazon Turk, also known as Mturk (e.g. "Mturk sample"). The goal of Study 2 was to examine the experiences of individuals who transitioned from in-person, traditional psychotherapy to telemental health modalities of psychotherapy at the beginning of the COVID-19 pandemic and the impact of attachment style on those experiences.

Participants from the clinic sample were contacted to participate if they were engaged in individual psychotherapy with a therapist from January 2020 to March 2020, were over the age of 18 years, and had previously consented to be contacted for research in the training clinic's intake process. Of the 34 individuals eligible to be contacted, 11 completed the Qualtrics- hosted survey in exchange for a $15 Amazon gift card. See Figure 4 for further training clinic recruitment details.

Amazon Turk (Mturk) is a popular survey hosting website often used for social science research (Chandler & Shapiro, 2016). After consenting to participate in research using the same procedure described in study one, 200 participants participated in a one-item, multiple-choice screener question inquiring about their experience in individual

psychotherapy in exchange for $0.30. Of those 200 screened, 19 participants indicated that they had transitioned from in-person to alternative forms of psychotherapy during the beginning of the COVID-19 pandemic, the inclusion criteria for the full study. Those 19 participants were invited to participate in the full study, taking approximately 30 minutes, in exchange for $15 distributed by Amazon Turk. Of those, 12 participants completed the study (see Figure 2).

There were differences between the clinic sample and the Mturk sample, including the age and sex of the participants. The age of the clinic sample (M=23.00; SD=3.08) was significantly lower than the age of the Mturk sample (M=34.42, SD=7.03), M =11.42, 95% CI[6.15,16.69], $t(21)=4.54$, $p<.001$. While the clinic sample predominately identified as women (n=9) compared to men (n=2), the Mturk sample was more evenly split between women (n=5) and men (n=7), with no participants identifying as gender minorities in either sample. Most participants were White/Caucasian in both samples, with the clinic sample (n=6) and the Mturk sample (n=11). See Table 7.

3.1.2. Materials

Participants in Study 2 completed the same demographics survey, the Experiences of Close Relationships Scale (ECR), the personality assessment screener (PAS), and qualitative questions described in the methods section of Study 1. The reliability of these measures was interpreted within this sample with comparable results, suggesting high internal consistency of attachment anxiety (*Cronbach's α*=.92) and attachment avoidance (*Cronbach's α*=.90). The PAS had higher internal consistency within this clinical sample (*Cronbach's α*=.804), perhaps due to a higher incidence of

emotional/behavioral difficulties in this sample (*M*=35.21, *SD*=10.29) compared to the non-clinical (*M*=29.1, *SD*=6.01).

In addition to previously described materials, the participants in Study 2 also completed the Working Alliance Inventory (WAI) as a measure of therapeutic alliance. Study 2 participants were asked additional qualitative questions about their decision to stay or leave therapy during the transition to online due to COVID-19, in parallel with the forced-choice item about willingness to participate in videoconferencing psychotherapy answered by the non-clinical sample.

Working Alliance Inventory (WAI)

The working alliance inventory (WAI) (Horvath & Greenberg, 1989) is a 36-item measure of the therapeutic alliance, rated on a 7-point Likert scale, with higher scores indicating higher quality therapeutic alliance. The WAI is the most widely used measure of working alliance (Doran, 2016). In addition, this scale has shown convergent validity with other measures of working alliance (Tichenor & Hill, 1989) and has been previously used in research to evaluate attachment within the therapeutic relationship alongside the ECR (Bernecker et al., 2014). The scale's internal consistency in this analysis was high (Cronbach's α=.97), suggesting the items on the scale address the same construct.

3.2. Results

3.2.1. Simple correlations

Each continuous variable explored in the following analysis was assessed for linearity and was found to be distributed normally using the Shapiro-Wilk's test ($p > .05$). Two outliers were identified in the Working Alliance Inventory (WAI) and

attachment anxiety. These values were adjusted to the sum of the mean plus one standard deviation of their respective scales, which did not change the normality of either variable (Erceg-Hurn & Mirosevich, 2008; Ghosh & Vogt, 2012).

In keeping with the non-clinical sample and previous research, there is a statistically significant, moderate positive correlation between attachment anxiety and attachment avoidance, $r(21)=.440$, $p<0.05$.

The expected relationship between attachment strategy and working alliance was observed, with a strong negative correlation between attachment anxiety and working alliance total, $r(21)=-.577$, $p<.01$. The relationship between WAI and attachment avoidance was negative but not statistically significant $r(21)=-2.51$, $p=.273$.

While attachment anxiety was not associated with willingness to engage in traditional or videoconferencing psychotherapy, there were moderate, positive associations between anxious attachment and willingness to engage in the therapeutic options without a visual component: phone psychotherapy $r(21)=0.435$, $p<.05$ and messaging psychotherapy $r(21)=.501$, $p<.05$. Attachment avoidance was not related to willingness to engage in therapy services of any type (see Table 8 for details). Interestingly, we see a different pattern for working alliance, in that WAI was related to willingness to engage in in-person psychotherapy $r(21)=.711$, $p<.01$ and engage in videoconferencing psychotherapy $r(21)=.552$, $p<.01$ but not associated with phone or messaging services.

Participants in the clinical sample were asked to rate how easy it was to use the telehealth platforms of their respective providers. Surprisingly, willingness to engage in

various therapy services was not associated with ease of using telehealth services with the participants' therapist, nor was it related to a broader level of comfort with using other video conferencing platforms (Skype, Google hangouts, Zoom, etc.).

Finally, emotional/behavioral difficulties, as measured by the PAS, was associated with willingness to engage in telephone $r(21)=.513$, $p<.05$ and messaging-based psychotherapy, $r(21)=.990$, $p<.01$. The PAS was also associated with attachment anxiety $r(2)=.751$, $p<.01$. The PAS was also negatively related to willingness to engage in in-person and telephone psychotherapy, though the relationship was insignificant.

3.2.2. Group differences

Independent t-tests demonstrate no significant differences between men (n=9) and women (n=14) in the clinical sample across any of the dependent variables (See Table 9 for details).

There was only one significant difference between the Mturk and training clinic samples. The Mturk sample (M=3.25, SD=1.48) was more willing to engage in messaging psychotherapy than the training clinic sample (M=1.56, SD=1.01), $t(21)=3.10$, $p=.006$, *Cohen's d* = 1.296 (see Table 10 for details).

Participants in the clinical sample were asked to rate their therapist's attitudes about telehealth. Participants rated their therapist as either enthusiastic about telehealth (n=12), neutral about telehealth (n=8), or doubtful of telehealth (n=2). While there were no statistically significant differences between participants who rated their therapists differently, $F(2, 20)=3.43$, $p=0.056$, *partial η2*=.288, data trended in the direction that participants who considered their therapist doubtful of telehealth tended to rate their

willingness to engage in video conferencing the lower (*M*=2.50, *SD*=2.12), compared to those who considered their therapist enthusiastic (*M*=4.42, *SD*=0.90) or neutral (*M*=4.50, *SD*=.837) (see Figure 6).

3.2.3. Binomial linear regression; stay go decision

Binomial logistic regression was performed to test the effects of attachment avoidance, attachment anxiety, familiarity with technology, working alliance (WAI), and emotional/behavioral difficulties (PAS) on the likelihood that participants engaged in treatment at the start of COVID-19 would continue or discontinue treatment during the switch to telehealth. Assumptions testing included assessing the linearity of the continuous variables and testing multicollinearity. Linearity was assessed using the Box and Tidwell (1962) procedure. After a Bonferroni correction for the 5 factors in the model was applied, all continuous variables were found to be linearly related to the logit of the dependent variable, meeting the first assumption for binomial regression. For this analysis, multicollinearity was assessed using Pearson's *r* coefficient. As the continuous predictor variables were associated with one another at a Pearson's *r* value of <.8, the assumption of multicollinearity is considered met (Tabachnick et al., 2007).

The regression model was insignificant, $\chi^2(5) = 6.014$, $p > .05$. The model explained 36% (Nagelkerke R^2) of the variance in staying in therapy and correctly classified 71.4% of cases. Sensitivity was 86.7%, and specificity was 33.3%. The positive predictive value was 50%, meaning of those predicted to leave therapy, 50% actually left therapy. The negative predictive value was 76%, meaning of those predicted to stay in therapy, 76% were correctly predicted (See Table 11). Likely, the size of the

sample and the limited respondents who chose to discontinue therapy at the start of COVID (*n*=6) limited predictive power. This model predicts that everyone will stay in therapy and lacks specificity, meaning it cannot predict who would discontinue therapy. Likely, too few people left therapy to accurately predict who would stay and go from this sample.

3.3 Qualitative Analysis of Studies One and Two

3.3.1 Method

The study's second aim was to uncover what factors impact treatment-seeking considerations across different modalities of psychotherapy. The clinical and non-clinical samples were asked the same eight questions to achieve this aim. These questions were

1. What are the advantages of traditional, in-person psychotherapy?
2. What are the disadvantages of traditional, in-person psychotherapy?
3. What are the advantages of videoconferencing, video and audio psychotherapy?
4. What are the disadvantages of videoconferencing, video and audio psychotherapy?
5. What are the advantages of phone, audio-only psychotherapy?
6. What are the disadvantages of phone, audio-only psychotherapy
7. What are the advantages of messaging, text-based psychotherapy?
8. What are the disadvantages of messaging, text-based psychotherapy

The 195 student responses and 24 clinical responses were evaluated together to make a coding scheme applicable to both groups to compare and contrast the samples, with each participant's response to each item coded as an individual unit, for a total of 1752 responses coded. The following methods and analysis are in keeping with the Consolidated Criteria for Reporting Qualitative Research (COREQ) guidelines (Tong et al., 2007), which have been shown to improve the quality of single qualitative studies such as the present study (de Jong et al., 2021). Qualitative analysis was conducted using Atlas.ti (Version 22) software. The qualitative analysis was conducted from a grounded theory approach, in which the data informs and preempts the theory that arises (Friese, 2012; Glaser & Strauss, 1967; Krippendorff, 2018; Kuckartz, 2014; Strauss & Corbin, 1998). Thus, the coding scheme was constructed from the ground up without the framework of an existing theory.

In keeping with COREQ standards requiring documentation of the research team's training, employment, and expertise, the research team is described as follows: The lead researcher is a Ph.D. candidate with an M.S. in Clinical Psychology. At the time of this project, the lead researcher was also employed as a Psychology Intern at a Veteran's Affairs hospital. Two other coders participated in the coding and creation of the coding scheme. One was a Counseling Psychology Ph.D. student in her second year with an M.Ed. in Educational Psychology, also employed as an intake specialist at an outpatient clinic. The second coder was an undergraduate student studying Sociology. All three researchers identify as women.

The study participants were not known to any of the three researchers. The lead researcher received psychotherapy training at the training clinic used for recruitment. However, she did not contact any individual she had provided psychotherapy services (see Figure 4 for recruitment details). Training clinic participants recruited by phone contact were informed that the lead researcher was a Ph.D. student conducting research for her dissertation. The information sheet read by every participant in both the nonclinical and clinical samples included only the lead researcher's name and a brief description of the study but no other identifying factors. The researchers' identities may be less salient to the participants of this study, who responded to survey questions on their own devices, than in studies that use in-person interview data.

The qualitative data analysis process includes an iterative open, axial, and selective coding cycle. Open coding was conducted first, in which the lead researcher and one additional coder completed an initial pass of the qualitative data and identified "in-vivo" (terms used by the participants) codes. Open coding produced 1277 unique in-vivo codes used by the participants across both samples. The lead researcher then completed the first round of axial coding, in which the relationships *within* the previously identified codes were identified and arranged using categories, subcategories, and dimensions. These categories were organized into a 110 code "codebook," then distributed to the two trained additional coders.

The two additional coders were trained in the software and the codebook and then applied the codebook to the qualitative data. The research team had 12, 90-minute meetings over 12 weeks, during which the codebook and coding scheme were refined.

The refinement process includes applying the codes to the codebook, discussing questions about how to apply the codebook, analyzing and resolving discrepancies in how codes are applied, adding additional "in-vivo" codes as necessary, and discussing selective coding (e.g., How do these categories and themes relate to one another?). The coding team used semantic maps (also known as concept maps) generated by Atlas.ti software to model how the codes relate to one another during the selective coding process.

In addition, the codebook was evaluated by use of inter-rater reliability (IRR), also known as inter-coder agreement (ICA). IRR is the degree of agreement between two or more coders coding a phenomenon. IRR was calculated using Krippendorff's alpha-binary to test the application of individual codes and Krippendorff's cu-alpha to test the reliability of semantic domains. Krippendorff's alpha is interpreted as "1" representing unanimous agreement between the raters, "0" representing no agreement, and negative values representing disagreement. Krippendorff recommends a cutoff where $\alpha \geq .800$ to represent that the raters have applied a code or a somatic domain in agreement with one another, with $\alpha \geq .667$ as the lowest conceivable limit to represent agreement (Hayes & Krippendorff, 2007; Krippendorff, 2018).

Krippendorff's alpha differs from an alternative and historically more widely used metric of IIR, Cohen's kappa, in that it is an analysis of coder disagreement rather than agreement, which allows for the inclusion of more than two raters. Krippendorff's alpha also considers sample size while performing bootstrap operations to control for

random chance disagreement. However, in practice, Krippendorff's alpha produces similar reliability outcomes as Cohen's kappa (Kerr et al., 2015; Osborne, 2008).

The final codebook consisted of 65 unique codes, with an inter-rater reliability coefficient of Krippendorff's $\alpha = .8$ used as a cut-off for sufficient reliability between the two coders, demonstrating convergent validity of the final coding scheme (See Table 12 for the prevalence of each code in each sample). The final coding scheme consisted of 10 distinct themes: individual factors, communication, sensation and perception, environment, relationship factors, ease, treatment efficacy, time, accessibility, and technology. The coding team agreed that data saturation was achieved by meeting the criteria of having no new themes emerge during the final few coding meetings and having enough details to replicate the study (Fusch & Ness, 2015). Semantic maps of the codes within those themes can be found in the Appendix. (See Figures 7-17).

Each of the 10 themes represents factors participants considered when evaluating in person, videoconferencing, phone, and messaging psychotherapy.

3.4 Analysis of Themes

3.4.1 Individual Factors

Participants attended heavily to individual differences and preferences that might impact engagement in different mental health modalities (See Figure 7). These individual factors can be described easily into four categories: wellbeing, emotion, individual differences, and focus.

When evaluating psychotherapy modalities, one factor that individuals consider is their well-being. This includes their safety, health, potential exposure to the COVID-

19 virus, and mental health. Participants discussed the advantages of telemental health modalities, such as avoiding exposure to illnesses and being able to participate in psychotherapy when sick. Participants also discussed safety, with some describing feeling safer at home while participating in psychotherapy or feeling "protected behind a screen" during videoconferencing psychotherapy. Others suggested that they would feel safer in an office than at home, where they might be overheard.

Participants spoke about "mental health" mostly in broad strokes but specifically identified depression and anxiety as conditions that might impact engagement in psychotherapy. Participants suggested that telemental health modalities may be more accessible to individuals with depression because telemental health services are "easier" for them to access. Some hypothesized that individuals with anxiety might find operating telemental health modalities intimating and prefer in-person services, specifically referencing "phone anxiety," while others thought those with anxiety would find telemental health modalities less intimidating than in-person psychotherapy.

Another factor considered by participants was the expression and perception of emotion. Many respondents hypothesized that emotion would be easier to express freely and comfortably in person and that cues such as body language and facial expressions were needed to effectively express emotion, for instance, "In person, you can express yourself the way you'd like." Other participants suggested that other psychotherapy methods may suit some emotional expression; for instance, "Some people best express their emotions through text. This might be the most comfortable option for people who don't feel comfortable in person."

Participants used emotional reasoning to evaluate psychotherapy modalities, most often referencing feeling comfortable. Participants also referenced feeling anxious, scared, or stressed due to the therapy modality, stating that in-person psychotherapy may be "too intimidating" or that people may "feel pressured to talk." Other participants elaborated, "Speaking from experience, the patient could be more nervous in person." Participants prioritized achieving comfort and alleviating stress when choosing a modality.

