

WARM HANDOFFS AND COLD FUMBLES: HOW ONE PRIMARY CARE PRACTICE
RECOGNIZES AND RESPONDS TO LATE LIFE SUICIDE RISK

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ABSTRACT**WARM HANDOFFS AND COLD FUMBLES: HOW ONE PRIMARY CARE PRACTICE
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Suicide in late life (65 and older) is on the rise, yet this tragedy is not well understood. Most people who die by suicide have had contact with their primary care health setting in the year before their death. Only about half of primary care physicians report screening most or all of their patients for suicide. Considering barriers like time and resources, the collaborative care model is needed to better respond to this issue in primary care settings. Past research of late-life suicide risk practices in primary care settings has been isolated by discipline (e.g., only doctors or only nurses), offering little insight into aspects of collaboration involved with suicide risk assessment. In fall 2023, a qualitative, exploratory case study of one site that practices both collaborative and primary care was assessed via on-site observations, in-depth interviews, and collection of documents to provide a rich, thick description of their approach to late-life suicide risk assessment—findings to be provided.

Keywords: Suicide, late life, older adult, elders, seniors, Durkheim’s theory of suicide, primary care, primary healthcare, suicide risk assessment, attitudes toward suicide, primary care provider, primary care, suicide prevention, primary health care, primary care, collaborative care model, interprofessional education and collaboration, social work leadership, social worker education, healthcare

DEDICATION

Around 1965, an ordinary, older man ended his life. This was not newsworthy since it was an ordinary person, and it would not be discussed again except in family stories where the details would be obscured because it would be hard to talk about. This man was my great grandfather, who I never knew, and still do not know why he ended his life. However, after writing this dissertation, he seemed to have had some things in common with other older adults who die by suicide. He had lost his wife to cancer, and may not have been well himself, much like others I have read about in the research who also had experienced multiple losses. I find myself disappointed that in 2024 older adults, and older men are particularly vulnerable to suicide, and we still have far to go in addressing this serious issue. I would like to dedicate this dissertation to older adults who feel forgotten, left behind, lost, or less important because of their age, ability, or circumstance. Who believe that after so much time on earth that their despair has robbed them of the reasons for living. While I cannot presume to know what you experience or feel, this dissertation is a small effort to remind you that there is hope and light for you. There are people who know how to and want to help, who will not judge you. It is a hard and vulnerable act to reach out and ask for help, but if you do, it could be the most important decision you make.

I also want to dedicate my dissertation to the future of the social work profession: my students. You give me so much hope for the future and enter this field with the drive and determination the world needs. You were part of the reason I wanted to get this degree, because your excitement is infectious and a source of joy and strength for me. You will do wonderful things that I cannot wait to see.

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A dissertation is like a mental obstacle course with running, mud, and other challenging physical fetes, during which, I experienced the constant need to prove myself to others, but mostly just to myself. There were many times I thought there was no way I could jump across another mud filled pit after running for miles, then somehow found myself clawing my way out of the dirt. The reason I came out on the other side is because of the people in my life. Dave, thank you for being my biggest fan, and making it possible for me to stay upright through this process. Mom, you read my entire dissertation in its first drafts, something only a mother could love. Dad, you reminded me that my value is unrelated to meeting high academic standards. Baby Ellie, your mission was to keep me from writing as much as possible-- thank you so much for that. If you had not reminded me to build fairy gardens, I would have missed those beautiful moments with you. My in-laws (Maryann, Mike, Jess, and Chris) for spending time with Ellie so I could write this. I am also with such gratitude for the incredible people I have known across the course of my career in a way that I do not have the space to describe here. In addition to my committee members (Dr. Jennifer Frank and Dr. Karen Rice), I want to give a special shout out to my chair Dr. Laura Brierton-Granruth who challenged me while reminding me I could handle it. Jessica Beu, my first field instructor, believed in my potential so that I could too. My advisor and mentor from Pitt since 2011 and counting, Amy DeGurian, and my first Pitt supervisor, Melissa Brusoski: you both continue to inspire me. To my DSW cohort colleagues for being on the receiving end of my worries so often, thank you, sorry, and I am usually more fun. My friends at the Ruckus café who kept me fed and caffeinated. Lastly, to me. If you were someone else, I would have told you how incredible it is that you did this under the circumstances that you have gone above and beyond, and none of that is what makes you amazing.

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CHAPTER 1: INTRODUCTION

People who are 65 and older have the highest rates of suicide of any other age group in the United States (Conejero et al., 2018; Laflamme et al., 2022; National Institute of Mental Health, 2020). According to Luoma et al. (2002), 77% of older adults who died by suicide were also in contact with their primary care provider sometime in the year before their death. These findings suggested that primary care professionals are on the frontline of this issue and are in an opportune location to intervene (Luoma et al., 2002). Suicide risk factor assessments have been indicated for suicide prevention. However, this may be challenging to implement consistently in busy primary care settings (Christensen et al., 2023). Fortunately, the use of collaborative or team-based care in primary care may be associated with reduced suicidal ideation in older adults (Bruce & Pearson, 2022). In a team-based model, behavioral health is managed in partnership with the patient, provider, and at least one behavioral health discipline (Bruce & Pearson, 2022). These findings suggest there is a need to understand better how life suicide risk is recognized and responded to in team-based primary care settings.

The purpose of this study is to explore how one primary care practice recognizes and responds to late life suicide risk, beginning with a literature review of the prevalence of late life suicide risk and risk factors that have been researched. Two theories serve as the framework for this study's review of literature and findings and include Durkheim's (1897) theory of suicide; and Rational Systems Theory (Scott & Davis, 2007). The earlier of these two theories, Durkheim's theory, was developed when life expectancy was half of what it is today (O'Neil, 2022), which provided the opportunity for Marson (2019) to update and apply this theory to late life suicide risk.

Past related research has included numerous interventions of late life suicide risk in models for primary care settings (Holm et al., 2020; Okolie et al., 2017; Wallace et al., 2021), but professionals report barriers to implementing ideal practices (Bjorkman, 2019; Almeida, 2021; Wardig, 2022; Karlsson, 2021; Saini, 2018). Furthermore, there are gaps in the literature around how and why professionals decide to screen, how they describe late life suicide risk warning signs, and the role of team collaboration.

Conceptualizing Late-Life Suicide

Defining Older Adults

In this paper, older adults refer to people 65 years and older, and will be used interchangeably with late life (Centers for Disease Control and Prevention, 2019). However, the body of research has defined late life in years, cultural meaning of age, and functional ability, where “every journey is unique” (Bee, 1996, p. 1). While each developmental period creates unique stressors and life events common to that stage of the life course, older adults are diverse and not a homogenous group (Rogers, 2022).