Participants also referred to many individual differences, in broad strokes such as personal preferences, "some people prefer texting," to personality differences such as shyness, age, or generation, such as "Millennials tend to have phone anxiety and texting is way easier for them to get their emotions and thoughts across." Participants also considered individual differences in ability levels, such as "[In person psychotherapy] requires a certain amount of executive function" and "clients must have adequate computer skills [for videoconferencing psychotherapy]."

Finally, participants were conscious that there might be a difference in attention or focus. Participants thought that one advantage of phone psychotherapy might be focus, stating, "There are fewer distractions, and you're forced to focus on what they're saying" and "It's very easy and doesn't take as much focus." Participants thought that focus was a disadvantage of videoconferencing psychotherapy, stating, "It is hard to pay attention during videoconferencing" and "Distractions wherever you are attending videoconferencing therapy can make it difficult to focus."

3.4.2 Communication

Another factor that participants considered when evaluating modes of psychotherapy was the ability to communicate and the quality of that communication (See Figure 8). Interestingly, many participants indicated that "talking" and "being able to have a conversation" were specific advantages to in-person psychotherapy, even though conversing is an aspect of every form of psychotherapy.

The first order of communication is conveying understanding or avoiding misunderstandings. Many participants argued that in-person psychotherapy would lead to the most understanding, with statements such as "both participants can better understand what is going on and what actions to take" and emphasized that messaging psychotherapy may lead to misunderstandings such as "emotions are hard to understand over text messages" and "it is hard to decipher meaning through text…things could be taken the wrong way." People also expressed concern that having to type responses would mean communicating less because "typing speed and limit the information in chat-based sessions."

Participants often referenced "opening up" or "being open" and expressing new and vulnerable things in the context of psychotherapy. Many participants argued that it would be easier to be vulnerable through messaging psychotherapy, stating things such as "People will be more open when they don't have to show their face or speak out loud" or "[messaging psychotherapy] is also good for people that do not like opening up and prefer to do it anonymously" or "might be easier to text something vulnerable and true through a screen, feels safe and hidden." Others disagreed, stating that it was easier to

"express yourself openly when you can see their reaction" or "not being able to hear someone's voice can make it difficult to open up."

Another surprising theme of communication was an emphasis on honesty, though participants had mixed evaluations of which modality would generate honest communication. Some suggested that an advantage of phone psychotherapy would be honesty stating things such as "it can be easier to be honest when no one is looking at you," while others stated it would be "easy to lie about the reality of the root of their problems" over the phone. Many people argued that telemental health modalities would lead to "less genuine" conversion or relationship compared to in person. Many participants listed a disadvantage of messaging psychotherapy as "they might be lying to you" or "less genuine." Many stated that they believed therapists would be able to perceive whether their clients were being honest in in-person psychotherapy and that it would be difficult to tell whether clients were honest over telemental health modalities. On the other side of the coin, participants stated they would be better able to gauge whether their therapist's remarks were sincere in in-person treatment, and it would be more challenging to gauge sincerity or "genuineness" over telemental health modalities.

Similarly, participants also emphasized the importance of the "reactions" of both the psychotherapist and the client and often suggested that those reactions would be best perceived in in-person and videoconferencing psychotherapy. For instance, one participant wrote that an advantage of in-person psychotherapy was that "the therapist is able to see the patient's face and gauge their reaction." In contrast, many other participants listed the lack of "immediate" reactions as a disadvantage to both phone and

messaging psychotherapy, stating “you can’t gauge the reaction/emotion on the person’s face” and “the person observing cannot see how they are physically reaction to certain questions or responses.” Some suggested clients would be invested in the “true reaction” of their psychotherapist, stating things such as “I can’t judge their reaction to what I’m saying.” While the majority thought that “reactions” were needed to facilitate psychotherapy, a few also argued that the lack of reactions could be an advantage, making statements such as “it can be easier to be honest without having to see another person potentially react.”

3.4.3 Sensation and Perception

Participants referred to three of the five primary senses throughout their discussion of modalities: hearing, sight, and touch (See Figure 9). The most often referenced was sight, with participants describing the desirability of being able to see the client and the therapist. Participants also discussed the idea of being seen, or their appearance, suggesting that one of the advantages of phone and messaging psychotherapy was not having to monitor one’s appearance. Body language and facial expressions were two of the most cited advantages of in-person psychotherapy. Hearing one another and, more explicitly, hearing the tone of voice were also cited as advantages of in-person, phone, and videoconferencing psychotherapy and a considerable disadvantage of messaging psychotherapy. Participants suggested that tone of voice was essential to interpreting both the client's and the psychotherapist's meaning, sincerity, and emotion. Tone of voice was also cited as an important factor in deciphering whether the therapist was conveying comfort or care.

A few participants referred to touch with statements about the importance of "physical" in-person psychotherapy, such as "[phone psychotherapy] lacks physical reassurance" or "[in-person psychotherapy] has physical comfort." Others more specifically said that in-person psychotherapy could provide "hugs."

3.4.4 Environment

Participants discussed different qualities of environments when evaluating psychotherapy modalities, for instance, often stating that traveling in person to a provider's office would provide a "getaway" or "reason to get out of the house" (See Figure 10). Participants often cited environment qualities of "immersive" or "engaging" as well as "together" as advantages to in-person psychotherapy. Participants were also cognizant of privacy, stating that many people would have difficulty finding privacy for telemental health appointments conducted at home, for instance, "If they are at their house with the person that is causing the stress or is abusive, they cannot tell the doctor how truly they feel." Finally, participants often simply listed "being together" as an advantage of in-person psychotherapy or referred to the "human need" for "togetherness" as an important factor in evaluating psychotherapy.

Participants also thought environment gave advantages to telemental health modalities, stating that phone and messaging psychotherapy could be done "anywhere and everywhere" and emphasizing that not being tied to a particular place was an advantage in accessing the time to do therapy and finding an available therapist. Many participants referred to complete psychotherapy at home or "in my own room" as an advantage to telemental health modalities where one could participate from the safety,

convenience, and privacy of one's own home or as a disadvantage telemental health modalities if a home was not private or safe.

3.4.5 Relationship Factors

The therapeutic relationship was a major concern when evaluating psychotherapy modalities (See Figure 11). Participants attended closely to the formation of a relationship, discussing "building," "forming," and "establishing" a relationship with a therapist. There was discussion that relationship formation may be easier, quicker, or less intimidating in in-person compared to telemental health modalities. Some went as far as to say that a relationship could not be formed through messaging psychotherapy.

Participants also emphasized the importance of a "connection" or bond, with the word "connection" one of the most frequently used words across the whole data set. Many participants cited having "less connection" as a disadvantage to messaging psychotherapy, and it is harder to form a connection as disadvantages to other modes of telemental health; for instance, "There is also a connection in-person that cannot be made over the phone" and "There is a sort of intimacy or bond that comes with being physically together."

Participants also heavily attended to the *quality* of the connection or relationship. Participants thought that the relationship should be human, organic, or natural and preferred in-person because "It's the most organic form of interaction." Participants also attended to whether the relationship was formal or casual, citing telemental health as a unique opportunity to be more casual for better or worse. For instance, "texting is a little too casual" and "the relationship could be more of a friendship than a professional one."

Participants attended to intimacy or closeness, saying that in-person relationships may feel more intimate but that messaging or phone psychotherapy may be more appropriate for those who find intimacy off-putting. Participants cited the relationship feeling "less personal" as a disadvantage to messaging psychotherapy. Participants often cited anonymity as an advantage of messaging psychotherapy, for instance, "It can be nice to have the anonymity of not being seen when you're speaking about private sensitive matters."

Many participants cited difficulty establishing a trustworthy relationship as a disadvantage to phone or messaging psychotherapy because they could not see the provider, for instance, stating, "The therapy-client relationship is based on trust, which can be harder to build online" and "you don't get to see the counselor's face which makes it harder to build trust."

Final qualifiers for relationship quality often used throughout the qualitative responses were "actual" and "real." Participants seemed fixated on an "actual connection" or "real relationship" as an advantage of in-person psychotherapy. This was the most often referenced relationship quality, though it is worth noting that the non-clinical sample (e.g., the telehealth inexperienced sample) seemed much more focused on whether the relationship or connection was "real" than the clinical sample (See Table 12, Figure 11). Participants also worried that messaging therapy may be artificial somehow, some going as far as to express concern that they would be talking to a "robot" or "automated response."

3.4.6 Ease

A common qualifier across each of the themes was the ease with which participants considered different facets of each modality (See Figure 12). Participants thought that connecting with a therapist, forming a relationship, feeling "close," and communicating effectively were easiest in person. However, many cited convenience as an advantage to phone, video conferencing, and messaging psychotherapy. Many people described messaging psychotherapy as the most flexible, specifically citing the ability to respond to communication when available and convenient and after one has had the opportunity to mull over a response. Conversely, people anticipated difficulty with messaging psychotherapy, such as "more difficult to open up," "difficult to understand," or "difficult to muster up the courage to confess an issue." The "ease" related qualifiers extend to almost every other theme, co-occurring most often with codes in the communication theme (See Table 13).

3.4.7 Treatment Efficacy

Participants also considered whether or not psychotherapy would be effective across different modalities (See Figure 13). Treatment outcomes were considered, such as "alleviating stress and anxiety" and whether or not the treatment was "helpful." The treatment *quality* was also considered, with examples like "If not in-person, the patient may be confused as to what task should be done if there are multiple steps" or "not seeing someone's face could inhibit the therapy session" or treatment would "not be to the same degree of care" or simply "lower quality." Very few participants attended to research, and all that did were in the clinical population, who noted "traditional

psychotherapy has been proven to treat emotional distress," and in-person psychotherapy has "solid evidence supporting its effectiveness."

Participants in both samples were much more apt to attend to the effectiveness of the therapist on each modality rather than the effectiveness of the treatment over each modality. Participants questioned whether the therapist could be effectively empathic or caring of telemental health platforms: for instance, citing a disadvantage to video conference as "individuals may not feel like the therapist is really listening" and an advantage to in-person psychotherapy as " you can tell the therapist really cares." Participants were also concerned that patients could not tell if a therapist was being "judgmental" or "prejudiced" without a visual component to psychotherapy.

Participants expected that the activities or practice of therapy may be limited due to modality, for instance, that you need a visual component to engage in "visually learning different techniques" and that only in person treatment allows for "accessing materials in the therapist's office," "offer activities like stress balls" and "hand out tissues." Others emphasized that an advantage of videoconferencing was that the therapist could "demonstrate things visually."

The most prominent therapist factor that participants attended to was a provider's ability to assess clients' needs, emotions, and thoughts across the different modalities. Respondents expressed concern on whether a provider could "read," "sense," "detect," and "diagnose" patients over the different platforms, often citing better assessment as an advantage of in-person and videoconferencing psychotherapy due to the ability to include body language and tone of voice while stating that poorer assessment was a

limitation of phone and especially messaging psychotherapy. Respondents stated that therapists could "tell when someone is lying" or "detect that they are hiding something" in person, or that being in person "allows the therapist to interpret one's emotions and true feelings" or "allows for the counselor to read the person's body language and get a better understanding of their subconscious feeling."

3.4.8 Time

Participants often referred to time, waiting, and speed issues when evaluating telemental health modalities (See Figure 14). The most often cited benefit of messaging psychotherapy was that it was "quick," "fast," and "own your own time." Participants thought that messaging psychotherapy would be appropriate for "busy" people or emergencies, for instance, stating "it is easy to get a hold of someone in case of an emergency" and "it is great for quick check-ins." In contrast, people listed waiting for a weekly appointment and difficulty scheduling as disadvantages to in-person psychotherapy. Participants often referred to the immediacy of reactions on the phone, in-person, and videoconferencing as benefits of those modalities. Likewise, they cited the wait for responses for messaging as a disadvantage. For instance, "the therapist could take longer to answer if otherwise occupied," and "waiting for a response could produce anxiety." Others suggested an advantage to messaging would be allowing "time to think through responses if they need to."

3.4.9 Accessibility

Another theme that became apparent in the qualitative responses is the accessibility of the psychotherapy modality (See Figure 15). Many participants cited

"accessibility" broadly as an advantage to the three telemental health platforms. More detailed responses included perks such as not needing to travel or finding therapists outside of where people normally could travel for treatment. Some responses included increased accessibility for disabled, chronically ill, or immunosuppressed, who may have more barriers to seeking in-person services.

Many participants referred to having the resources to attend psychotherapy, such as the technology, funds, and access to transportation. Participants were split on whether telemental health modalities were either more accessible because "most" people have telecommunication devices such as phones and computers or whether they were less accessible because people needed phones and computers to participate. Participants often cited cost saving as an advantage to telemental health modalities and expense as a disadvantage to in-person, which many participants described as "more costly." Finally, participants thought that a major disadvantage to in-person psychotherapy was the need to access transportation, including the time it takes to travel, access to a personal vehicle or public transit, and the cost of travel.

3.4.10 Technology

The last factor participants used to evaluate psychotherapy modalities was technology (See Figure 16). Participants anticipated that technical difficulties such as poor phone connection or internet connection would be disadvantages to video conferencing and phone psychotherapy and impair the "bond" or "connection." Many cited relying on technology as a disadvantage for the telemental health modalities and anticipated "glitches" and "issues," for instance, "making technology work gives people

anxiety" and "technology isn't always reliable." Others expressed concerns about privacy over telemental health, such as "you can't ensure that no one is listening on the other end" and "there are risks to online therapy." Many participants also expressed personal distaste for technology, such as "they are just a face on a screen" and "technology makes it seem fake." Others cited advantages to technology such as "providing services across a geographical distance" and "responding when you're able." Others hypothesized that "technological advances" may improve mental health services going forward.

3.5 Analysis of themes – Stay go decision

Within only the clinical sample, participants were asked to describe why they chose to stay in therapy and continue on their provider's telemental health platform at the start of the COVID-19 pandemic or chose to discontinue therapy rather than participate in telehealth. This question offers a unique look at clients' perspectives on the unforeseen implementation of telemental health. In addition to the grounded theory analysis, two exemplar quotations have been selected to more poignantly illustrate psychotherapy clients' thought processes through the transition to telehealth. One participant who chose to transition to telehealth and stay in psychotherapy wrote,

> "I continued therapy at this time, switching from face-to-face to videoconferencing. I was glad that I could continue to see my therapist during what would become an increasingly stressful time - changing living situation, being in a traumatic environment, etc..… My biggest

> concern in shifting to teletherapy was ensuring privacy on my end. I purchased a sound machine so that I had confidentiality and privacy from others in my home. Going without therapy was just not an option - I knew this about my state of health - so it wasn't really a decision of if I'd continue, but rather how."

Another participant who chose to discontinue psychotherapy rather than transition to telehealth wrote,

> "Though I felt confident about my mental state at the time, I still would've preferred to have some sort of therapy arrangement. Even so, I did not feel comfortable conversing about therapy around my family, even if behind closed doors. What's more, I did not view phone therapy as an effective means of discussion."

A brief codebook of 14 codes was developed and applied to the 20 valid responses to this item using the same system, coders, and standards described in the qualitative methodology for the initial qualitative questions. Clients' reasoning for making their decisions could be categorized into two broad categories: personal client factors and external factors. Schematic maps of these themes can be found in the Appendix (Figures 17 and 18). Client factors included the themes of their personal evaluation of the therapy and therapist, their perceived need for and want of therapy,

their emotions, and their thoughts about communication. The external factors clients referenced in their decision to stay or leave therapy included the pandemic and the qualities of the environment they would complete psychotherapy outside the psychotherapy. These themes are further analyzed below:

3.5.1 Client Factors

Clients reported their personal thoughts, opinions, and feelings about their decision to stay or leave therapy (See Figure 17). The most often referenced factor was a client's perception that they needed to continue therapy. The exemplar quotation: "Going without therapy was just not an option - I knew this about my state of health - so it wasn't really a decision of if I'd continue, but rather how" illustrates this point well and is a theme seen across 65% of the responses. Clients explained that they did not feel comfortable going without therapy, especially given the unpredictability of the pandemic and the comfort they found in having reliable psychotherapy. For example, one participant stated, "….when you're like me, and you need and want therapy, in hard times (COVID), you'll take what you can get."

Clients also shared their evaluations of their therapists and experience of telemental health modalities ranging from negative "I chose to discontinue because my therapist was becoming less serious with the [phone] sessions, so I left" to positive, such as "I was discouraged that it was audio-only at the time, but it did not affect my therapy sessions too much. I continued therapy because I was still happy to be able to talk to my therapist." Clients also shared their opinions on whether they found treatment effective, such as "I did not view phone therapy as an effective means

of discussion." Clients also discussed their feelings or emotions surrounding their decision, such as being "happy" to continue speaking with their therapists due to the pandemic's stress and "unforeseen times." Other clients reported stress about the modality, such as "I have phone anxiety and over the phone, sessions felt stressful and too impersonal, so I declined [to continue]."

Many clients discussed communicating with their therapists. Those surveyed framed their responses as "talking to my therapist" rather than attending psychotherapy, perhaps due to the nature of phone psychotherapy that many in the training clinic sample participated in. One client specified, "it was really good to hear another voice…. I was grateful we were able to talk at all."

3.5.2 External factors

In addition to internal factors, clients referenced external circumstances that contributed to their decision to stay or leave psychotherapy during the transition to telehealth (See Figure 18). Over half the responses referred to the pandemic that had caused the transition to telehealth which impacted many individuals' decisions to stay or leave and their perception of telemental health. For instance, several people referenced the travel restrictions that prevented travel to therapist's offices, while others cited avoiding illness as a benefit to telemental health. Still, others referenced the stress brought on by the unpredictability of the early days of the pandemic as a reason to continue psychotherapy. Several responses were concerned about privacy or confidentiality. One participant stated, "My biggest concern in shifting to teletherapy

was ensuring privacy on my end," Another stated, "I did not feel comfortable conversing about therapy around my family, even if behind closed doors."

4 DISCUSSION

The purpose of the current study was to answer two questions: First, does attachment style influence an individual's willingness to engage in a variety of modes of psychotherapy, and second, what factors do individuals consider when evaluating different modes of psychotherapy? To examine these questions, 195 participants were recruited from Texas A&M University to represent how a non-clinical sample may evaluate different modes of therapy. In addition, 24 individuals, who were engaged in psychotherapy at the onset of COVID-19, and thus have experience with in-person psychotherapy and telehealth were also recruited to represent the experience of individuals with mental health service experience.

Both samples answered quantitative items such as rating their willingness to engage in in-person, videoconferencing, phone, or messaging psychotherapy. Both samples were also asked qualitative questions about the advantages and disadvantages of the four forms of psychotherapy. Finally, the clinical sample was asked additional questions about their personal experience transitioning from in-person psychotherapy to telemental health during the COVID-19 stay-at-home orders.

4.1 Treatment Seeking Behavior

4.1.1 Technology

First, this study contributes to a body of previous research that shows the greatest predictor of willingness to engage in telehealth is prior experience with telehealth (Connolly et al., 2020; Toscos et al., 2018). In the non-clinical sample, those who had

previously engaged in telehealth were 2.74 times more likely to endorse willingness to engage in videoconferencing psychotherapy. In addition, we see that the comfort with related technology, such as Zoom, Facetime, or Skype, is also a predictor of willingness to engage in videoconferencing psychotherapy. Affinity for this technology appears to increase willingness to endorse trying it.

Unexpectedly, within the clinical sample, comfort with related technology was not associated with willingness to engage, nor was the ease with which clients could use the telehealth platforms provided by their therapists. Relatively few individuals within this sample decided to end therapy rather than transition to telehealth (25%). Thus, this sample may not be representative of individuals who chose to discontinue due to difficulties with technology or capture relevant nuances in the relationship between comfort with technology and willingness to engage in telemental health. However, unlike the non-clinical sample who engaged in the hypothetical willingness to engage in telemental health, these clinical participants had an additional mitigating factor: a preexisting relationship with the therapist. In fact, the working alliance had the strongest relationship with the willingness to engage in videoconferencing psychotherapy.

4.1.2 Attachment

Before conducting this study, this writer theorized that perhaps the perception that messaging-based therapies, which provide more anonymity and less intimacy than traditional in-person psychotherapy, would draw on those with avoidant attachment strategies as a way to engage in help-seeking activating attachment-related needs/ threats. However, the evidence revealed another direction. It revealed that those with

attachment anxiety were more willing to engage in phone and messaging-based psychotherapies in the clinical population. While further research is required to explore why that relationship may exist and if it holds true in larger, more representative samples, the qualitative responses offer some interesting possibilities. The first is the perception that many participants across both samples thought that messaging psychotherapy implies constant, immediate contact with the provider rather than waiting for a weekly session. This interpersonal strategy is much more consistent with an anxious attachment style and hypervigilance to the relationship quality.

Attachment anxiety is an interesting phenomenon characterized by ambivalence. This ambivalence is represented in this study as attachment anxiety is associated with a higher willingness to engage in in-person psychotherapy (among those who have previously received mental health treatment in the non-clinical population) and a higher willingness to engage in messaging and phone therapy in the clinical population. Attachment anxiety was also associated with a negative association with a working alliance in the clinical population. It poignantly demonstrates the dysfunction of the anxious style: hypervigilance to threats to a relationship and the need for reassurance do not improve the quality of the relationship. The qualitative data show that relationship quality is one of the major themes that individuals consider when choosing a mode of therapy.

Previous research on attachment style and the evaluation of relationships showed that those with a secure attachment style valued their in-person relationships more highly than their online relationships (Buote, 2009). In contrast, anxious individuals valued

online and in-person relationships equally poorly. Literature shows that increased relationship monitoring and the need for reassurance lower the quality of the relationship (Li & Chan, 2012; Shaver et al., 2005). When applied to telemental health modalities, it may be the same: hyper-fixation on threats to relationship quality may lead people to overweigh potential barriers to connection in telemental health. For instance, within the qualitative data, those in the non-clinical population with limited exposure to telemental health were preoccupied with whether the relationship would be "actual or real" or "natural" in telemental health. This concern was not as prevalent within the clinical sample responses (See Figure 11), consistent with research that demonstrates that satisfaction with the therapeutic alliance does not differ between in-person and telemental health modes of psychotherapy (Drago et al., 2016; Hilty et al., 2013; Shigekawa et al., 2018). It is also in keeping with reports that those with an anxious attachment style reported their online relationships as less satisfying (Ye, 2007).

However, despite reporting relationships as less satisfying, anxious individuals engage in more help-seeking behavior (Berry et al., 2014; Ciechanowski et al., 2002), a finding echoed in this study's results within the clinical sample of attachment anxiety having a positive relationship with willingness to engage in phone and messaging psychotherapy while also having a negative relationship with working alliance. It is part of the paradox of the anxiety attachment style that increased connection seeking and hypervigilance to the quality of a relationship does not contribute to the satisfaction with or the health of the relationship.

Attachment avoidance was not as fruitful of a predictor of willingness to engage in any form of psychotherapy. There are several possible explanations for this outcome, the first being that attachment avoidance is simply not related to engagement in psychotherapy. Within the subgroup of the non-clinical population that had not previously engaged in mental health services, there was a small negative association with willingness to engage in in-person or video-conferencing services, adding the evidence that those utilizing avoidance attachment strategies engage in treatment-seeking less.

Another explanation for the low impact of attachment avoidance within this study is again the issue of sampling. A surprisingly large portion of the non-clinical sample had previously engaged in mental health services (29%) and was female (74%). These factors increased the likelihood of endorsing willingness to engage in various forms of psychotherapy. A more representative sample that included more men and more individuals who have not ever received mental health services might have shed more light on the impact of avoidant attachment strategies and how they interact with different modes of psychotherapy. Individuals who use avoidant attachment strategies and work to make sure their attachment needs are not activated may also simply be less drawn to participate in a study about psychotherapy.

It is important to reiterate that attachment anxiety and avoidance strategies are not mutually exclusive. The evidence from this study bore out that in both samples attachment anxiety and avoidance are related, with both samples having a higher correlation between attachment anxiety and attachment avoidance than expected from

previous research (Mikulincer & Shaver, 2007). A 2012 meta-analysis examining the association between attachment anxiety and attachment avoidance suggests several possible explanations, most notably that attachment anxiety and avoidance tend to produce higher correlations when the participants are in a romantic relationship (Cameron et al., 2012), a hypothesis unable to be tested within this study.

Both attachment anxiety and avoidance are associated with a reduced resilience to life's stressors (Mikculiner & Shaver, 2007), and, in this study, attachment anxiety was associated with greater emotional/ behavioral difficulties. Within the qualitative responses, the clinical sample often referred to the ongoing stress related to the pandemic as a reason to continue psychotherapy on telemental health, providing some preliminary evidence that ongoing life stressors may encourage individuals to try or use telemental health services that they may have otherwise been more hesitant to use.

4.1.3 Sex Differences

There are well-established sex differences in treatment-seeking behavior that show that women engage in more treatment-seeking than men (Kessler et al., 1981), which was supported in the current study in which women exhibited a higher willingness to engage in a variety of psychotherapy options in the non-clinical sample than men. The current study expanded upon these findings to support evidence that prior experience with mental health treatment helps interacts with sex, in that while women did not see a change in willingness to engage in videoconferencing psychotherapy, men who had previously received some form of mental health treatment were much more likely to endorse willingness to engage in videoconferencing psychotherapy than those who had

not. This interaction was specific to prior mental health treatment, as prior experience with telehealth appointments increased the willingness to engage in video psychotherapy for both men and women. This finding is perhaps attributable to issues of stigma, with previous research demonstrating that identifying with masculine gender norms is associated with negative attitudes about help-seeking (Vogel et al., 2011; See Nam, 2010 for a meta-analytic review). It is possible that within this sample, men who have already engaged in mental health services have already overcome the stigma associated with those services and are thus more willing to engage in alternative modes of psychotherapy.

4.1.4 Symptom Severity

This study also found that symptom severity was related to willingness to engage in various modes of psychotherapy. This is consistent with prior research demonstrating that greater symptoms result in a greater likelihood of engaging in treatment-seeking (Fox et al., 2018). More emotional/behavioral difficulties were related to increased willingness to participate in in-person, videoconferencing, and phone psychotherapy but not related to willingness to engage in messaging in psychotherapy for the non-clinical population. Within the clinical population, greater PAS was related to willingness to engage in messaging and phone psychotherapy but not to in-person or video conferencing therapy, perhaps due to ceiling effects in willingness to participate in in-person or videoconferencing psychotherapy within the clinical population. In addition, the clinical population likely has more experience with phone and messaging psychotherapy than the non-clinical population. However, direct comparisons may not

be made because participants were not asked to specify the mode of telemental health they transitioned to during COVID. As previously noted, prior experience with telemental health global increases willingness to engage in telemental health. It is thus a possibility that prior experience with phone or messaging psychotherapy would increase willingness to engage in phone or messaging psychotherapy in the future.

4.1.5 Therapeutic Relationship and Therapist Effects

The results from this study also contribute to a growing body of research on therapist effects. It provides preliminary evidence that the therapist's attitudes about telehealth may influence the client's willingness to participate. In the clinical sample, participants who had a greater working alliance with their therapist also reported a greater willingness to participate in in-person and videoconferencing psychotherapy. This finding did not generalize to phone or messaging psychotherapy.

Examining the qualitative data allows us to hypothesize as to why working alliances did not generalize to all types of therapy; for instance, participants suspicious that a relationship could not be formed over messaging psychotherapy or that the quality of the relationship would be altered, such as not being "human" or "actual." Looking at the distribution of codes, participants in the non-clinical sample were much more occupied with whether the relationship was "real" than in the clinical sample (See Figure 11). It could be that those with telemental health experience view their relationship with their psychotherapist as "real/actual" and are less suspicious of the quality of the relationship than those unexperienced with telemental health.

4.2 Factors Used to Evaluate Psychotherapy Modalities

The second major question of this study was how do individuals evaluate which modality of therapy they select? This was captured in the qualitative data, which revealed 10 major themes. The inclusion of both a clinical and non-clinical population allows for comparing priorities between individuals with experience with telemental health and with individuals not experienced with telemental health. This is important for practitioners and researchers who would like to see what barriers to treatment-seeking remain for individuals who have not yet engaged in psychotherapy and the barriers remaining for those who have.

4.2.1 Qualitative similarities between samples

The most frequently discussed factors in both the clinical and non-clinical samples were whether the psychotherapist and client could see one another, whether they could converse easily, and whether they were "together." Many participants said that having a conversation and seeing their therapists were advantages of in-person and videoconferencing psychotherapy.

Across both samples, "togetherness" was an often-discussed factor. People value being together, often stating that an advantage of in-person psychotherapy was "being in the same room" without elaborating why togetherness was important. Other themes certainly shed light on this togetherness, and these themes included concerns about connection and the quality of the therapeutic relationship. However, it appears from the qualitative responses that people often value being together just for the sake of being together. This finding was undoubtedly influenced by the period in which this data was

collected, the Fall of 2021, after participants had potentially undergone isolation and separation from others during the pandemic.

Participants also valued being able to see their therapist and listed that as an advantage of in-person psychotherapy and videoconferencing psychotherapy. They pointed to being able to see reactions, including facial expressions and body language, as essential features of communication. Participants across both samples discussed sensation and perception and the impact of sensation and perception on communication thoroughly. Other scholars have noted that technology has mediating impacts on how sensory information is processed, for instance, delays in sound transmission changing the cadence of conversation or shifts in color emphasizing or hiding blushes and blemishes (Frittgen & Haltaufderheide, 2022). It appears that when considering modes of psychotherapy, participants are highly attuned to this mediation, and the impact changes in sensory inputs and outputs might have on psychotherapy.

4.2.2 Qualitative differences between samples

The clinical and student samples also had some differences in priorities. For instance, the clinical sample discussed the time spent in psychotherapy, psychotherapy activities, having to travel, and conveying understanding at a higher rate than the non-clinical sample. The non-clinical sample spent relatively more time discussing concerns about the connection or bond between the psychotherapist and client, whether the relationship was “actual” or “real,” and the overall quality of the relationship.

These differences highlight the perceived importance of the therapeutic relationship on willingness to engage in these modalities. Individuals who had already

established a relationship with a psychotherapist were much less concerned with the quality of that relationship being impacted by the modality. Given that prior experience with telehealth predicts willingness to engage in telemental health, one possibility is that inexperienced individuals harbor a bias against telemental health modalities, believing that the relationship quality will be weakened over these different platforms. However, once individuals experience the therapeutic relationship over telemental health, these concerns drop off, and logistic issues such as the time psychotherapy takes and how one must travel to get there become more paramount.

These findings are consistent with a recent literature analysis that found that mental health patients were more likely to accept a video consultation appointment if they had barriers to accessing the clinic, already had a relationship with the clinician, experienced minimal technical errors, expected the meeting to be impersonal, and had less complex presenting-problems (Moeller et al., 2022).

4.3 Attachment theory related themes across qualitative data

The qualitative themes were derived from a grounded theory approach, meaning that rather than providing attachment theory as a framework to understand the information provided by participants, the data provided by the participants informed the creation of the 10 novel themes. However, one of the ten themes, Relationship Factors, was clearly related to attachment needs. Participants were preoccupied with whether the telemental health modality could provide a "connection" or "bond," whether a relationship could be formed, and the quality of that relationship. Of the relationship qualities, the most represented within the final coding scheme across both samples was

whether the relationship was personal, intimate, or close. One major factor in evaluating telemental health modalities was whether close, personal relationships could be formed and maintained through telemental health.

A less direct theme related to attachment theory was concerns about safety, health, and the concept of an attachment threat. Mikucliner and Shaver's model of attachment suggests that the attachment system is activated in response to a threat to the self or the relationship. Within this model, the clinical sample's qualitative responses to the decision to stay or leave psychotherapy could be viewed in the context of the pandemic's threat to the therapeutic relationship. Within the second qualitative analysis, over half the participants referred to staying due to the ongoing pandemic (See Figure 18). They referenced both the stress caused by the uncertainty of the pandemic and concerns about their health and exposure to the virus. The majority of this sample chose to stay in psychotherapy (75%), suggesting that as their attachment system was activated, they stayed in the relationship. Likewise, in the first qualitative analysis of factors used to evaluate psychotherapy, both populations discussed personal well-being themes, including safety, illness, the pandemic, and mental health (See Figure 11). The idea of the COVID-19 pandemic activating attachment needs, and thus activating the use of attachment strategies, also finds support in evidence for increased appointment attendance (Silver et al., 2020) and reports of higher relational stress and conflict throughout the pandemic (Feeny & Fitzgerald, 2022). Future studies may shed light on whether these factors that emerged from the grounded theory design were influenced by the ongoing global threat to well-being during data collection.