Accordingly, all older adults belong to an age group that is increasing and projected to grow by 21.6% by 2040 (CDC, 2019). Data from the Centers for Disease Control and Prevention (CDC, 2019) indicated that the number of people under the age of 65 has increased by 3% compared to older adults’ growth of 36%. In addition to growth in numbers, this group has grown more racially and ethnically diverse. In 2009, 20% of the older adult population identified as Hispanic, African American, Native Hawaiian, or American Indian, and in 2019 this increased to 24%. Increases in life longevity also play a role in older adult population growth (CDC, 2019).

Consequently, the likelihood of living with chronic disease and disability also increases with age, and most people live with at least one functional impairment by the age of 80 (Santoni

et al., 2015). In addition to being one of the largest age groups, older adults are also one of the largest consumers of healthcare (Hing et al., 2006). People in late life are twice as likely to need hospitalization compared to other younger age groups (CDC, 2019). Older adults also visit their primary care provider more than every age group except for infants (According to the Agency for Healthcare Research and Quality, 2017; Fulmer et al., 2021).

Defining Suicide

The Suicide Prevention Resource Center (SPRC, 2020) and the American Foundation for Suicide Prevention (AAFP, 2023) have indicated that there are multiple terms involved with suicide prevention and research. Terms defined in this section include suicide, suicidal behaviors, suicidal ideation, suicide risk factors, suicide warning signs, and protective factors (SPRC, 2020; AFSP, 2023). Suicide, which is the act of intentionally ending one's own life, is considered suicidal behavior (CDC, 2022). Suicidal behaviors are acts and thoughts a person has that contribute to plans to complete suicide (SPRC, 2022). Suicidal behavior is also an overarching concept for the other terms of suicidal ideation and warning signs (SPRC, 2014). Additionally, the SPRC (2020) defined suicidal behaviors as acts and preparations completed by someone intending to end their own life. Suicidal ideation refers to the desire to die (SPRC, 2020). Warning signs refer to observable signs that a person has suicidal behaviors, such as verbalizing the desire to die (SPRC, 2023). Other warning signs could include talking about death, ending their life, feelings of guilt, shame, being a burden to other people, and lack of social support (SPRC, 2020). According to the AAFP (2023), suicide risk factors are different from warning signs in that they refer to conditions or characteristics that statistically have been associated with an increased risk of suicide. Some of these include mental health diagnoses or access to lethal means like firearms (AAFP, 2023). Lastly, protective factors refer to

characteristics or conditions that may safeguard against suicide risk (SPRC, 2020). Risk factors, warning signs, and protective factors have informed the development of suicide risk assessment tools indicated for use in patient-facing settings and public education (SPRC, 2020).

Prevalence of Late-Life Suicide

This section provides an overview of late life suicide prevalence and disparities for certain groups although the rates reported in this section are likely to be lower than reality (Richards, 2017). For example, a person's death may only be labeled a suicide if the method was violent, such as with the use of a gun thus implying that available data on suicide rates cannot capture the full scope of the issue (Richards, 2017).

Rates of suicide in late life are higher than any younger age groups in the U.S. (Conejero et al., 2018; Laflamme et al., 2022; National Institute of Mental Health, 2020). The data indicate that while general population suicide rates were decreasing, rates were increasing for older adults (CDC, 2020). In late life, suicide rates may also increase at age around 70 to 85 years old (CDC, 2019; WHO, 2019). Further, overall suicide rates may be increasing following the COVID-19 pandemic because suicide rates tend to increase in the period after a large-scale disaster (CDC, 2019). The pandemic, combined with the growing older adult population, has led to projections that late-life suicide will continue to increase (Ivbijaro, 2021; Lebrasseur, 2021; Wallace, 2021).

Disparities

General population suicide rates differ by race, ethnicity, geographic composition, and gender (CDC, 2019). First, a person's risk of suicide might be impacted by their geographic location because urbanization has also been inversely associated with suicide rates (Ehlman et al., 2022). Race and ethnicity have also shown differences in rates of suicide, with the highest rates observed for non-Hispanic American Indians, Alaskan Natives, and Whites. Suicide rates

by gender are one of the most striking disparities, where 80% of suicide deaths are men (CDC, 2022). The body of research has emphasized the issue of male suicide urging movement toward prevention in this group (Adler et al., 2022; Almeida et al., 2016; Apeso-Verano, 2018; Bamonti, 2013; Beghi (2021); Bishop, 2016; Canetto, 2015; Chen, 2021; Cho, 2021; Conjero, 2021; Cui, 2020; Chatton et al., 2022; Holm et al., 2020; Leflamme et al., 2022; Martinez-Ales, 2022; Steele et al., 2017).

Suicide Risk Factors

In addition to suicide rates differing for certain groups of people, studies have addressed other factors that could be associated with increased suicide risk, or risk factors (Steel et al., 2017). Past research of risk factors has informed prevention, intervention, and public health initiatives (Betz et al., 2022; Yoshimasa et al., 2008). A predominant prevention effort that stands out in the literature for all ages involves limiting access to firearms (Betz et al., 2022). According to Betz et al. (2022), access to firearms is associated with higher rates of completed suicide (Betz et al., 2022). Yoshimasi et al. (2008) also found a relationship between suicide and substance abuse, mood disorders, self-harm, and past suicide attempts, where past suicide attempts coupled with depression had the strongest relationship to suicide. In addition, social capital, or connection to community and other people, was suggested as a protective factor for those at high risk of suicide, whereas its opposite, social isolation, was considered a risk factor (Yoshimasi et al., 2008). Late life may also make people more likely to experience certain events that are associated with suicide risk (Conejero et al., 2022; Sinyor et al., 2015; Steele et al., 2018). For example, Steele et al. (2018) found that the likelihood of having medical issues and living alone increases with age, which are also risk factors for suicide. Other factors associated with late life suicide risk included mental illness, bereavement, personal history of being abused,

suicide attempts, family history of suicide attempts, financial distress, substance use, and death of a spouse or significant other (Conejero et al., 2022; Steele et al., 2017).

Primary Care, Collaborative Care and Healthcare Fragmentation

Healthcare Definitions

A healthcare organization is an institution that provides patient care through logistical and clinical services and exists to meet the medical needs of a specific population ranging from single providers to larger systems (White, 2019; Piña, 2015). Primary care, which is one of largest systems of healthcare delivery in the U.S. is where professionals like medical doctors, nurse practitioners, and physician's assistants practice medicine with people of all ages (AAFP, 2019). Professionals work in practices or clinics that operate from a variety of models, from one solo provider to up to 50 providers on-site (Christensen et al., 2023). In these settings, professionals either work in collaboration with other professionals or refer patients to different healthcare needs, such as specialists, testing, and labs (AAFP, 2019). According to Christensen et al.'s (2023) national survey of primary care providers, clinics manage behavioral health needs in various ways. Some practices work in interprofessional teams, including co-located access to behavioral health professionals, a practice known as collaborative care (Christensen et al., 2023). This model, termed collaborative care, decreases fragmentation by facilitating team-based care between medical and behavioral staff like psychiatry, behavioral health coaches, nursing, and social workers (Collier, 2020). Past research has also highlighted collaborative care as a vehicle of prevention for late life suicide risk (Conejero et al., 2018; de Mendonça et al., 2021; Laflamme et al., 2022; Mann, 2021). Healthcare fragmentation is when a person receives healthcare services across multiple sites and professionals, which increases the number of procedures, providers, and labor involved in a person's care, often leading to increased

healthcare utilization and decreased efficiency (Agha et al., 2019). Interprofessional education and collaboration (IPEC) is a framework that aims to address healthcare fragmentation by influencing practice, leadership and education (IPEC, 2024). IPEC (2010) in practice refers to two or more disciplines working together in one setting. For example, social workers that partner with medical doctors are collaborating interprofessional, whereas social workers learning with medical doctors are engaged in interprofessional education (IPEC, 2024). IPEC (2024) posed that elements of interprofessional collaborative practice and education are implicated to reduce healthcare fragmentation and change future healthcare delivery.

Older Adults and Health Care

Age increases the likelihood of medical conditions (Steele et al., 2017), and healthcare utilization increases with medical complexity, which is three or more diseases (Ahmedani et al., 2014). Three studies discussed completed suicide decedents and primary care utilization (Ahmedani et al., 2014; Luoma et al., 2002; Stene-Larsen & Reneflot, 2019). There were consistent findings that most people who died by suicide were in contact with primary care in the year before their death (Ahmedani et al., 2014; Luoma et al., 2002; Stene-Larsen & Reneflot, 2019). An increase in rates is also observed in these studies (Ahmedani et al., 2014; Luoma et al., 2002; Stene-Larsen & Reneflot, 2019). In 2002, Luoma et al. found that 45% of people who died by suicide were in contact with primary care in the last month and 77% in the last year before their death. Ahmedani et al.'s (2014) ten-year study found that 83% of people who died by suicide had been in contact with primary care the year before their death. Stene-Larson & Reneflot (2019) most recently found that that 80% of people who died by suicide had been in contact with primary care in the year before their death. In all three studies, older adults were one of the groups of people most likely to have made primary care appointment visits (Ahmedani et

al., 2014; Luoma et al., 2002; Stene-Larsen & Reneflot, 2019).

Suicide Screening Practices in Primary Care

One of the instruments used to determine risk is the Patient Health Questionnaire (PHQ-9), a 9-item depression symptom and severity screening tool that includes one item about suicidal ideation (Kroenke et al., 2001). The PHQ-9 is self-administered, and patients respond to nine statements indicating the degree to which they have been bothered by symptoms in the last two weeks. Answers range from not at all (0), several days (1); more than half days (2); and nearly every day (3). Numbers selected for each item are totaled where higher scores indicate higher severity of symptoms. This can also be administered as a shorter, 2-item version to determine if the full version is warranted, but this does not include items assessing suicidal ideation (Kroenke et al., 2003).

Christensen et al. (2023) found that 53.8% of primary care medical doctors reported screening for suicide risk with most of their patients using the Patient Health Questionnaire (PHQ-9) screening tool. According to Kroenke & Spitzer (2002) the PHQ-9 is a valid and reliable measurement for symptoms and severity of depression. Major strengths of PHQ-9 are that it has been studied for use with older adults in primary care settings and was determined to be valid (Phelan et al., 2010). The PHQ-9 is also a reliable instrument to screen for suicidal ideation (Kim et al., 2021), however, if providers use the shortened PHQ-2 version, there is no assessment of suicidal ideation (Horowitz et al., 2021). Christensen et al. (2023) has also suggested that the PHQ-9's high rate of false positives could force providers to expend more time needlessly.

Problem Statement and Implications for Social Work Leadership

In a work specifically directed toward the challenges faced in society, Barth et al. (2022)

suggested that health equity is a valuable agenda item for social work leadership. Suicide is a tragic outcome, and this issue remains complex despite knowledge of risk factors and validated screening methods (Turecki et al., 2019; Institute of Medicine, 2002). Perry et al., 2022 and Farrer et al., 2015 suggested that suicide disparities are indicative of lack of health equity, which is any major differences in the rates of health issues between groups in the population. Hence, the present study focuses on primary care settings because 1) older adults are likely to already be connected to these practices, and 2) there are trained professionals present who can help prevent suicide (Stene-Larsen & Reneflot, 2019). Although Barth et al. (2022) does not include age-related disparities in their discussion of health inequalities, Michels (2022) and Perry et al (2022) called for universal and population-based approaches to address disparities. Such universal approaches with suicide prevention imply that all groups of people are treated as having potential for suicide risk and should be screened universally in healthcare settings regardless of the reason for their visit (Perry et al., 2022).

The PHQ-9 is a validated instrument that primary care providers reported using (Christensen et al., 2023). However, Christensen et al. (2023) critiqued this tool as having high rates of false positives, which may be an inefficient use of a patient's appointment. Marson (2019) also critiqued the use of screening tools without any individual adjustments, asserting that most social context risk factors for late life are not included in screening instruments like the PHQ-9. Tools assessing age-related events may be indicated to avoid missing older adults at risk of suicide, especially because they may be less likely to report emotional symptoms of depression (Fiske et al., 2009 and Sharp et al., 2002). However, these screening tools are not infallible; in Ketel et al. (2021) most primary care patients with suicidal ideation did not present with psychiatric symptoms, which may not have been relevant to the PHQ-9.

Regardless of the method used for screening, when patients are determined to be at risk of suicide, providers reported most frequently referring patients to the hospital or an outpatient behavioral health setting (Christensen et al., 2023). The aforementioned study describes a redundant practice, otherwise called healthcare fragmentation (Agha et al., 2017). However, social workers have a presence in many primary care settings (Iachini, 2018), and Ketel et al. (2021) indicated that they are instrumental in behavioral health services, care management, and service linkage. The latter studies cited above illustrate an area of healthcare fragmentation where more healthcare systems are being needlessly added to patient care.

To avoid redundancy and siloing, interprofessional education and collaboration (IPEC) has been implicated as an important tool for addressing such issues as healthcare fragmentation and health equity (Barth et al., 2022; Ketel et al., 2021; IPEC, 2010). IPEC is a framework in which two or more disciplines work together in practice or educational settings (2010). Kramer et al. (2019) have suggested that siloing of disciplines, or rather the lack of interprofessional collaboration, is especially problematic for the issue of suicide. Interprofessional care settings that include social work have been shown to significantly improve behavioral health and overall patient care outcomes (Ketel et al., 2021).