4.4 Limitations

The main limitations of this study were sampling bias and sample size. A surprising number of individuals within the non-clinical sample, recruited to help illustrate the opinions and attitudes of those who have not engaged in psychotherapy, had previously participated in mental health services. While this allowed for comparisons between those who had and had not engaged in mental health services within this sample, it also suggests this sample is not representative. A 2019 CDC report (Terlizzi & Zablotsky, 2019) indicates that 19.2% of U.S. adults have participated in "any mental health service," compared to this study's sample of 28.7% who have received "mental health services." This may be due to cohort effects, as the CDC report indicates that the percentage of adults who have received mental health services decreases with age, and the current sample was relatively young. It could also be an issue of selection bias, with individuals self-selecting into a study about psychotherapy, and sampling from individuals majoring in psychology may produce participants who have an intrinsic interest in mental health. A more representative sample may have less experience with mental health services, which was shown to influence willingness to engage in psychotherapy in this study.

In addition, participants across both samples were not asked to specifically identify which psychotherapy modalities they had experience with. While all participants in the clinical sample reported they had firsthand experience with in-person psychotherapy, as specified in the recruiting process, they were not asked to specify which modalities of telehealth they participated in (e.g., videoconferencing, phone, or

messaging). The training clinic in which half of the clinical population was recruited from transitioned from in-person to a two-week period of no psychotherapy, to phone psychotherapy, to videoconferencing psychotherapy over the first few months of the COVID-19 pandemic. However, little is known about the telehealth experiences of the Mturk sample. Further, few likely had experience with messaging psychotherapy as that modality was not implemented within the training clinic sample. Given the difference in responses between those who had experienced telehealth and those who had not, it is a possibility that many of the concerns generated about messaging psychotherapy in the qualitative responses and the general unwillingness to participate in messaging psychotherapy in the quantitative analysis are driven by bias and inexperience with the modality.

The clinical sample in this study was small and limited by the homogeneity of the sample. Differences between groups were limited in their analysis; for example, relatively few individuals perceived their therapist's attitude about telehealth as doubtful compared to those favorable toward telehealth. Predictions about behavior were also limited by the relatively few individuals within the sample who elected to end therapy rather than participate in telehealth. A larger sample would allow for a more robust analysis.

4.5 Future Directions

Attachment style is only one of many individual differences that impact treatment-seeking behavior in a telehealth context. Future studies may collect more socio-cultural data and information about individual differences to consider the various

individual and cultural differences and the intersections of those differences when conceptualizing someone's decision to select a mental health modality. For example, identifying as LGBTQ+ increases anxiety around help-seeking compared to heterosexual peers (Lytle et al., 2018; McNair & Bush, 2016). Individual factors in religious commitment (Wesselmann & Graziano, 2010) and racial background (Cauce et al., 2002; Cheng et al., 2015; Guo et al., 2015) have also influenced treatment-seeking behavior.

Socioeconomic status (SES) has also been shown to interact with mental health stigma (Foster & O'Mealey, 2022) and treatment-seeking behavior. (US, 2012). Future studies could explore whether SES impacts modality selection, given the perception that telehealth modalities may lower treatment costs, as suggested by the qualitative portion of this study.

Other individual differences can impact the adoption of telehealth services, such as age. While clinical trials of evidence-based treatments delivered over telecommunication devices typically show that they are effective across the age span (Price & Gros, 2014), there are still age differences in the adaption of telehealth services due to other factors. A national study showed that controlling for other sociodemographic variables, older adults were less likely to own devices such as smartphones and laptops and less likely to use them to communicate with their health care providers (Onyeaka et al., 2020). These structural differences remained a concern during the COVID-19 crisis, where one report found that "telemedicine unreadiness" due to hearing impairment, dementia, vision impairment, not owning internet-enabled

devices, and lack of prior experience using email or the Internet remained significant barriers to adapting to telehealth (Lam et al., 2020). Finally, comfort with computers varies with age, with greater age associated with greater computer anxiety (Di Giacomo et al., 2019) and less comfort with health-related technology (Cimperman et al., 2013).

The treatment-seeking behavior among individuals who favor messaging psychotherapy is rich ground for further study. People who use or prefer text messaging-based services should be recruited to see how they differ from those who engage in in-person. While the present study had relatively few people who preferred text or phone-based therapy modalities to in-person psychotherapy, the results suggest that there may be some differences in attachment should the sample size be large enough and perhaps more adequately sample from individuals actively engaged in messaging psychotherapy. The Mturk participants in this sample reported more willingness to engage in messaging psychotherapy and may provide future researchers with an interesting avenue to examine those who have more online interactions. The personality differences between these groups may better help target the treatment types used on these different platforms.

There is also an interesting line of questioning about the impact of therapist factors on the decision to engage in telemental health. There still exist many clinicians who argue that telemental health modalities cannot convey the same quality of a therapeutic relationship or are "disembodied," not unlike the qualitative responses in the current study that suggested that the relationship purveyed online is somehow less "real" or "genuine" (Jarrette-Kenny, 2022). In addition, the therapeutic relationship has been shown to be influenced by the attachment style of both the therapist and the client (Egozi

et al., 2021; Rubino et al., 2000). Future studies may also include the therapist's attachment style, how that influences their perception of telemental health modalities, and the impact on the therapeutic relationship formed online.

4.6 Conclusion

This study provides preliminary evidence that those with high attachment anxiety are more willing to try telemental health services. The study found further evidence that previous experience in telehealth predicts willingness to participate in telemental health. This study also provides insight into how telemental modalities of psychotherapy are evaluated by experienced consumers of mental health services and the inexperienced. The ten themes of ease, accessibility, technology, sensation and perception, time, environment, treatment efficacy, relationship factors, communication, and individual factors give researchers and psychotherapists several domains in which further investigation can be conducted in both how different telemental health modalities compare, rather than pre-treatment impressions or biases, as well as considerations for making collaborative decisions about which type of psychotherapy to recommend.

REFERENCES

Adams, G. C., Wrath, A. J., & Meng, X. (2018). The relationship between adult attachment and mental health care utilization: A systematic review. *The Canadian Journal of Psychiatry*, *63*(10), 651–660. https://doi.org/10.1177/0706743718779933

Ainsworth, M. D., Blehar, M., Waters, E., & Wall, S. (1978). Patterns of attachment: A psychological study of the strange situation. *Psychology Press*.

Appleton, R., Williams, J., San Juan, N. V., Needle, J. J., Schlief, M., Jordan, H., Rains, L. S., Goulding, L., Badhan, M., & Roxburgh, E. (2021). Implementation, Adoption, and Perceptions of Telemental Health During the COVID-19 Pandemic: Systematic Review. *Journal of Medical Internet Research*, *23*(12), e31746.

Backhaus, A., Agha, Z., Maglione, M. L., Repp, A., Ross, B., Zuest, D., Rice-Thorp, N. M., Lohr, J., & Thorp, S. R. (2012). Videoconferencing psychotherapy: A systematic review. *Psychological Services, 9*(2), 111–131. https://doi.org/10.1037/a0027924

Barnett, M. L., & Huskamp, H. A. (2019). Telemedicine for mental health in the United States: Making progress, still a long way to go. *Psychiatric Services*, *71*(2), 197–198. https://doi.org/10.1176/appi.ps.201900555

Bartholomew, K. (1990). Avoidance of intimacy: An attachment perspective. *Journal of Social and Personal Relationships, 7*(2), 147–178. https://doi.org/10.1177/0265407590072001

Bernecker, S. L., Levy, K. N., & Ellison, W. D. (2014). A meta-analysis of the relation between patient adult attachment style and the working alliance. *Psychotherapy Research*, *24*(1), 12–24. https://doi.org/10.1080/10503307.2013.809561

Berry, K., Roberts, N., Danquah, A., & Davies, L. (2014). An exploratory study of associations between adult attachment, health service utilisation and health service costs. *Psychosis*, *6*(4), 355–358. https://doi.org/10.1080/17522439.2014.899386

Blackhart, G. C., Fitzpatrick, J., & Williamson, J. (2014). Dispositional factors predicting use of online dating sites and behaviors related to online dating. *Computers in Human Behavior*, *33*, 113–118. https://doi.org/10.1016/j.chb.2014.01.022

Bouchard, S., Paquin, B., Payeur, R., Allard, M., Rivard, V., Fournier, T., Renaud, P., & Lapierre, J. (2004). Delivering cognitive-behavior therapy for panic disorder with agoraphobia in videoconference. *Telemedicine Journal and E-Health*, *10*(1), 13–24. https://doi.org/10.1089/153056204773644535

Bouchard, S., Payeur, R., Rivard, V., Allard, M., Paquin, B., Renaud, P., & Goyer, L. (2000). Cognitive behavior therapy for panic disorder with agoraphobia in videoconference: Preliminary results. *Cyberpsychology and Behavior*, *3*(6), 999–1007. https://doi.org/10.1089/109493100452264

Bowlby, J. (1977). The making and breaking of affectional bonds. *British Journal of Psychiatry*, *130*(5), 421-431. https://doi.org/10.1192/bjp.130.5.421

Box, G. E. P., & Tidwell, P. W. (1962). Transformation of the independent variables. *Technometrics*, *4*(4), 531–550.

Brennan, K. A., Clark, C. L., & Shaver, P. R. (1998). Self-report measurement of adult attachment: An integrative overview. In J. A. Simpson & W. S. Rholes (Eds.), *Attachment theory and close relationships* (pp. 46–76). The Guilford Press.

Brown, D., Rodgers, Y. H., & Kapadia, K. (2008). Multicultural considerations for the application of attachment theory. *American Journal of Psychotherapy*, *62*(4), 353–363. https://doi.org/10.1176/appi.psychotherapy.2008.62.4.353

Brumbaugh, C. C., & Fraley, R. C. (2006). Transference and attachment: How do attachment patterns get carried forward from one relationship to the next? *Personality and Social Psychology Bulletin*, *32*(4), 552–560. https://doi.org/10.1177/0146167205282740

Brumbaugh, C. C., & Fraley, R. C. (2007). Transference of attachment patterns: How important relationships influence feelings toward novel people. *Personal Relationships*, *14*(4), 513–530. https://doi.org/10.1111/j.1475-6811.2007.00169.x

Buote, V. M., Wood, E., & Pratt, M. (2009). Exploring similarities and differences between online and offline friendships: The role of attachment style. *Computers in Human Behavior*, *25*(2), 560–567. https://doi.org/10.1016/j.chb.2008.12.022

Cameron, J. J., Finnegan, H., & Morry, M. M. (2012). Orthogonal dreams in an oblique world: A meta-analysis of the association between attachment anxiety and avoidance. *Journal of Research in Personality*, *46*(5), 472–476. https://doi.org/https://doi.org/10.1016/j.jrp.2012.05.001

Cauce, A. M., Domenech-Rodríguez, M., Paradise, M., Cochran, B. N., Shea, J. M., Srebnik, D., & Baydar, N. (2002). Cultural and contextual influences in mental

health help seeking: A focus on ethnic minority youth. *Journal of Consulting and Clinical Psychology*, *70*(1), 44–55. https://doi.org/10.1037/0022-006X.70.1.44

Chandler, J., & Shapiro, D. (2016). Conducting clinical research using crowdsourced convenience samples. *Annual Review of Clinical Psychology*, *12*, 53–81. https://doi.org/10.1146/annurev-clinpsy-021815-093623

Cheng, H. L., Mcdermott, R. C., & Lopez, F. G. (2015). Mental health, self-stigma, and help-seeking intentions among emerging adults: An attachment perspective. *The Counseling Psychologist*, *43*(3), 463–487. https://doi.org/10.1177/0011000014568203

Chin, K., Edelstein, R. S., & Vernon, P. A. (2019). Attached to dating apps: Attachment orientations and preferences for dating apps. *Mobile Media and Communication*, *7*(1), 41–59. https://doi.org/10.1177/2050157918770696

Ciechanowski, P. S., Walker, E. A., Katon, W. J., & Russo, J. E. (2002). Attachment theory: A model for health care utilization and somatization. *Psychosomatic Medicine*, *64*(4), 660–667. https://doi.org/10.1097/01.PSY.0000021948.90613.76

Connolly, S. L., Miller, C. J., Lindsay, J. A., & Bauer, M. S. (2020). A systematic review of providers' attitudes toward telemental health via videoconferencing. *Clinical Psychology: Science and Practice*, *27*(2), e12311. https://doi.org/https://doi.org/10.1111/cpsp.12311

Creech, S. K., Evardone, M., Braswell, L., & Hopwood, C. J. (2010). Validity of the personality assessment screener in veterans referred for psychological testing.

Military Psychology, *22*(4), 465–473. https://doi.org/10.1080/08995605.2010.513265

de Jong, Y., van der Willik, E. M., Milders, J., Voorend, C. G. N., Morton, R. L., Dekker, F. W., Meuleman, Y., & van Diepen, M. (2021). A meta-review demonstrates improved reporting quality of qualitative reviews following the publication of COREQ-and ENTREQ-checklists, regardless of modest uptake. *BMC Medical Research Methodology*, *21*(1), 1–11.

Diener, M. J., & Monroe, J. M. (2011). The relationship between adult attachment style and therapeutic alliance in individual psychotherapy: A meta-analytic review. *Psychotherapy*, *48*(3), 237–248. https://doi.org/10.1037/a0022425

Dobkin, R. D., Mann, S. L., Gara, M. A., Interian, A., Rodriguez, K. M., & Menza, M. (2020). Telephone-based cognitive behavioral therapy for depression in Parkinson disease: A randomized controlled trial. *Neurology*, *94*(16), E1764–E1773. https://doi.org/10.1212/WNL.0000000000009292

Doran, J. M. (2016). The working alliance: Where have we been, where are we going? *Psychotherapy Research*, *26*(2), 146–163. https://doi.org/10.1080/10503307.2014.954153

Egozi, S., Tishby, O., & Wiseman, H. (2021). Therapeutic distance in client-therapist narratives: client attachment, therapist attachment, and dyadic effects. *Psychotherapy Research*, *31*(8), 963–976.

Erceg-Hurn, D. M., & Mirosevich, V. M. (2008). Modern robust statistical methods: An easy way to maximize the accuracy and power of your research. *American Psychologist*, *63*(7), 591–601. https://doi.org/10.1037/0003-066X.63.7.591

Feeney, J. A., & Fitzgerald, J. (2022). Autonomy–connection tensions, stress, and attachment: The case of COVID-19. Current Opinion in Psychology, 43, 18-23.

Fernandez, E., Woldgabreal, Y., Day, A., Pham, T., Gleich, B., & Aboujaoude, E. (2021). Live psychotherapy by video versus in-person: A meta-analysis of efficacy and its relationship to types and targets of treatment. *Clinical Psychology & Psychotherapy*, *28*(6), 1535-1549. https://doi.org/10.1002/cpp.2594

Flückiger, C., Del, A. C., Wampold, B. E., & Horvath, A. O. (2018). The alliance in adult psychotherapy: A meta-analytic aynthesis. *Psychotherapy*, *55*(4), 316–340. https://doi.org/10.1037/pst0000172

Foster, S., & O'Mealey, M. (2022). Socioeconomic status and mental illness stigma: the impact of mental illness controllability attributions and personal responsibility judgments. *Journal of Mental Health*, *31*(1), 58–65. https://doi.org/10.1080/09638237.2021.1875416

Fox, A. B., Smith, B. N., & Vogt, D. (2018). How and when does mental illness stigma impact treatment seeking? Longitudinal examination of relationships between anticipated and internalized stigma, symptom severity, and mental health service use. *Psychiatry Research*, *268*, 15-20.

Fraley, R. C., & Waller, N. G. (1998). Adult attachment patterns: A test of the typological model. In J. A. Simpson, & W. S. Rholes (Eds.), *Attachment theory and close relationships* (pp. 77-114). Guilford Press.

Fraley, R., Hudson, N., Heffernan, M., & Segal, N. (2015). Are adult attachment styles categorical or dimensional? A taxometric analysis of general and relationship-specific attachment orientations. *Journal of Personality and Social Psychology*, *109*(2), 354-368. https://doi.org/10.1037/pspp0000027

Friese, S. (2012). *Qualitative data analysis with ATLAS.ti*. SAGE Publishing.