The practice of siloing disciplines in healthcare is being actively combatted through IPEC initiatives that have urged healthcare to include feedback from as many disciplines as possible (IPEC, 2011). Despite these implications for team-based practice, relevant studies have isolated specific professions, most frequently physicians (Christensen et al., 2021; Vannoy et al., 2011; Saini et al., 2018; Leavey et al., 2018) and nurses (Wardig et al., 2022; Karlsson et al., 2021; Bjorkman et al., 2019; Svenningsson et al., 2018; Grundberg et al., 2016) with only one study involving a combination of different disciplines (Almedia et al., 2021).

In conclusion, the use of collaborative care has also been implicated in suicide prevention in primary care settings (Bruce & Pearson, 2022). Henceforth, if best practices for suicide prevention necessitate IPEC, then further studies of these settings are needed. An exploration of primary healthcare professionals' processes, impressions, and meanings ascribed to collaborative care will add to the body of research toward a better understanding of late life suicide prevention (Ahmedani, 2021). Implications of the present study would hold potential for future intervention research, illustrating the impact of collaborative care models, embedding behavioral health support in primary care settings, and support for IPEC in primary care settings (Barth et al., 2022).

Theoretical Frameworks

Suicide prevention research is complex, but explanatory theoretical frameworks can make it more manageable (Institute of Medicine, 2002; Stanley et al. (2016). For example, Cresswell and Poth (2018) suggested that theory can organize findings and narrow down the research question. Durkheim's (1897) theory of suicide and Rational Systems Theory (Scott & Davis, 2007) have informed the present study to organize the literature about late life suicide risk and implications of collaborative primary care settings.

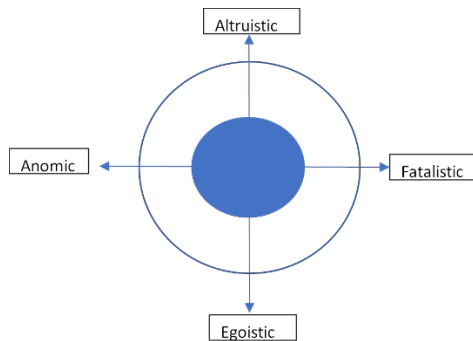
Durkheim's Theory of Suicide

Emile Durkheim's (1897) theory of suicide sorted what is better known today as risk factors into four categories: anomic, egoistic, fatalistic, and altruistic. Despite its age, Condorelli (2013) and Szelényi (2011) have also commented that Durkheim's theory made foundational contributions to suicide prevention research. In the present study, this theory of suicide is used to organize a massive amount of information about suicide risk factors. This section describes Durkheim's theory of suicide and defines each of the four categories.

Anomic, egoistic, fatalistic, and altruistic are the four categories in Durkheim's theory of suicide, and they exist on a continuum. The degree to which a person experiences one of the four categories indicates greater severity and risk of suicide. The overarching conviction in this theory mandates balance between the four factors to avoid high risk of suicide (Durkheim, 1897). All four categories are represented with a visualization resembling an addition sign, where anomic and fatalistic are on one line at two opposing ends, egoistic and altruistic are on the other line at two opposing ends, and both lines intersect in the middle. Anomic and fatalistic suicide are interrelated in that they both involve the loss of a sense of norms but sit on opposite ends of the continuum, where anomic suicide results from changes that are overwhelming for an individual, resulting in loss of identity or social norms. Conversely, fatalistic suicide describes a steady period of perceived stagnation, hopelessness, and entrapment. The second line in the diagram represents egoistic and altruistic categories. Both egoistic and altruistic include a lack of social integration. Egoistic points to social disconnectedness while altruistic requires specific cultural contexts of communal needs being higher than individual resulting in the person believing they are not integral to their community (Durkheim, 1897). Only categories that are opposite of each other on the diagram are considered mutually exclusive, and a person can have factors of more than one category, for example, fatalistic and egoistic (Marson, 2019). The diagram below is based on Marson's (2019) visual representation of Durkheim's (1897) theory of suicide, where the center blue circle is a healthy level of balance of the four categories, and moving toward the rim of the outer, larger circle in any direction indicates increased risk.

Figure 1.1

Durkheim's Theory of Suicide Diagram based on Marson (2019)



Critiques of Durkheim's Theory of Suicide

Rogers (2022) suggested that theory should be evaluated with consideration of its intended audience, usefulness, relevance or age, and potential bias. Some critiques of Durkheim's theory include the lack of feasibility in studying a person at risk of suicide's identification with one of the four categories, as is a crucial component of the theory. The present study reviews the risk factors associated with attempted or completed suicide which align with Durkheim's categories, however, it is not possible to interpret decedents' personal stance on whether these factors are why they completed suicide. Another critique of Durkheim's theory is that it was formed through an ecological fallacy, or observations of groups made up of people in Protestant or Catholic religious groups that were then extended to individuals (Morganstern, 2008). However, this critique holds Durkheim (1897) to a standard of empirically based knowledge that had not yet been established (Selvin, 1958)

Marson and Lillis (2019) also found that the fatalistic category is most consistent with empirical evidence, yet it is the least explained and expanded upon in Durkheim's work, written only as a sidenote in the margins of some other text. Durkheim's position as a male French

intellectual informs his positionality, and his work may be less relevant for non-Western cultures and ethnicities (Peyre, 2023). Durkheim (1897) may have also been persuaded by secular drift or observing an effect of a greater societal circumstance that reflected conditions when people were suffering from extreme hunger, poverty, and classism in the foreshadowing of the French Revolution (Merrick, 2006, as cited by Marson, 2019).

Marson's (2019) Application of Durkheim's Theory of Suicide to Late Life

When Durkheim's theory (1897) was originally developed, the average life expectancy in France was 44, compared to 82 as of 2020 (O'Neil, 2022), an unanticipated gap that provided Marson (2019) an opportunity to apply the theory to late life suicide risk. Marson's (2019) theory, which applied to late life, was born of training as both a sociologist and social worker with direct experience in nursing facilities. Marson (2019) found that Durkheim's (1897) theory was consistent with the body of research and, despite critiques, remains relevant and testable today. While Stanley et al. (2016) have critiqued Durkheim's theory (1897) for underestimating individual mental health factors, Marson (2019) insisted that mental health conditions are the symptoms and byproducts of social context factors described in the theory.

Implications for Social Work Research

Durkheim's (1897) theory of suicide takes a structural approach in its emphasis on the social context, adjacent to the person-in-environment approach central to social work practice (National Association of Social Workers, 2023). Specifically, Durkheim's (1897) theory aligns with social work ethical principles of addressing social problems, social injustice, the dignity and worth of all people, and the importance of human relationships (National Association of Social Workers, 2023). Marson (2019) remarked that other suicide theories emphasize individual factors but ignore contributions of the social context. In Marson's (2019) adaptation of

Durkheim's theory, individual factors like mental health diagnoses or substance use were seen as symptoms of the real issue that exists in the social context. However, Marson (2019) was careful not to make claims that this theory will end late life suicide, and rather, that it is a useful tool that should be used to inform late life suicide prevention and research.