Frittgen, E. M., & Haltaufderheide, J. (2022). "Can you hear me?": Communication, relationship and ethics in video-based telepsychiatric consultations. *Journal of Medical Ethics*, *48*(1), 22–30. https://doi.org/10.1136/medethics-2021-107434

Fusch, P. I., & Ness, L. R. (2015). Are we there yet? Data saturation in qualitative research. *The Qualitative Report*, *20*(9), 1408-1416. https://nsuworks.nova.edu/tqr/

Garcia, K. M., Nanavaty, N., Nouzovsky, A., Primm, K. M., McCord, C. E., & Garney, W. R. (2021). Rapid transition to telepsychology: Health service psychology trainee responses amidst a global Covid-19 crisis from an ecological perspective. *Training and Education in Professional Psychology*, *16*(1), 87–94. https://doi.org/10.1037/tep0000369

Germain, V., Marchand, A., Bouchard, S., Drouin, M. S., & Guay, S. (2009). Effectiveness of cognitive behavioural therapy administered by videoconference for posttraumatic stress disorder. *Cognitive Behaviour Therapy*, *38*(1), 42–53. https://doi.org/10.1080/16506070802473494

Ghosh, D., & Vogt, A. (2012). Outliers: An evaluation of methodologies. *Joint Statistical Meetings*, *2012* (pp. 3455-3460). Available at: http://www.asasrms.org/Proceedings/y2012/Files/304068_72402.pdf

Glaser, B., & Strauss, A. (1967). *The discovery of grounded theory*. Aldine.

Graham, J. M., & Unterschute, M. S. (2015). A reliability generalization meta-analysis of self-report measures of adult attachment. *Journal of Personality Assessment*, *97*(1), 31–41. https://doi.org/10.1080/00223891.2014.927768

Griffin, D., & Bartholomew, K. (1994). Models of the self and other: Fundamental dimensions underlying measures of adult attachment. *Journal of Personality and Social Psychology*, *67*(3), 430–445. https://doi.org/10.1037/0022-3514.67.3.430

Guo, S., Nguyen, H., Weiss, B., Ngo, V. K., & Lau, A. S. (2015). Linkages between mental health need and help-seeking behavior among adolescents: Moderating role of ethnicity and cultural values. *Journal of Counseling Psychology*, *62*(4), 682–693. https://doi.org/10.1037/cou0000094

Hames, J. L., Bell, D. J., Perez-Lima, L. M., Holm-Denoma, J. M., Rooney, T., Charles, N. E., Thompson, S. M., Mehlenbeck, R. S., Tawfik, S. H., & Fondacaro, K. M. (2020). Navigating uncharted waters: Considerations for training clinics in the rapid transition to telepsychology and telesupervision during COVID-19. *Journal of Psychotherapy Integration*, *30*(2), 348-365. http://dx.doi.org/10.1037/int0000224

Hart, J., Nailling, E., Bizer, G. Y., & Collins, C. K. (2015). Attachment theory as a framework for explaining engagement with Facebook. *Personality and Individual Differences*, *77*, 33–40. https://doi.org/10.1016/j.paid.2014.12.016

Haslam, N. (2003). Categorical versus dimensional models of mental disorder: The taxometric evidence. *Australian & New Zealand Journal of Psychiatry*, *37*(6), 696–704. https://doi.org/10.1080/j.1440-1614.2003.01258.x

Hayes, A. F., & Krippendorff, K. (2007). Answering the call for a standard reliability measure for coding data. *Communication Methods and Measures*, *1*(1), 77–89. https://doi.org/10.1080/19312450709336664

Hazan, C., & Shaver, P. (1987). Romantic love conceptualized as an attachment process. *Journal of Personality and Social Psychology*, *52*(3), 511–524. https://doi.org/10.1037/0022-3514.52.3.511

Helou, S., El Helou, E., Abou-Khalil, V., Wakim, J., El Helou, J., Daher, A., & El Hachem, C. (2020). The effect of the covid-19 pandemic on physicians' use and perception of telehealth: The case of Lebanon. *International Journal of Environmental Research and Public Health*, *17*(13), 1–17. https://doi.org/10.3390/ijerph17134866

Hilty, D. M., Ferrer, D. C., Parish, M. B., Johnston, B., Callahan, E. J., & Yellowlees, P. M. (2013). The effectiveness of telemental health: A 2013 review. *Telemedicine and E-Health*, *19*(6), 444–454. https://doi.org/10.1089/tmj.2013.0075

Hirko, K. A., Kerver, J. M., Ford, S., Szafranski, C., Beckett, J., Kitchen, C., & Wendling, A. L. (2020). Telehealth in response to the COVID-19 pandemic:

Implications for rural health disparities. *Journal of the American Medical Informatics Association*, *27*(11), 1816–1818. https://doi.org/10.1093/jamia/ocaa156

Horvath, A. O., & Greenberg, L. S. (1989). Development and validation of the Working Alliance Inventory. *Journal of Counseling Psychology*, *36*(2), 223–233. https://doi.org/10.1037/0022-0167.36.2.223

Hull, T. D., & Mahan, K. (2016). A study of asynchronous mobile-enabled SMS text psychotherapy. *Telemedicine and e-Health*, *23*(3), 240–247. https://doi.org/10.1089/tmj.2016.0114

Hull, T. D., Malgaroli, M., Connolly, P. S., Feuerstein, S., & Simon, N. M. (2020). Two-way messaging therapy for depression and anxiety: Longitudinal response trajectories. *BMC Psychiatry*, *20*(1). https://doi.org/10.1186/s12888-020-02721-x

Huprich, S. K., & Bornstein, R. F. (2007). An overview of issues related to categorical and dimensional models of personality disorder assessment. *Journal of Personality Assessment*, *89*(1), 3–15. doi:10.1080/00223890701356904

Jameson, J. P., Farmer, M. S., Head, K. J., Fortney, J., & Teal, C. R. (2011). VA community mental health service providers' utilization of and attitudes toward telemental health care: The gatekeeper's perspective. *Journal of Rural Health*, *27*(4), 425–432. https://doi.org/10.1111/j.1748-0361.2011.00364.x

Jarrette-Kenny, M. (2022). The disembodied self and the future of psychotherapy. In M. Jarrette-Kenny & M. Jaffe (Eds.), *Social work in the age of disconnection* (pp. 110–137). Routledge.

Jenkins-Guarnieri, M. A., Pruitt, L. D., Luxton, D. D., & Johnson, K. (2015). Patient perceptions of telemental health: Systematic review of direct comparisons to in-person psychotherapeutic treatments. *Telemedicine and E-Health*, *21*(8), 652–660. https://doi.org/10.1089/tmj.2014.0165

Johnson, S. M. (2019). *Attachment theory in practice: Emotionally focused therapy (EFT) with individuals, couples, and families*. Guilford Publications.

Johnson, S. M., & Greenberg, L. S. (1992). Emotionally focused therapy: Restructuring attachment. In S. H. Budman, M. F. Hoyt, & S. Friedman (Eds.), *The first session in brief therapy* (pp. 204–224). Guilford Press.

Kelley, S. E., Edens, J. F., & Douglas, K. S. (2018). Concurrent validity of the personality assessment screener in a large sample of offenders. *Law and Human Behavior*, *42*(2), 156–166. https://doi.org/10.1037/LHB0000276

Kerr, G. H. G., Fischer, C., & Reulke, R. (2015). Reliability assessment for remote sensing data: beyond Cohen's kappa. *2015 IEEE International Geoscience and Remote Sensing Symposium (IGARSS)*, 4995–4998.

Kessler, R. C., Brown, R. L., & Broman, C. L. (1981). Gender differences in psychiatric help-seeking: Evidence from four large-scale surveys. *Journal of Health and Social Behavior*, *22*(1), 49–64. https://doi.org/10.2307/2136367

Kowert, R., & Oldmeadow, J. A. (2014). Playing for social comfort: Online video game play as a social accommodator for the insecurely attached. *Computers in Human Behavior*, *53*, 556–566. https://doi.org/10.1016/j.chb.2014.05.004

Krippendorff, K. (2018). *Content analysis: An introduction to its methodology*. SAGE Publishing.

Kuckartz, U. (2014). *Qualitative text analysis* (2nd ed.). SAGE Publishing.

Levy, K. N., & Johnson, B. N. (2019). Attachment and psychotherapy: Implications from empirical research. *Canadian Psychology*, *60*(3), 178–193. https://doi.org/10.1037/cap0000162

Li, T., & Chan, D. K. S. (2012). How anxious and avoidant attachment affect romantic relationship quality differently: A meta-analytic review. *European journal of social psychology*, *42*(4), 406-419.

Lins, S., Hayder-Beichel, D., Rücker, G., Motschall, E., Antes, G., Meyer, G., & Langer, G. (2014). Efficacy and experiences of telephone counselling for informal carers of people with dementia. *Cochrane Database of Systematic Reviews*, *9*. https://doi.org/10.1002/14651858.CD009126.pub2

Lopez, F. G., Melendez, M. C., Sauer, E. M., Berger, E., & Wyssmann, J. (1998). Internal working models, self-reported problems, and help-seeking attitudes among college students. *Journal of Counseling Psychology, 45*(1), 79–83. https://doi.org/10.1037/0022-0167.45.1.79

Main, M., & Solomon, J. (1990). Procedures for identifying infants as disorganized/disoriented during the Ainsworth Strange Situation. In M. T. Greenberg, D. Cicchetti, & E. M. Cummings (Eds.), *Attachment in the preschool years: Theory, research, and intervention.* (pp. 121–160). University of Chicago Press.

Mallinckrodt, B. (2010). The psychotherapy relationship as attachment: Evidence and implications. *Journal of Social and Personal Relationships*, *27*(2), 262–270. https://doi.org/10.1177/0265407509360905

Mallinckrodt, B., & Jeong, J. S. (2015). Meta-analysis of client attachment to therapist: Associations with working alliance and client pretherapy attachment. *Psychotherapy*, *52*(1), 134–139. https://doi.org/10.1037/a0036890

Martin, D. J., Garske, J. P., & Davis, M. K. (2000). Relation of the therapeutic alliance with outcome and other variables: A meta-analytic review. *Journal of Consulting and Clinical Psychology*, *68*(3), 438–450. https://doi.org/10.1037/0022-006X.68.3.438

McCredie, M. N., Truong, T. N., Edens, J. F., & Morey, L. C. (2020). Temporal stability and dynamic convergence of the Personality Assessment Screener in a prison sample. *Psychological Assessment*, *32*(2), 205–210. https://doi.org/10.1037/pas0000770

Mikulincer, M., & Shaver, P. R. (2007). *Attachment in adulthood: Structure, dynamics, and change*. The Guilford Press.

Mikulincer, M., Shaver, P. R., Bar-On, N., & Ein-Dor, T. (2010). The pushes and pulls of close relationships: Attachment insecurities and relational ambivalence. *Journal of Personality and Social Psychology*, *98*(3), 450–468. https://doi.org/10.1037/a0017366

Mikulincer, M., Shaver, P. R., & Berant, E. (2013). An attachment perspective on therapeutic processes and outcomes. *Journal of Personality*, *81*(6), 606–616. https://doi.org/10.1111/j.1467-6494.2012.00806.x

Moeller, A. M., Christensen, L. F., Hansen, J. P., & Andersen, P. T. (2022). Patients' acceptance of video consultations in the mental health services: A systematic review and synthesis of qualitative research. *Digital Health, 8*. [Online]. https://doi.org/10.1177/20552076221075148

Moise, N., Thanataveerat, A., Florez-Salamanca, L., Ye, S., Qian, M., Obi, M., & Alcantara, C. (2020). Willingness to engage in traditional and novel depression treatment modalities among myocardial infarction survivors. *Journal of General Internal Medicine*, *35*(5), 1620–1622. https://doi.org/10.1007/s11606-019-05406-8

Morey, L. C. (1997). The Personality Assessment Screener (PAS) Technical manual. Odessa, FL: Psychological Assessment Resources.

National Center for Health Statistics. (2012). *Health, United States, 2011: With special feature on socioeconomic status and health*. https://www.cdc.gov/nchs/data/hus/hus12.pdf

Nelson, E.-L., Barnard, M., & Cain, S. (2003). Treating childhood depression over videoconferencing. *Telemedicine Journal and E-Health*, *9*(1), 49–55. https://doi.org/10.1089/153056203763317648

Nitzburg, G. C., & Farber, B. A. (2013). Putting up emotional (Facebook) walls? Attachment status and emerging adults' experiences of social networking sites.

Journal of Clinical Psychology, *69*(11), 1183–1190. https://doi.org/10.1002/jclp.22045

Osborne, J. W. (2008). *Best practices in quantitative methods*. SAGE Publishing.

Paetzold, R. L., Rholes, W. S., & Kohn, J. L. (2015). Disorganized attachment in adulthood: Theory, measurement, and implications for romantic relationships. *Review of General Psychology*, *19*(2), 146–156. https://doi.org/10.1037/gpr0000042

Picardi, A., Martinotti, G., Paci, M., Simi, C., & Caroppo, E. (2011). Reliability of self-reported attachment style in patients with severe psychopathology. *Journal of Personality Assessment*, *93*(5), 491–499. https://doi.org/10.1080/00223891.2011.594128

Rubino, G., Barker, C., Roth, T., & Fearon, P. (2000). Therapist empathy and depth of interpretation in response to potential alliance ruptures: The role of therapist and patient attachment styles. *Psychotherapy Research*, *10*(4), 408–420. doi: 10.1093/ptr/10.4.408

Ruskin, P. E., Silver-Aylaian, M., Kling, M. A., Reed, S. A., Bradham, D. D., Hebel, J. R., Barrett, D., Knowles, F. I. I. I., & Hauser, P. (2004). Treatment outcomes in depression: Comparison of remote treatment through telepsychiatry to in-person treatment. *The American Journal of Psychiatry*, *161*(8), 1471–1476. https://doi.org/10.1176/appi.ajp.161.8.1471

Sanchez Gonzalez, M. L., McCord, C. E., Dopp, A. R., Tarlow, K. R., Dickey, N. J., McMaughan, D. K., & Elliott, T. R. (2019). Telemental health training and

delivery in primary care: A case report of interdisciplinary treatment. *Journal of Clinical Psychology*, *75*(2), 260–270. https://doi.org/10.1002/jclp.22719

Secon, H. (2020, June 3). An interactive map of the US cities and states still under lockdown and those that are reopening. *Business Insider*. https:// www.businessinsider.com/us-map-stay-at-home-orders-lockdowns2020-3

Senanayake, B., Wickramasinghe, S. I., Chatfield, M. D., Hansen, J., Edirippulige, S., & Smith, A. C. (2019). Effectiveness of text messaging interventions for the management of depression: A systematic review and meta-analysis. *Journal of Telemedicine and Telecare*, *25*(9), 513–523. https://doi.org/10.1177/1357633X19875852

Shaver, P. R., Schachner, D. A., & Mikulincer, M. (2005). Attachment style, excessive reassurance seeking, relationship processes, and depression. *Personality and Social Psychology Bulletin*, *31*(3), 343-359.

Silver, Z., Coger, M., Barr, S., Drill, R., Silver, Z., Coger, M., Barr, S., & Drill, R. (2020). Psychotherapy at a public hospital in the time of COVID-19: Telehealth and implications for practice. *Counselling Psychology Quarterly*, *34*(3/4), 499-507. https://doi.org/10.1080/09515070.2020.1777390

Simms, D. C., Gibson, K., & O'Donnell, S. (2011). To use or not to use: Clinicians' perceptions of telemental health. *Canadian Psychology*, *52*(1), 41–51. https://doi.org/10.1037/a0022275

Simpson, J. A., Rholes, W. S., & Nelligan, J. S. (1992). Support seeking and support giving within couples in an anxiety-provoking situation: The role of attachment

styles. *Journal of Personality and Social Psychology*, *62*(3), 434–446. https://doi.org/10.1037/0022-3514.62.3.434

Sroufe, L. A. (2005). Attachment and development: A prospective, longitudinal study from birth to adulthood. *Attachment and Human Development*, *7*(4), 349–367. https://doi.org/10.1080/14616730500365928

Strauss, A., & Corbin, J. (1998). *Basics of qualitative research: Techniques and grounded theory procedures for developing grounded theory* (2nd ed.). SAGE Publishing. https://doi.org/10.2307/328955

Tabachnick, B. G., Fidell, L. S., & Ullman, J. B. (2007). *Using multivariate statistics* (5th ed). Pearson Boston, MA.

Tekin, M. S., Özdemir, N., & Şahin, Ş. K. (2021). Effect of attachment styles, emotional regulation difficulty and mindful attention levels on treatment motivation in patients with substance use disorder. *Journal of Substance Use*, *26*(4), 441–448. https://doi.org/10.1080/14659891.2020.1846807

Terlizzi, E. P., & Zablotsky, B. (2019). *Key findings data from the national health interview survey*. https://www.cdc.gov/nchs/products/index.htm.

Tichenor, V., & Hill, C. E. (1989). A comparison of six measures of working alliance. *Psychotherapy: Theory, Research, Practice, Training*, *26*(2), 195-199. https://doi.org/10.1037/h0085419

Tong, A., Sainsbury, P., & Craig, J. (2007). Consolidated criteria for reporting qualitative research (COREQ): A 32-item checklist for interviews and focus groups.

International Journal for Quality in Health Care, *19*(6), 349–357. doi: 10.1093/intqhc/mzm042

Toscos, T., Carpenter, M., Drouin, M., Roebuck, A., Kerrigan, C., & Mirro, M. (2018). College students' experiences with, and willingness to use, different types of telemental health resources: Do gender, depression/anxiety, or stress levels matter? *Telemedicine and E-Health*, *24*(12), 998–1005. https://doi.org/10.1089/tmj.2017.0243

Tuerk, P. W., Yoder, M., Ruggiero, K. J., Gros, D. E., & Acierno, R. (2010). A pilot study of prolonged exposure therapy for posttraumatic stress disorder delivered via telehealth technology. *Journal of Traumatic Stress*, *23*(1), 116–123. doi: 10.1002/jts.20494

Vaillancourt-Morel, M.-P., Daspe, M.-È., Lussier, Y., & Giroux-Benoît, C. (2020). For the love of being liked: A moderated mediation model of attachment, likes-seeking behaviors, and problematic Facebook use. *Addiction Research & Theory*, *28*(5), 397–405. https://doi.org/10.1080/16066359.2019.1672667

Valdez, R. S., Rogers, C. C., Claypool, H., Trieshmann, L., Frye, O., Wellbeloved-Stone, C., & Kushalnagar, P. (2021). Ensuring full participation of people with disabilities in an era of telehealth. *Journal of the American Medical Informatics Association*, *28*(2), 389–392. https://doi.org/10.1093/jamia/ocaa297

Van Ijzendoorn, M. H., & Sagi-Schwartz, A. (2008). *Cross-cultural patterns of attachment: Universal and contextual dimensions.* In J. Cassidy & P. R. Shaver

(Eds.), *Handbook of attachment: Theory, research, and clinical applications* (pp. 880–905). The Guilford Press.

Vogel, D. L., & Wei, M. (2005). Adult attachment and help-seeking intent: The mediating roles of psychological distress and perceived social support. *Journal of Counseling Psychology*, *52*(3), 347–357. https://doi.org/10.1037/0022-0167.52.3.347

Wesselmann, E. D., & Graziano, W. G. (2010). Sinful and/or possessed? Religious beliefs and mental illness stigma. *Journal of Social and Clinical Psychology*, *29*(4), 402–437. https://doi.org/10.1521/jscp.2010.29.4.402

What is telehealth? (2020). U.S. Department of Health & Human Services. https://www.hhs.gov/hipaa/for-professionals/faq/3015/what-is-telehealth/index.html

Widiger, T. A. (1992). Categorical versus dimensional classification: Implications from and for research. *Journal of Personality Disorders*, *6*(4), 287–300. http://dx.doi.org/10.1521/pedi.1992.6.4.287

Ye, J. (2007). Attachment style differences in online relationship involvement: An examination of interaction characteristics and relationship satisfaction. *CyberPsychology & Behavior*, *10*(4), 605–607. https://doi.org/10.1089/cpb.2007.9982

Young, J. E., Klosko, J. S., & Weishaar, M. E. (2003). Schema therapy: A practitioner's guide. Guilford Press.

APPENDIX A

FIGURES

Figure 1
Willingness to Engage in Videoconferencing psychotherapy by Sex and Prior Mental Health Treatment