Application to the Study

Durkheim's (1897) theory of suicide, applied to late life by Marson (2019), serves as a theoretical framework for this study. The formerly mentioned categories organize the review of literature in this study and have led to further inquiry about primary care professionals' perspectives of recognizing and responding to late life suicide risk. Marson (2019) also developed implications for clinical assessments to be used with screening tools, combined with the present study's findings, may have ramifications for late life suicide prevention and, therefore, adding to the body of research.

Rational Systems Theory and Healthcare Organizations

Rational systems theory (RST), or the idea that groups of humans are like machines, places emphasis on the role of individual parts of groups and the way they contribute to the overall goal (Winiecki, 2010). For example, a car has wheels to make it move, and a steering wheel to direct its course, and these parts work together to make the car go to a specific location. RST applied to organizations is a way of illuminating the structures, tasks, roles, goals, and authority of different people in an institution (Winiecki, 2010). Foundational works of RST include general systems theory, applied to biological systems by Von Bertalanffy (1972), who suggested that understanding individual parts of an organism, like a human, does not provide insight into the whole organism. General systems theory was applied to other fields like engineering and organizations. Organizations are defined as institutions that engage in

organizing or collective activities with a common goal (Child, 2015). Individual organizations are also more specifically defined in terms of a person's membership, organizational goals, and hierarchies (Luhmann, 1964, as cited by Köhl, 2013). Organizations are embedded in nearly every aspect of life, like businesses, government, and of course, healthcare (Köhl, 2013).

RST has been applied to understand the implicit and explicit functions of organizations in terms of their individual workers' roles, organizational goals, and organizational structures (Winiecki, 2019). The application of RST to healthcare organizations is useful to identify and define layers of policies, leadership, organizational structure, hierarchies, authorities, and different disciplines (Piña, 2015). Rational systems theory was selected for the present study to serve as a roadmap, like a scavenger hunt, to guide the collection of data to include structures, roles, and goals within the organization studied (Piña et al., 2015). Thus, applying rational systems to an organization highlights the degree of success or failure of an organization by its ability to run efficiently, which is theorized to be a product of formal hierarchies and transparent roles (Scott & Davis, 2007).

Prior to RST being applied around the Industrial Revolution of the 18th century to improve productivity, it was originally used to explain engineering (Scott & Davis, 2007). In addition to the foundational works of General Systems Theory, RST was influenced by Taylor's (1947) scientific management, Weber's (1968) theory of bureaucracy, Fayol's (1965) administrative theory, and Simon's theory of administrative behavior (1968) (as cited by Scott & Davis, 2007). Taylor (1968) emphasized a scientific process of management where topic experts held the authority to outline processes and goals. Weber (1968) also outlined authority in terms of different leadership styles that compose an organizational hierarchy, where leadership determines how work is performed. Additionally, Fayol's Administrative Theory focused on

hierarchy but with an illustration of a pyramid to depict a top-down approach to decision-making, where people at the top have the most decision-making power and people at the bottom have the least (Massie, 1965). Finally, Simon's (1958) Theory of administrative behavior's emphasis was based on patterns of productivity, efficiency, and clarification of streamlined tasks (Simon, 1958, p.54).

When applied to organizations, key terms in RST include "goal specificity," the idea that organization exists for the purpose of clearly identified benchmarks and "formalization," which refers to specified workflow, process, and procedures of reaching goals (Scott & Davis, 2007, pp. 36-37). The importance of structure in RST suggested that it creates stability including controlling for elements of human error (Scott & Davis, 2007). Anderson (2006).

General systems theory has been used to make improvements in other organizations, such as aviation, where revisiting formal roles and attention to the control of human error produced a significant reduction in accidents and deaths (Anderson, 2016). Healthcare organizations are like aviation in that even nonprofits are, first and foremost, a business (Worth, 2021), and systems driven by profit are naturally inclined to form rational structures (Smith, 1776). The Institute of Medicine (IOM) reported the impact of human error in healthcare as lives lost to medical errors (Havens & Boroughs, 2000). Applied to healthcare organizations, RST provides insight into unclear goals and inefficient processes that can be considered for improved functioning of the organizational system (Piña et al., 2015).

Critiques of Rational Systems Theory

Reducing human nature to machines may be an oversimplification because humans are arguably more complex and unpredictable than machines (Durso & Drews, 2010). Critiques of RST have been made around its emphasis on rigidity, which could stifle ingenuity and creativity

in the workplace (Scott & Davis, 2007). Overemphasis on hierarchy may also create a power dynamic that exists for its own sake and not because it is useful to the organization, thus leading to self-sustaining authority that blocks other fresh voices (Scott & Davis, 2007). RST fails to incorporate the dynamic of human involvement, where there is a risk for stated goals and reality to diverge (Scott & Davis, 2007).

Rational Systems and IPEC

The Interprofessional Education and Collaboration (IPEC) framework was proposed in direct response to the IOM (2000, as cited by Havens & Boroughs, 2000) reports of healthcare accidents, which called for improved mechanisms in the healthcare system (Sullivan et al., 2015). IPEC has been a force urging healthcare systems to collaborate more between disciplines to prevent the siloing of healthcare (Sullivan et al., 2015). In response to this urging for more collaboration, healthcare professionals are called to better understand their own roles, as well as the way that their team members contribute to organizational goals for improved functioning of the system (Sullivan et al., 2015).

Rational Systems Theory Application to Study

Chernovi-Knapp (2022) suggested that the healthcare system in the U.S. is experiencing a staffing shortage in the tail of the COVID-19 pandemic, especially for hospital systems. One longitudinal study of primary care practices found that the percentage of healthcare professionals listing a major work-related stressor increased from 34% in 2018 to 53% in 2022, with the main stressor being short a clinician (Britz et al., 2024). The combination of healthcare staffing shortages and an aging population is projected to negatively impact the already huge demand for healthcare systems, especially primary care (Sinclair, 2023). Healthcare shortages have revived interest in investing more in healthcare teams and collaboration. Interprofessional collaboration

and education (IPEC) also have been linked to improved patient outcomes (Sinclair, 2023).

However, the body of research, including perspectives on late life suicide risk in primary care, is often siloed, which goes against the grain of IPEC. Adding to the body of research, the present study proposes to explore the way that specific policies, tasks, and team-based collaboration are involved in recognition and response to late life suicide risk in primary care settings by including multiple disciplines.