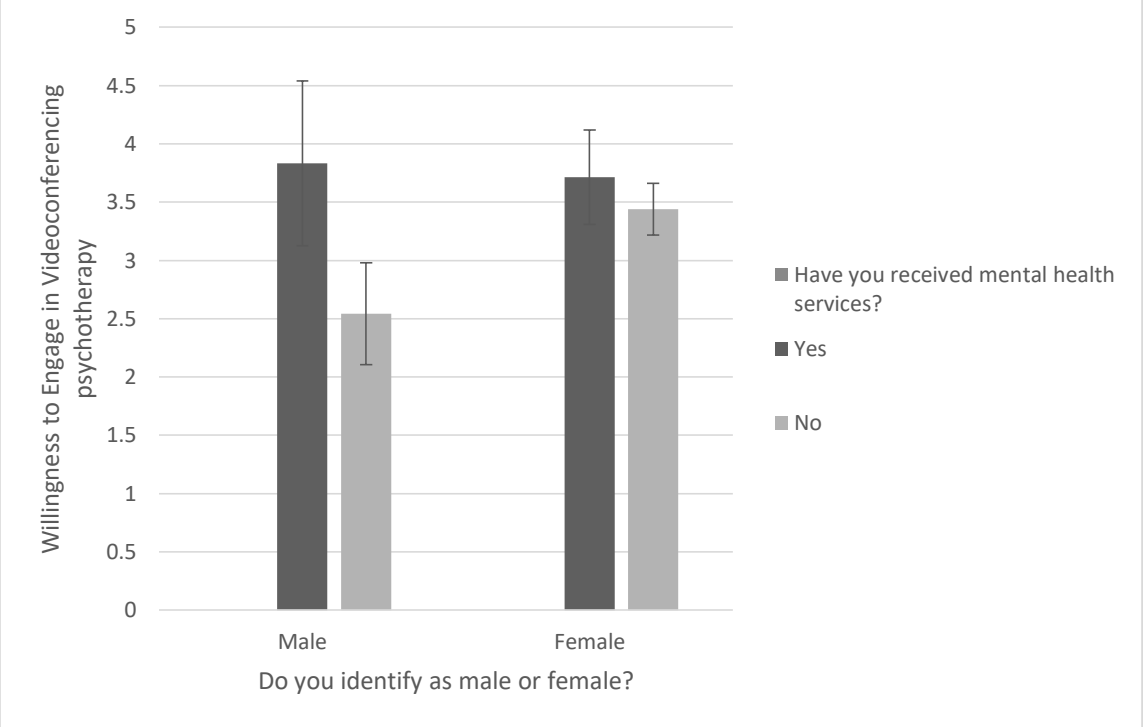


Figure 2

Differences in Attachment Anxiety by Treatment Preference

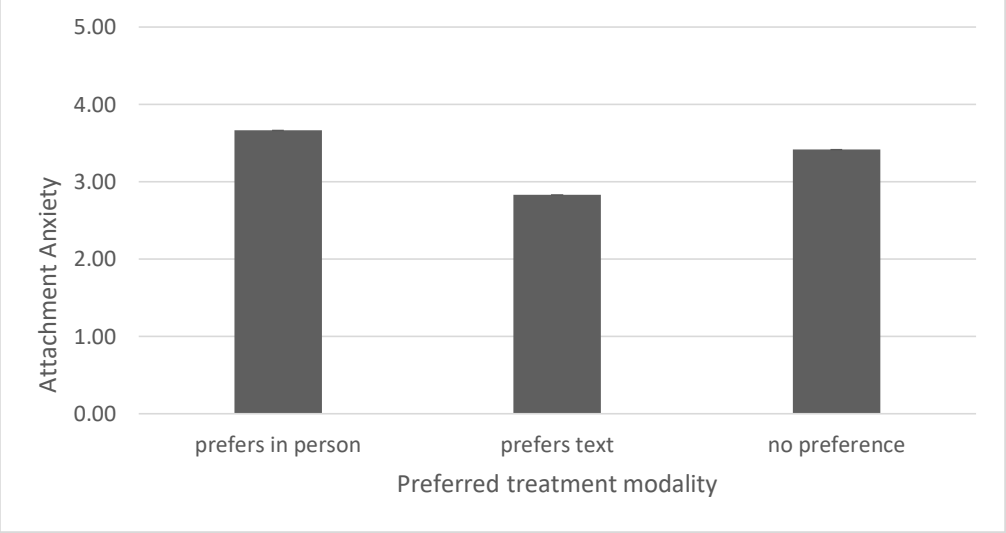


Figure 3

Differences in Attachment Avoidance by Treatment Preference

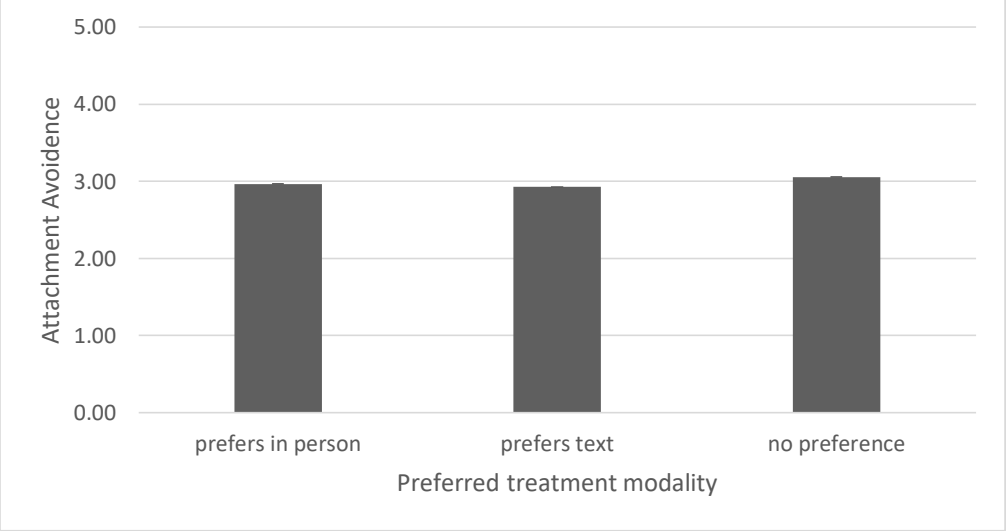


Figure 4

Clinic Sample Recruitment

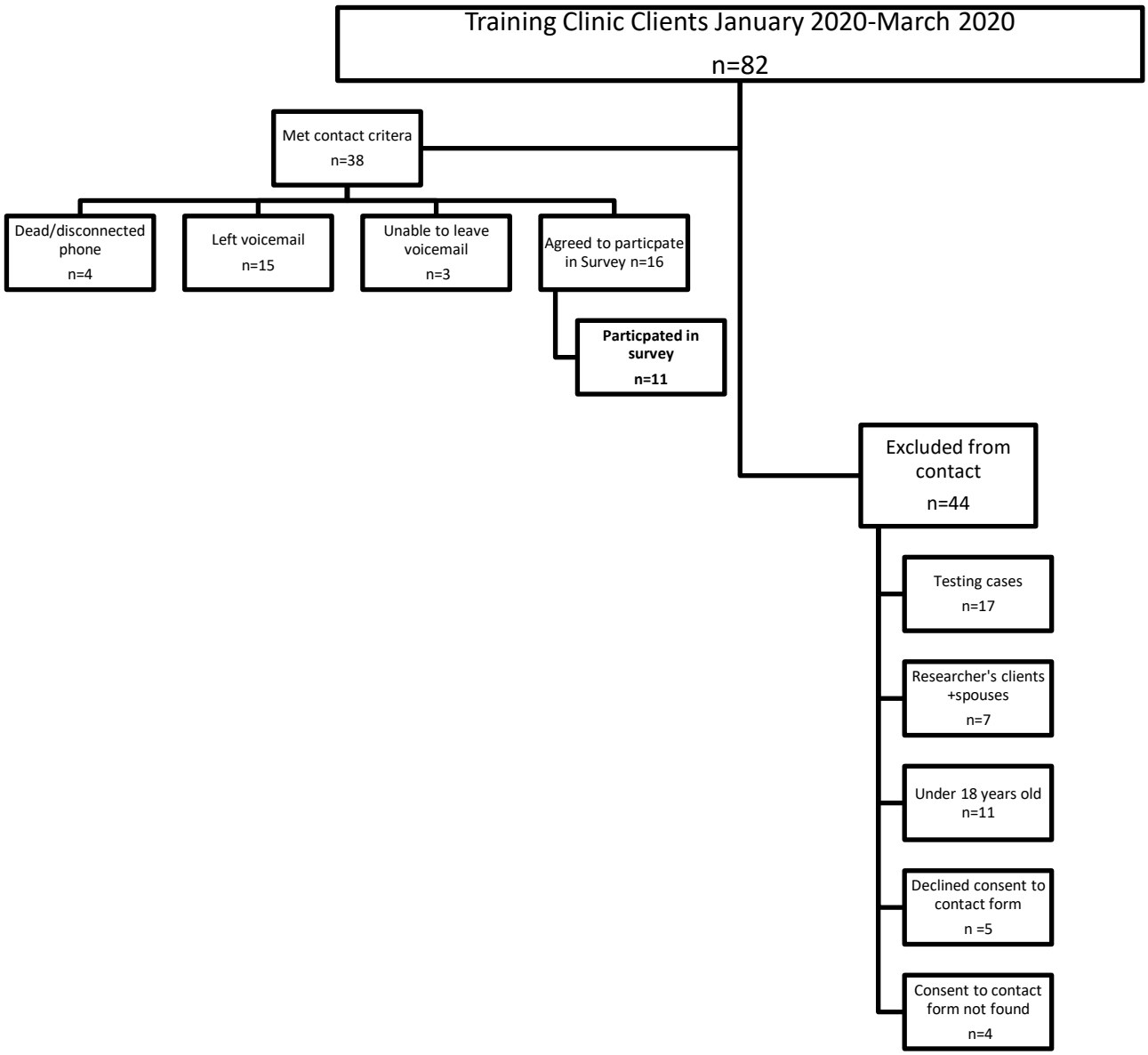


Figure 5
Amazon Turk Recruitment

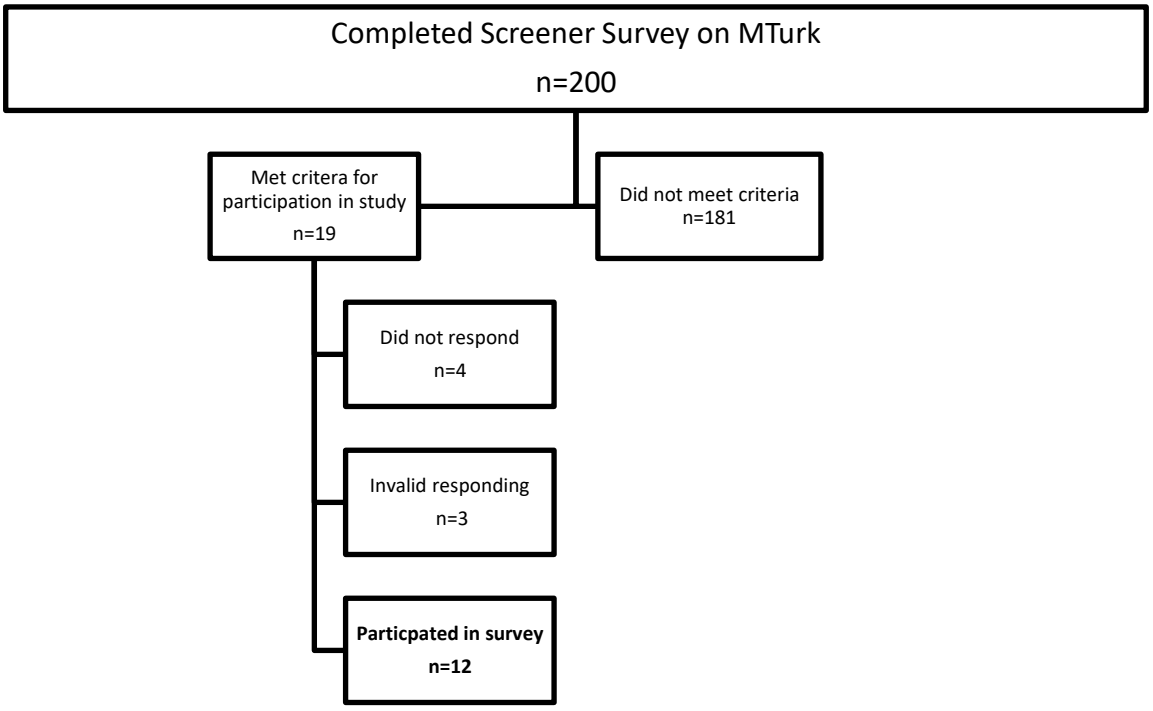


Figure 6

Willingness to Engage in Videoconferencing psychotherapy

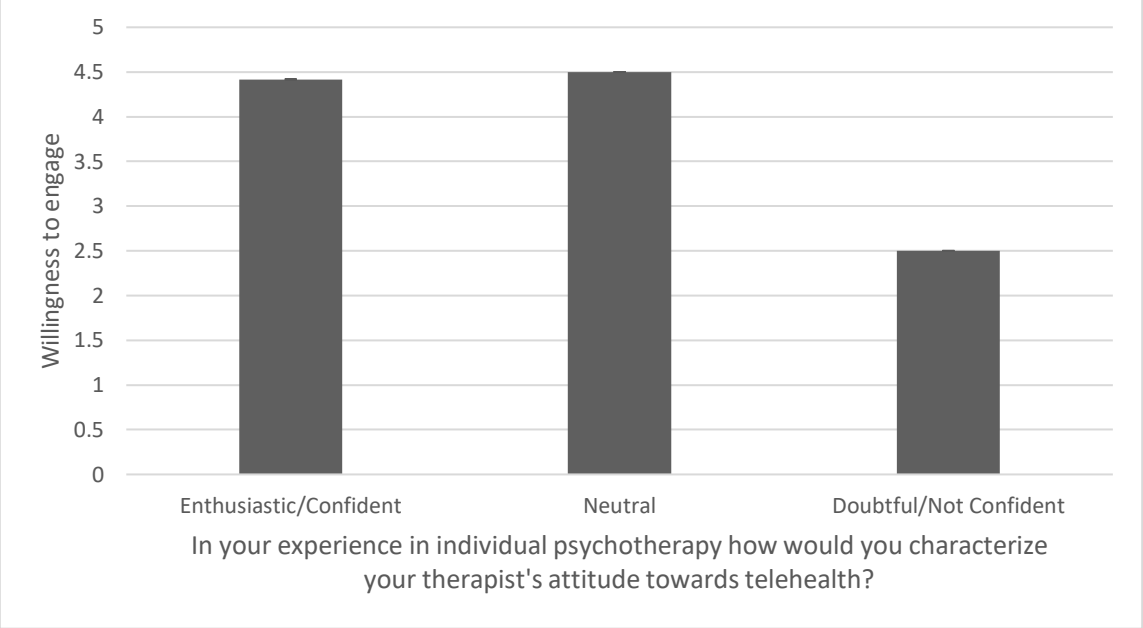


Figure 7

Schematic map of codes for the qualitative theme of individual factors, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

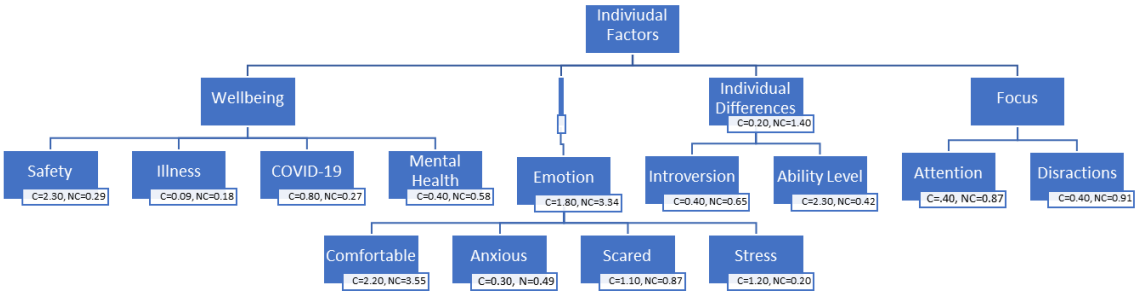


Figure 8

Schematic map of codes for the qualitative theme of communication, with the rate the code was used within the clinical population (C), and the non-clinical population (NC)

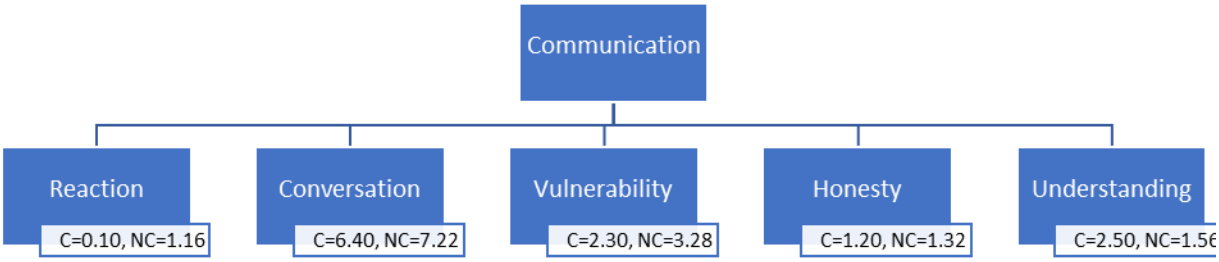


Figure 9

Schematic map of codes for the qualitative theme of sensation and perception, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

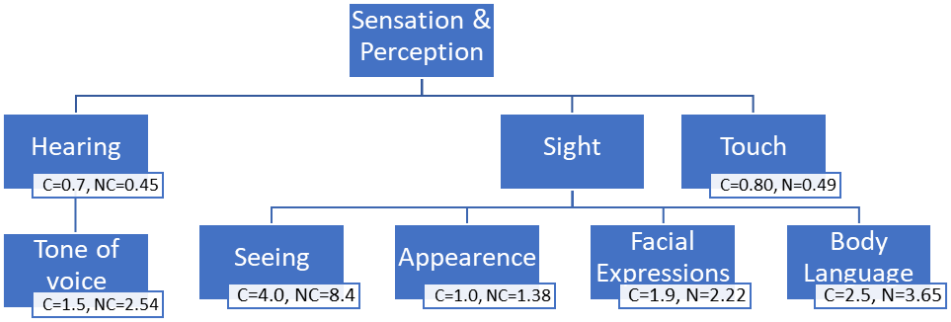


Figure 10

Schematic map of codes for the qualitative theme of environment, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

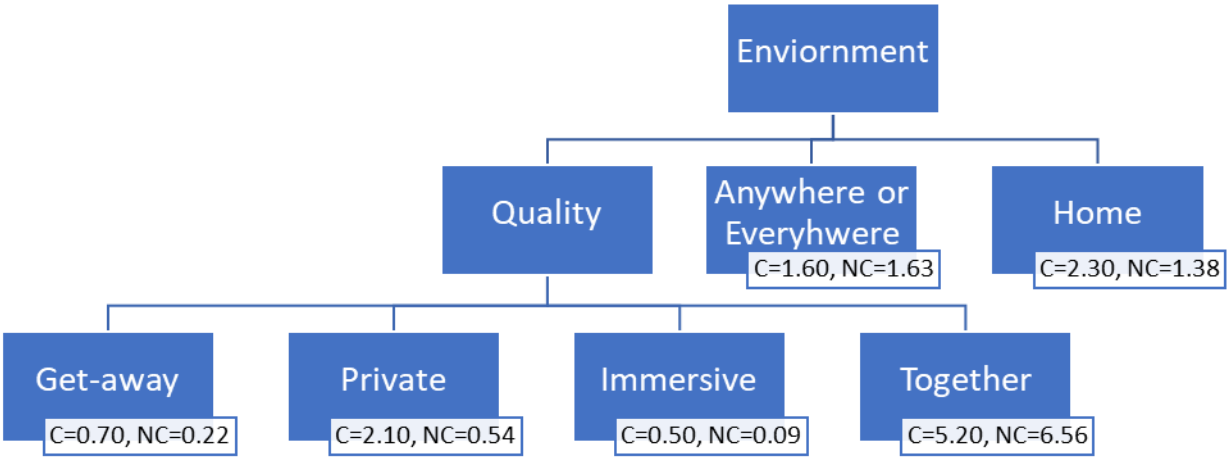


Figure 11

Schematic map of codes for the qualitative theme of relationship factors, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

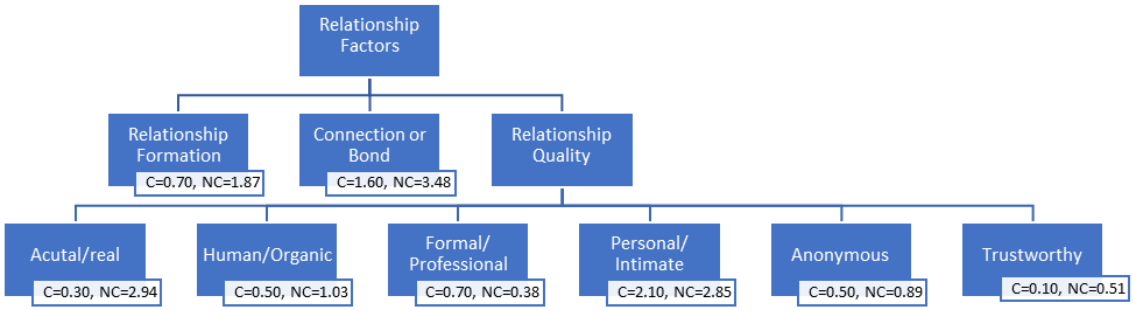


Figure 12

Schematic map of codes for the qualitative theme of ease, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

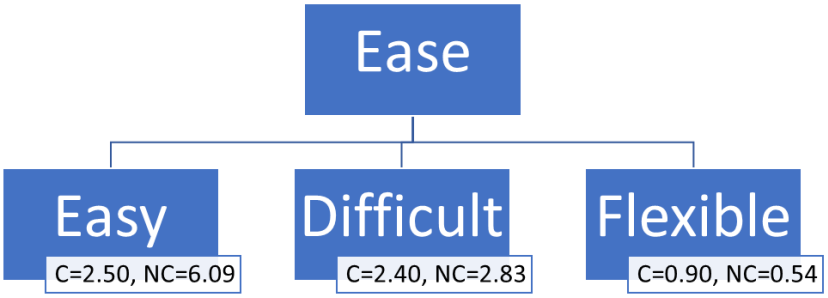


Figure 13

Schematic map of codes for the qualitative theme of treatment efficacy, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

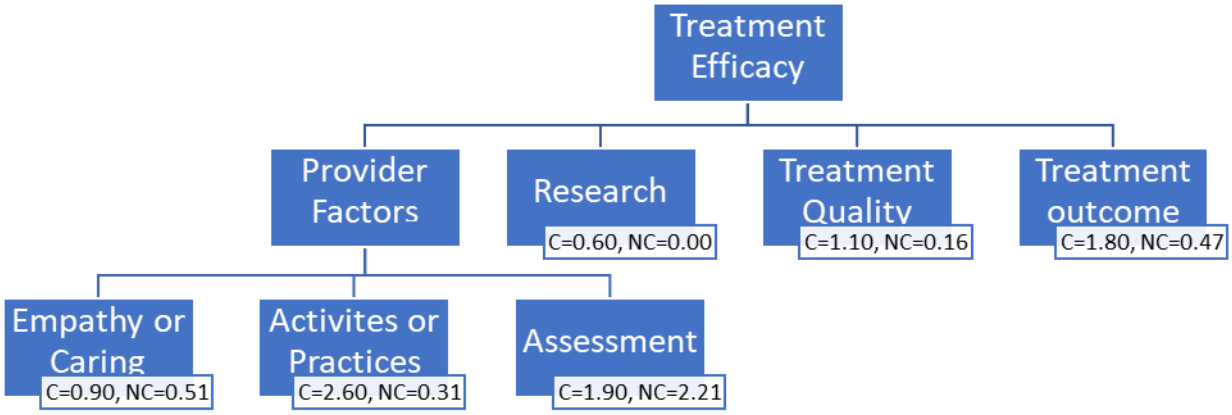


Figure 14

Schematic map of codes for the qualitative theme of time, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

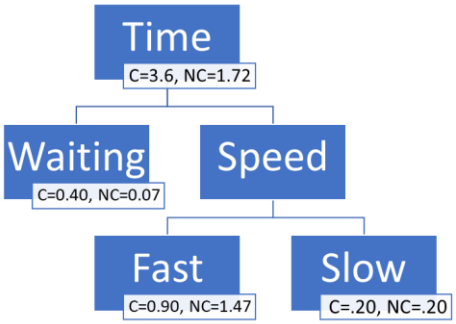


Figure 15

Schematic map of codes for the qualitative theme of accessibility, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

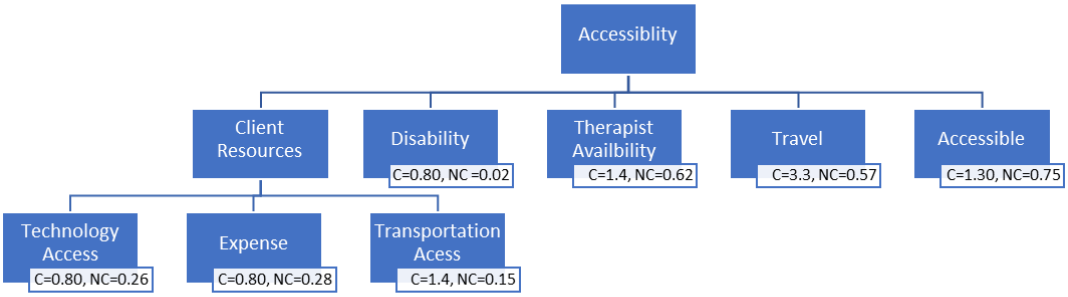


Figure 16

Schematic map of codes for the qualitative theme of technology, with the rate the code was used within the clinical population, (C), and the non-clinical population, (NC)

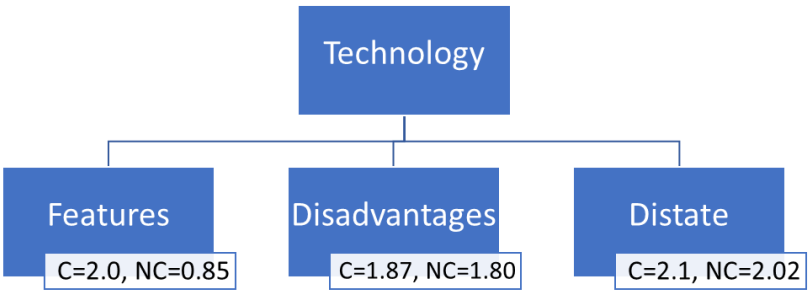


Figure 17

Schematic map of codes for the qualitative theme of External Factors in client's decision to stay or leave psychotherapy during COVID-19 transition to telehealth with the number of uses and percentage of total codes