CHAPTER 2: REVIEW OF THE LITERATURE

Three systemic reviews of late life suicide risk factors studied the dependent variables: suicidal ideation (Fernandez-Rodrigues, 2022), suicidal behaviors (Conejero et al., 2018), and suicide attempts and completion (Beghi et al., 2021). The latter best aligns with Durkheim's (1897) theory of suicide because it looked at risk factors of suicide attempts and completed suicide, increasing confidence that the risk factors are associated with the actual act and not solely potential precursors. The present study's review of literature relies on Marson's (2019) late life application of Durkheim's theory, and organized findings within the four categories of risk factors (anomic, egoistic, fatalistic, and altruistic). Lastly, this section discusses prevention points, interventions, and barriers to ideal practice in primary care settings (Conejero et al., 2018; de Mendonça et al., 2021; Laflamme et al., 2022; Mann, 2021).

Late Life Suicide Risk Factors

Fatalistic and Anomic Categories in Late Life

Marson (2019) argued that of the four categories, fatalistic late life suicide risk was the most prevalent. The fatalistic category for late life included circumstances resulting in bleak stagnation and a lack of hope (Marson, 2019). Durkheim's (1897) theory suggested that fatalistic conditions are those with high regulation, meaning little flexibility or opportunity to change the circumstance for the better. Marson (2019) presented literature on the social context, where late life experiences were most likely to be all-consuming and impact living arrangements. Marson (2019) suggested that examples of fatalistic risk factors in late life were living in poverty, long-term nursing facility residence, or the presence of functional impairments and medical complexity (Marson, 2019). Marson (2019) defined poverty as a lack of financial means like income and assets, which would prevent someone from being able to afford some or all of their

basic needs like food, clothing, shelter, or medical care. Rank and Williams (2010) added that late life poverty is a more underestimated issue than is reflected in the poverty rate and that most older adults will experience a period of financial strain in late life (Rank & Williams, 2010).

Poverty is defined by income but is also associated with unmet health and social needs with the potential to interrupt healthy human development (Rank & Williams, 2010).

Evidence of fatalistic conditions as described by Marson (2019) was found in the literature review. In studies of late life suicide attempts or completed suicide, older adults also had multiple health problems, failing health or deteriorating health, chronic illness, or perceived poor health (Almeida et al., 2016; Artero et al., 2006; Cabello, 2020; Calati et al., 2017; Mokhtari et al., 2019; Jackson et al., 2020; Juurlink et al., 2004; Miller et al., 2008; Ozer et al., 2016; Schmutte & Wilkinson, 2020; Terranova et al., 2012; Tsoh et al., 2005; Turvey et al., 2002).

Other studies found a relationship between suicide attempts or completion and medical needs and complexity (e.g., Jackson et al., 2020, Cabello 2020; Ozer et al., 2016 Schmutte and Wilkinson, 2020; and Terranova et al. (2012). More specifically, some studies attempted to pinpoint medical diagnoses, where older adults who had attempted or completed suicide also had low HDL cholesterol, insomnia, lifetime major depression, and headaches (Calati et al., 2017), angina pectoris, coronary surgery, and cardiovascular disease (Artero et al., 2006), chronic obstructive pulmonary disease (COPD) (Tsoh et al., 2005), congestive heart failure, chronic obstructive lung disease, seizure disorder, urinary incontinence, moderate pain, and severe pain (Juurlink et al., 2004), and malignant cancer (Miller et al, 2008). Lastly, Cabello et al. (2020) also found high rates of food insecurity was prevalent with older adults who had attempted or completed suicide.

While fatalistic suicide refers to a longer period with steadily stagnant conditions, its opposite, anomic refers to fast, disruptive, and overwhelming change that creates a loss of identity and little time or opportunity to cope (Marson, 2019). According to Marson (2019), common events in late life that fit anomic criteria include the loss of a spouse, changes to professional roles when they are an integral part of a person's identity or culture, recent admission to institutionalized care, such as a nursing facility. Older adults who had attempted or completed suicide were more likely to have lost a spouse, been admitted to a nursing facility in the last six months (Meghini & Evans, 2000) and more likely to have had a recent hospitalization (Tsoh et al., 2005).

Egoistic and Altruistic Factors and Late Life

While fatalistic and anomic categories point to an older adults' personal experience of their life circumstances, connection with others and community are also emphasized in Durkheim's (1897) theory of suicide. Marson (2019) contended that the egoistic category included factors like living alone, and poor social connections, were circumstances that would lead to social isolation in late life. The research found that late-life suicide attempters and completers were likely to have been divorced, widowed, were living alone, reported few social supports, and experienced family conflicts (Artero et al., 2006; De Leo et al., 2001; Jackson et al., 2020; Menghini & Evans, 2000; Hedna et al., 2020; Jackson et al., 2020; Mokhtari et al., 2019; Mokhtari et al., 2019; Turvey et al., 2002; Torresani et al., 2014; Shah, 2009).

Lastly, the altruistic category refers to feeling like a burden to others and believing that they are more valuable dead than alive (Marson, 2019). Marson (2019) suggested that social and cultural contexts play a huge role in this category, and that some risk factors could include

having assets (Marson, 2019). However, at the time of the present study, no literature in support of altruistic suicide could be located.

The Risk of Being Male

Durkheim (1897) originally observed high rates of suicide in men, but Marson (2019) did not address this. High rates of male suicide is discussed in the literature which called attention for prevention efforts (De Leo, 2022; WHO, 2019). Furthermore, studies of older male suicide indicated evidence for fatalistic, anomic, and egoistic categories (Almeida et al., 2016; Apesoa-Varano et al., 2018; Canetto, 2015; Chen, 2021). Older men who died by suicide were had a high prevalence of disease affecting multiple bodily systems (Almeida et al., 2016) and there was an association between suicide risk and the severity of pain (Li & Conwell, 2010). Evidence of anomic suicide for older men included that Chen et al. (2021) found that suicide rates were associated with higher unemployment rates when they did not also have a caregiving role (Marson, 2019). Beghi et al. (2021) found evidence of egoistic, where older men were more vulnerable to adverse impacts of not having a partner, being widowed, or living alone.

Protective Factors and Safety Planning

Suicide risk factor identification may make a positive contribution to prevention efforts (Almeida, 2016). This goal exists not only to prevent a tragic social problem but also due to societal and legal expectations of foreseeability, a quandary for professionals because there is no guarantee that risk assessment will identify a person who is suicidal (Adler, 2023). There is a legal expectation that healthcare professionals assess suicide risk for lack of a better option (Adler, 2023). Adding further complexity, governing bodies influencing primary healthcare practices are not in agreement (Williamson et al., 2019). The Joint Commission recommends

assessing for suicide risk, while the U.S. Preventative Services Task Force has stated that evidence is insufficient to recommend use of risk assessments, so it is not recommended (Williamson et al., 2019).

These contradictory forces place primary care professionals in an unfair, lose-lose situation. What Williamson et al. (2019) failed to consider in their statement is that while factors of potential suicide risk do not guarantee a person will attempt or complete suicide, these assessments reveal unmet needs that are detrimental to quality of life. Identifying risk factors reveals opportunities to strengthen protective factors, referred to as the salutogenic approach (Bhattacharya et al., 2020). Further, Simon (2018) recommended that professionals continue to use assessment tools that sweep multi-level factors of a patient's health and history. Although there is disagreement about screening for suicide risk, the benefit of safety planning is clear (Williamson et al., 2019). Safety planning is considered the best practice in cases where high suicide risk is identified, and it is considered an effective prevention (Pruitt et al., 2020; Williamson et al., 2019).

Almeida (2016) suggested that suicide prevention lies with identification of risk, however, while Franklin et al. (2017) stressed the importance of protective factors rather than just searching for deficits. Durkheim's (1897) theory suggested that improper social integration leads to increased suicide risk and that adequate social integration was the antidote. Social integration refers to a person's sense of belonging to social groups that are a source of support and meaning, like intimate partners, friendships, families, and community involvements (Marson, 2019). Social integration is associated with lower risk of suicide (Smith et al., 2019) and McLaren et al. (2022) found that instilling hope may be an important tool to reduce lack of social integration, or sense of belonging in older adults. Chen et al. (2021) found that that having

an active caregiving role in families were associated with lower suicidal ideation especially for men. Butcher & Ingram (2018) also found that having children and grandchildren may be a protective factor against suicide risk.

Late Life Suicide Prevention

Past research advocated for risk factor identification to contribute to preventative practices through assessment and intervention design (Almeida, 2016; Apeso-Verano, 2018; Beghi et al., 2021; Bishop et al., 2016; Butcher et al. 2018; Chen et al., 2021; Conejero et al., 2021; Cui & Fiske, 2020; Fernandez-Rodriguez et al., 2021; Hernandez 2021; Laflamme et al., 2022; Martinez-Ales et al., 2022; Wallace 2021). Fortunately, late life suicide intervention in primary care settings has been promising (Holm et al., 2020; Okolie et al., 2017; Wallace et al., 2021). Effective suicide preventions in healthcare settings have been demonstrated in different environments like primary healthcare, home health care, community-based, and counseling settings (Wallace et al., 2021). Three studies cited characteristics of successful suicide prevention programs in healthcare settings, and all suggested that identification of patient risk factors is essential (Holm et al., 2020; Okolie et al., 2017; Wallace et al., 2021). Holm et al. (2020) found that suicide prevention in primary care settings includes treatment of both physical and mental problems, referral to other needed services, community health education programs, and patient education on warning signs and social support. Okolie et al.'s (2017) systemic review found that suicide prevention should include depression screening and management, employing both pharmacotherapy and psychotherapy interventions, telephone counseling, and comprehensive community-based programs. In Wallace et al.'s (2021) study, effective suicide prevention programs encompassed depression measurement, the use of case managers,

implementation of home visits, family support, and individual, family, and community education.

Gaps in the Literature

The complex and multifaceted issue of late life suicide has implications for the use of collaborative care models in primary care settings (Raue et al., 2014; Okolie et al., 2017; Leflamme et al., 2022). Frequency of medical care utilization increased with age, which highlights to opportunity of primary care to make an impact to late life suicide prevention through comprehensive assessment, care, and referrals (Adler, 2023; Almeida, 2016; Bishop, 2016; Butcher et al., 2018; Chattun et al., 2022; de Mendonça Lima et al. 2021; Okolie et al., 2017, Raue et al., 2014; Mann et al., 2021). There are fewer studies of late life suicide prevention compared with studies targeting younger age groups (São José et al., 2019). This knowledge gap could trickle into practice, where late life suicide may already be misunderstood as a reasonable and rational choice (Uncapher, 2016), or it could create a bias around suicide being more important for younger ages (São José et al., 2019). Furthermore, biases about aging and mental health persist (Fiske, 2016). Ageism was correlated with poor health outcomes in Benek-Higgins et al. (2008) and Gamliel & Levi-Belz (2016) found a positive correlation between ageism and acceptance of older adult suicide. Misconceptions about normal aging can be dangerous, where some providers assumed depression was a part of aging (Fiske, 2016).

Qualitative Studies of Staff Perspectives

The research on professionals' experiences and perceptions of late life suicide risk have been informed by qualitative studies (Wardig et al., 2022; Almeida, 2021; Bjorkman, 2018; Sveningsson, 2018; Saini, 2018; Leavey, 2018; Karlsson et al., 2021; Grundberg et al., 2016; Vannoy et al., 2016). Data collection included semi-structured, in-depth interviews (Bjorkman et

al., 2018; Wardig et al., 2022; Grundberg, 2016; Almeida, 2016; Saini, 2018; Leavey, 2017), recorded exam room conversations between providers and older patients (Vannoy et al., 2016), and written narratives (Karlsson, 2021). Samples included primary health care professionals' perspectives (PHCPs), which included physicians (Vannoy et al., 2011; Saini et al., 2018; Leavey et al., 2018), nurses (Wardig et al., 2022; Karlsson et al., 2021; Bjorkman et al., 2019; Svenningsson et al., 2018; Grundberg et al., 2016) and a combination of physicians, nurses, nursing assistants, community health workers, and oral health professionals (Almedia et al., 2021). All nine studies analyzed data with content analysis and written transcripts (Wardig et al., 2022; Wardig et al., 2022; Almeida et al., 2021; Bjorkman et al., 2021; Svenningsson et al., 2018; Saini, 2018; Leavey et al., 2017; Grundberg et al., 2016; Vannoy et al., 2011).

Grundberg (2015), Almeida (2021), and Svenningsson (2018), found that primary healthcare professionals (PHCP) expressed the importance of in-depth assessment, interprofessional teamwork, and acting as a supportive presence for patients. Karlsson et al. (2021) emphasized the importance of forming trust and connection with the patient. While the PHCPs described ideal practice, themes around challenges and barriers included concerns that suicide assessments were time consuming, and that they lacked time, resources, different treatment options, and multidisciplinary approaches (Bjorkman, 2019; Almedia, 2021; Wardig, 2022; Karlsson, 2021; Saini 2018). Further, PHCPs expressed that working with suicidal patients evoked emotions of fear, stress, and avoidance of the topic of suicide (Almeida, 2021; Wardig, 2022). In four studies, PHCPs discussed the importance of suicide assessment education and real-world experience conducting them (Wardig, 2022; Karlsson, 2021; Bjorkman, 2019; Leavey, 2017). Four studies touched upon PHCPs' beliefs about suicide and what their roles was in prevention (Almeida, 2021; Bjorkman, 2018; Svenningsson, 2018; and Vannoy et al., 2011).