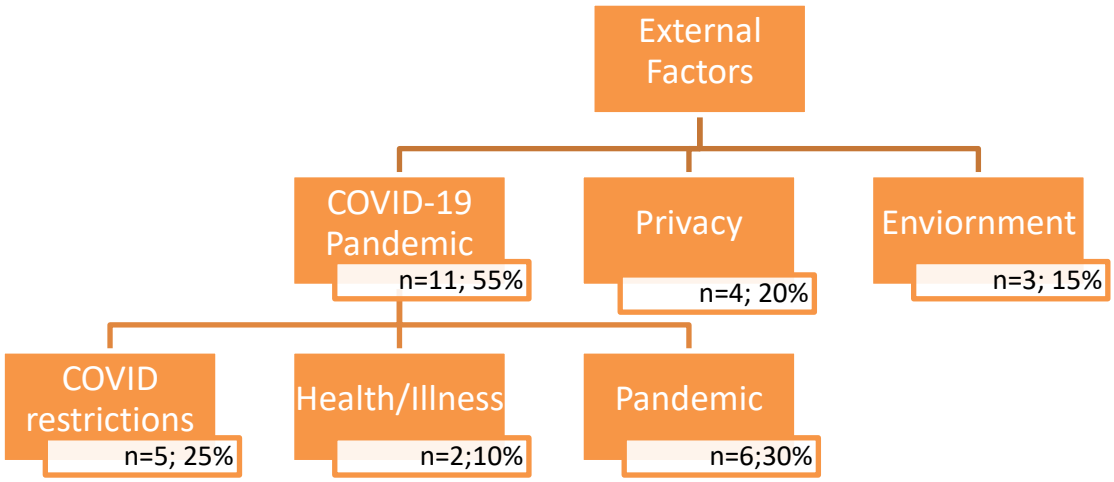
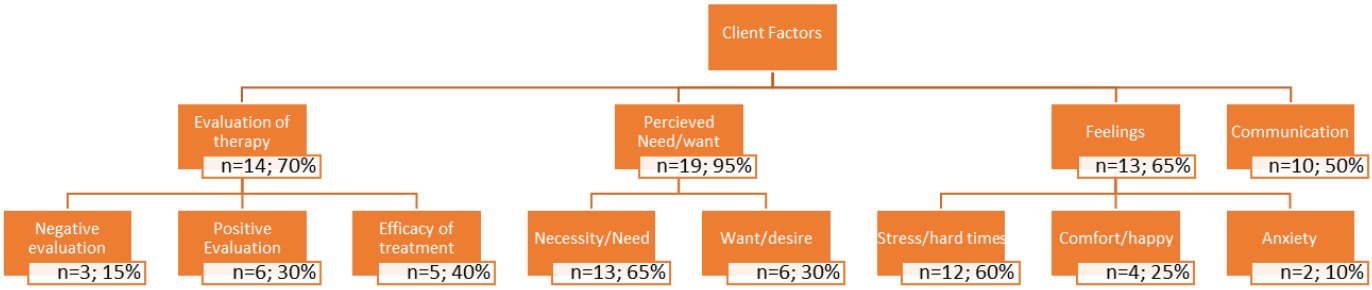


Figure 18

Schematic map of codes for the qualitative theme of Client Factors in client's decision to stay or leave psychotherapy during COVID-19 transition to telehealth with the number of uses and percentage of total codes



APPENDIX B

TABLES

Table 1
Demographics Study 1- Non-clinical Sample

Age	*M*=18.53, *SD*=0.95
Race, Ethnicity (*n*)	
Black or African American	2
White/Caucasian	129
Asian	20
South Asian	1
Latinx	28
Multiracial	14
Prefer not to answer	1
Sex (*n*)	
Male	48
Female	145
Other	1

Table 2

Pearson r correlations between willingness to engage in various modes of psychotherapy, attachment, and attitudes towards technology in the non-clinical sample

	1	2	3	4	5	6	7	8
1.In-person willingness	1	.589**	.264**	.014	.096	-.072	.139	.242**
2.Videoconferencing willingness	.589**	1	.480**	.177*	.085	-.050	.328**	.206**
3.Telephone willingness	.264**	.480**	1	.462**	.091	.022	.094	.245**
4.Messaging willingness	.014	.177*	.462**	1	-.085	-.106	-.028	0.015
5.Attachment Anxiety	.096	.085	.091	-.085	1	.432**	.039	.195**
6. Attachment Avoidance	-.072	-.050	.022	-.106	.432**	1	.005	-0.121
7.Comfort with tech	.139	.328**	.094	-.028	.039	.005	1	0.07
8. Emotional/Behavioral Difficulties	.242**	.206**	.245**	.015	.195**	-.121	.07	1

** Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Table 3

T-tests for differences between men and women in the non-clinical sample

	Men (n=48)		Women (n=145)					
	M	*Sd*	*M*	Sd	t	df	p	Cohen's d
In person*	3.54	1.27	4.03	1.03	-2.43	68.90	**.018**	.45
Video conferencing	2.90	1.34	3.52	1.14	-3.11	191	**.002**	.52
phone	2.17	1.15	2.67	1.24	-2.47	191	**.014**	.41
Messaging*	1.75	1.02	2.27	1.29	-2.84	101.25	**.005**	.42
Attachment anxiety*	3.74	1.01	3.49	1.26	-.78	190	.174	.20
Attachment avoidance*	3.14	.97	2.91	1.29	1.29	105.50	.192	.18
PAS	28.64	5.60	29.46	6.43	-.78	190	.432	.13
Tech comfort	2.57	.625	2.59	.60	-.24	175	.808	.04

*Welch test reported because Levine's test indicated homogeneity of variances assumption violated

Table 4

T-tests for differences in willingness to engage in modes of therapy, attachment, emotional/behavioral difficulties (PAS), and comfort with video conferencing technology between those who have received mental health (MH) services and those who have not

	MH (n=56)		No Services (n=133)					
	M	*SD*	*M*	*SD*	*t*	*df*	*p*	*Cohen's d*
In person	4.35	1.06	3.74	1.14	2.78	187	**.004**	.45
Videoconferencing	3.68	1.28	3.21	1.21	2.42	187	**.016**	.39
Phone	2.64	1.28	2.48	1.23	.812	187	.418	.12
Messaging	2.07	1.29	2.16	1.25	.429	187	.668	.07
Attachment anxiety	3.57	1.12	3.43	1.22	2.34	187	**.021**	.37
Attachment avoidance	3.04	1.39	2.97	1.15	.335	187	.738	.05
PAS	30.72	6.52	28.6	6.06	2.09	187	**.038**	.34
Comfort with tech*	2.69	.50	2.55	.64	1.37	110.90	.171	.22

*Welch test reported because Levine's test indicated homogeneity of variances assumption violated

Table 5

T-tests for differences between those who have had a telehealth appt and those who have not

	Prior appt (*n*=84)		No Appt (*n*=111)					
	M	*SD*	*M*	*SD*	*t*	*df*	*p*	*Cohen's d*
In person	4.01	1.07	3.81	1.17	1.23	193	.110	.17
Videoconferencing*	3.76	1.08	3.04	1.25	4.25	189.42	**<.001**	.62
Phone	2.75	1.22	2.37	1.22	2.14	193	**.033**	.31
Messaging*	2.27	1.31	2.05	1.20	1.24	170.80	.214	.18
Attachment anxiety	3.64	1.25	3.45	1.18	.86	193	.391	.12
Attachment avoidance	2.81	1.21	3.04	1.23	-.74	193	.460	.10
PAS	29.16	5.92	29.32	6.43	-.18	193	.853	.03
Tech comfort	2.62	.58	2.55	.630	.764	193	.446	.11

*Welch test reported because Levine's test indicated homogeneity of variances assumption violated

Table 6

Logistic regression predicting willingness to participate in videoconferencing psychotherapy based on attachment, level of emotional/behavioral difficulties (PAS), comfort with video conferencing technology, and prior experience with telehealth in the non-clinical sample

	B	SE	Wald	*df*	*p*	Odds ratio	95% CI for odds ratio	
							Lower	Upper
Attachment Anxiety	.137	.166	.689	1	.407	1.147	.829	1.587
Attachment Avoidance	-.009	.159	.003	1	.954	.991	.726	1.353
PAS	-.023	.031	.542	1	.462	.977	.919	1.039
Comfort with tech	-1.142	.031	.52	1	<.001*	.319	.182	.560
Prior telehealth experience	1.009	.363	7.719	1	.005*	2.743	1.346	5.59.
Constant	1.832	1.243	2.174	1	.140	6.247		

*Significance at the .001 level

Table 7

Demographics Study 2- Clinical Sample

	Clinic Sample	*Mturk Sample*
Age	*M*=23.00, *SD*=3.08	*M=34.42, SD=7.03*
Race, Ethnicity (*n*)		
Black or African American	0	1
White/Caucasian	6	11
Asian	1	0
South Asian	0	0
Latinx	2	0
Multiracial	2	0
Prefer not to answer	0	0
Sex (*n*)		
Male	2	7
Female	9	5
Other	0	0

Table 8

Pearson r correlations between willingness to engage in different modes of therapy, attachment, working alliance, and attitudes towards technology in the clinical sample

	1	2	3	4	5	6	7	8	9	10
1.In-person willingness	1	.643**	.262	-.143	-.371	-.140	.711**	-.302	-.285	-0.208
2.Video conferencing willingness	.643**	1	.178	.084	-.223	-.080	.552**	-.291	-.252	-0.201
3.Telephone willingness	.262	.178	1	.322	.435*	-.301	.062	-.217	.060	.513*
4. Text/messaging willingness	-.143	.084	.322	1	.501*	.143	-.420	.113	-.121	.990**
5. Attachment Anxiety	-.371	-.223	.435*	.501*	1	.440*	-.577**	-.031	.204	.571**
6. Attachment Avoidance	-.140	-.080	-.301	.143	.440*	1	-.251	-.041	.105	0.022
7.Working Alliance (WAI)	.711**	.552**	.062	-.420	-.577**	-.251	1	-.192	-.109	-0.392
8. Ease of telehealth visits	-.302	-.291	-.217	.113	-.031	-.041	-.192	1	.181	0.159
9. Comfort with video conferencing	-.285	-.252	.060	-.121	.204	.105	-.109	.181	1	-0.158
10. Psychopathology Symptoms (PAS)	-.208	-.201	.513*	.990**	.571**	.022	-.392	.159	-.158	1

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).

Table 9

Independent t-tests for differences between men and women in the clinical sample

	Men (*n*=9)		Women (*n*=14)					
	M	*SD*	*M*	*SD*	*t*	*df*	*p*	Cohen's *d*
In person	4.33	1.00	4.75	0.45	-2.43	21	0.214	.-567
Videoconferencing	3.89	1.26	4.58	0.90	-3.11	21	0.158	-.648
Phone	3.33	1.41	3.92	1.16	-2.47	21	0.313	-.547
Messaging	2.56	1.59	2.50	1.56	-2.84	21	0.937	.035
Attachment anxiety	4.27	1.55	4.33	1.34	-.78	21	0.925	-.042
Attachment avoidance	3	1.11	3.36	1.35	1.29	21	0.524	-.287
PAS	35	9.32	35.58	11.89	-.78	21	0.905	.-054
Tech comfort	2.57	.625	2.59	.60	-.24	21	0.400	.379
WAI	179.55	46.40	214.25	37.18	0.86	21	0.072	.227
Tech ease	1.89	0.782	1.75	0.45	0.51	21	0.905	-.840

All t-tests met the assumption of homogeneity of variance.

Table 10

T-tests for differences between Mturk and Training Clinic in the clinical sample

	Mturk (n=11)		Training Clinic (n=12)					
	M	*SD*	*M*	*SD*	*t*	*df*	*p*	Cohen's *d*
In person	4.50	.522	4.67	1.00	-0.49	21	0.625	.21
Videoconferencing	4.33	.98	4.22	1.30	0.22	21	0.826	.098
Phone	3.75	1.28	3.56	1.33	0.33	21	0.740	.149
Messaging	3.25	1.48	1.56	1.01	2.93	21	**0.008**	1.296
Attachment anxiety	4.56	1.40	4.21	1.51	0.56	21	0.577	.243
Attachment avoidance	3.48	1.24	2.98	1.23	.94	21	0.354	.233
PAS*	39.16	12.23	30.90	5.39	2.12	15.395	0.050	.008
Tech Comfort	1.17	.38	1.33	.50	-0.86	21	0.400	1.24
Tech Ease	1.75	.62	1.89	.60	-.514	21	0.613	1.091
WAI	184.25	36.74	219.55	46.58	-1.94	21	0.067	1.75

*Welch test reported because Levine's test indicated homogeneity of variances assumption violated

Table 11

Logistic regression predicting the likelihood of staying or leaving therapy during the COVID-19 transition to telehealth based on attachment anxiety, attachment avoidance, level of psychopathology, and ease with technology

	B	SE	Wald	*df*	*p*	Odds ratio	95% CI for odds ratio	
							Lower	Upper
Attachment Anxiety	-.132	.842	.027	1	.868	.870	.167	4.528
Attachment Avoidance	-1.452	1.407	1.066	1	.302	.324	.015	3.688
PAS	-.019	.074	.065	1	.799	.981	.848	1.134
Ease with Technology	0.327	.955	.117	1	.732	1.389	.213	3.013
Working Alliance	-.044	.029	2.275	1	.131	.957	.904	1.013
Constant	12.407	9.758	1.617	1	.204	2444440		

Note: PAS included as a measure of emotional/behavioral difficulties

Table 12

The number of codes, percentage of total codes for each sample, and codes in order of relevance to the sample

Clinical Sample			Non-clinical sample		
%	n	Code	%	n	Code
6.40	64	Conversation	8.43	1134	Sight
5.20	52	Together	7.22	972	Conversation
4.00	40	Sight	6.56	882	Together
3.60	36	Time	6.09	819	Easy
3.30	33	Travel	3.66	492	Body Language
2.60	26	Activities or Practices	3.55	477	Comfortable
2.50	25	Easy	3.48	468	Connection or Bond
2.50	25	Body Language	3.34	450	Emotions
2.50	25	Understanding	3.28	441	Vulnerability
2.40	24	Difficult	2.94	396	Actual/Real
2.30	23	Vulnerability	2.85	384	Personal/Intimate
2.30	23	Home	2.83	381	Difficult
2.30	23	Ability level	2.54	342	Tone of voice
2.30	23	Safety	2.23	300	Facial Expressions
2.20	22	Comfortable	2.21	297	Assessment
2.10	21	Personal/Intimate	2.03	273	Distaste for tech
2.10	21	Distaste for tech	1.87	252	Relationship Formation
2.10	21	Lying	1.72	231	Time
2.10	21	Privacy	1.63	219	Anywhere or everywhere
2.00	20	Tech Features	1.56	210	Understanding
1.90	19	Facial Expressions	1.49	201	Awkward
1.90	19	Assessment	1.47	198	Fast
1.80	18	Emotions	1.40	189	Individual difference
1.80	18	Treatment outcome	1.38	186	Home
1.60	16	Connection or Bond	1.38	186	Appearance
1.60	16	Anywhere or everywhere	1.32	177	Honesty
1.50	15	Tone of voice	1.16	156	Reaction
1.40	14	Therapist Availability	1.03	138	Human
1.40	14	Transportation access	0.91	123	Distractions
1.30	13	Accessible	0.89	120	Anonymous
1.20	12	Honesty	0.87	117	Scared
1.20	12	Stress	0.87	117	Focus
1.10	11	Scared	0.85	114	Tech Features
1.10	11	Treatment quality	0.76	102	Accessible
1.00	10	Appearance	0.65	87	Introversion/Shyness
0.90	9	Fast	0.62	84	Therapist Availability
0.90	9	Flexible	0.58	78	Travel
0.90	9	Empathy or caring	0.58	78	Mental Health

Table 12 (continued)

Clinical Sample			Non-clinical sample		
%	n	Code	%	n	Code
0.90	9	Illness	0.56	75	Lying
0.80	8	Touch	0.54	72	Privacy
0.80	8	Expense	0.54	72	Flexible
0.80	8	COVID-19	0.51	69	Empathy or caring
0.80	8	Technology Access	0.51	69	Trustworthy
0.80	8	Disability	0.49	66	Touch
0.70	7	Hearing	0.49	66	Anxious
0.70	7	Formal/Professional	0.47	63	Treatment outcome
0.70	7	Get-away	0.45	60	Hearing
0.70	7	Relationship formation	0.42	57	Ability level
0.60	6	Awkward	0.38	51	Formal/Professional
0.60	6	Research	0.31	42	Activities or Practices
0.50	5	Human	0.29	39	Safety
0.50	5	Anonymous	0.29	39	Expense
0.50	5	Immersive	0.27	36	COVID-19
0.40	4	Distractions	0.27	36	Technology Access
0.40	4	Focus	0.22	30	Get-away
0.40	4	Introversion/Shyness	0.20	27	Stress
0.40	4	Mental Health	0.20	27	Slow
0.40	4	Waiting	0.18	24	Illness
0.30	3	Actual/Real	0.16	21	Transportation access
0.30	3	Anxious	0.16	21	Treatment quality
0.20	2	Individual differences	0.09	12	Immersive
0.20	2	Slow	0.07	9	Waiting
0.20	2	Danger	0.07	9	Danger
0.10	1	Reaction	0.02	3	Disability
0.10	1	Trustworthy	0.00	0	Research

Table 13

Co-occurrence (n) Table of Themes with the Theme Ease

	Ease (n)
Communication	732
Individual Factors	596
Environment	522
Sensation/Perception	467
Relationship	390
Time	312
Accessibility	241
Technology	190
Treatment Efficacy	186