According to Almeida's (2021) study participants believed suicide was the result of societal failures, accumulation of losses, and a lack of adequate social support. Bjorkman (2018) and Svenningsson (2018) found that PHCPs believe their professional role was vital in increasing client access to needed services. Vannoy et al. (2011) identified that PHCPs would assess for suicide, convince patients that suicide was unnecessary, but may have lacked direction or clear follow up in a plan moving forward.

Although these perspectives offer valuable input, these studies all have limitations. Most took place in Sweden (Wardig et al., 2022; Wardig et al., 2022; Bjorkman, 2018; Karlsson, 2021; Grundberg et al., 2016; Svenningsson et al., 2018) with one in the United Kingdom (Leavey et al., 2017; Saini, 2018) one in Brazil (Almeida, 2021), and one in the UK (Vannoy et al., 2011). Therefore, it is possible that some of these findings might not be transferrable to the U.S. cultural context and healthcare systems impacting late life suicide risk (Patton, 2015). Study sample composition is another limitation. In 4 out of 9 studies, samples were primarily women (Karlsson, 2021; Bjorkman et al., 2018; Leavey et al., 2018; Grundberg et al., 2016). Almeida (2021) conducted convenience sampling from a single healthcare practice, and Grundberg (2018) used snowball sampling, both of which could create bias in the sample. Svenningsson et al. (2018), who conducted interviews in groups, noted that their sample had limited experience in their profession which might have influenced responses. Further, Saini (2018) and Leavey et al. (2017) note that some data collection involved retrospective accounts, which could muddle the accuracy of findings. Vannoy et al.'s (2011) study contained a small data set over ten years old. Lastly, Bjorkman (2019) suggests that limitations of content analysis could impact the trustworthiness of findings.

The Collaborative Care Model and Suicide Prevention

Alexopoulos et al., (2009) studied an intervention of late life mental health using a collaborate primary care model and found a decrease in depression and suicidal ideation. In this study, a late life depression intervention was designed and implemented by a multidisciplinary team to evaluate, monitor, and treat patients (Alexopoulos et al., 2009). Similarly, Grigoroglou et al.'s (2021) meta-analysis found that collaborative primary care settings treating depression were effective in reducing suicidal ideation for people 65 and older. Despite the possibilities that may exist at the primary care level, Christensen et al. (2023) posed that time remains a considerable barrier to ideal suicide prevention practices, like risk assessment. Even for false positive screens, when a person appears to be suicidal but on further inspection is not, the added time creates a significant challenge for providers (Bryan et al., 2021). Christensen et al. (2023) suggested that co-located behavioral health staff in primary care would have important implications for efficiency. Primary healthcare providers who had access to collaborative models were more likely to conduct routine suicide risk screening and viewed access to behavioral health staff as positive (Christensen et al., 2023). Freedenthal (2018) also warned that screening tools cannot and should not replace a dedicated clinical mental health professional. Providers noted that on-site behavioral health improved their confidence and willingness to intervene with patient suicidality (Christensen et al., 2023). Raue et al.'s (2014) also found that the collaborative care model in primary care settings is instrumental to the needs of older adults at risk of suicide

Aside from requiring an unrealistic amount of time from providers, functioning without on-site behavioral health has other consequences for older adults (Raue et al.'s, 2014). Without this resource, more patients may be sent to the emergency department following a positive suicide risk screen, which was listed as the most common response to a positive suicide screen in

primary care settings (Christensen et al., 2023). According to Freedenthal (2018), the emergency department (ED) should only be used as a last resort for people who have a positive suicide screen, as the hospital can do more harm from the risk of patients being traumatized by the experience, and healthcare fragmentation. ED admissions can initiate a ripple of other problems for older adults especially because they are more likely than younger people to experience adverse outcomes with hospitalization, such as inaccurate diagnosis, additional medications, and functional decline (Aminzadeh & Dalziel, 2002). Instead, Freedenthal (2018) advocated for in-depth mental health-related assessments, safety planning, follow-up, and monitoring from the same trained professional whenever possible.

Historical Context: Primary Care Social Work Collaboration and Leadership

According to D'Amour et al. (2005), collaboration is a tool that healthcare systems depend on to meet patient needs. Both social work and primary care are centered around the importance of the patient's social context, which planted the seeds of a partnership which can be dated back to 1905 (Cowels, 2003). This collaboration began when Dr. Richard Cabot hired social workers to conduct home visits for his medical practice, a choice that was intended to provide physicians more time to focus on medical care (Cowels, 2003). This partnership was the start of social work becoming integrated into secondary settings, which means places that do not require social work but where their expertise is complementary to the setting goals (Cowels, 2003). Around this time, the social context was increasingly considered an integral part of overall medical care, and social workers were integrated to educate physicians about these factors so that physicians could focus on medical issues (Cowels, 2003).

Development of the social work primary care relationship continued through the Great Depression when programs proposed through the Social Security Act required social work

Cowels, 2003). More recent macro-level social work primary care collaboration included the National Association of Social Workers and the American Academy of Family Physicians being among 18 organizations to support the Collaborate in an Orderly and Cohesive Manner (COCM) Act (2021), which supported collaborative care models for mental health treatment in primary care settings (NASW, 2021). Social workers also practice in primary care settings in roles that are central to behavioral healthcare (Fraser et al., 2016), and hold essential roles in residency training centers (Cowels, 2003).

Ketel et al. (2021) recommend that primary care efficiency depends on emphasizing and strengthening interprofessional skills to work in teams. As caseloads have increased relative to fewer providers choosing to specialize in primary care and family medicine, primary care and social work collaboration are critical in practice and leadership (Willis et al., 2021). Fraser et al. (2016) found that primary care settings with social workers reap benefits such as cost efficiency and improved behavioral health outcomes (Fraser et al., 2016). Social workers also continue to dominate the field of mental health (Dybicz, 2015). As social workers maintain a presence in primary care and expertise in mental health, additional research on late-life suicidality would have implications for IPEC and social work leadership in primary care settings.

Philosophical Assumptions

Ontological, Axiological, Epistemological, and Methodological

Before commencing the research, a study cannot be designed without exploring philosophical assumptions that influence every research design aspect (Cresswell & Poth, 2018). Qualitative research transparency is also enhanced through a discussion of the philosophical underpinnings contributing to study design (Adler, 2022). According to Cresswell and Poth (2018), four major assumptions set the foundation of a study which are

axiological, epistemological, axiological, and methodical. Before a phenomenon can even be defined, the ontological assumptions point to the idea that reality is a construct of individual experience, shaping both reality and the individual. Second, epistemology covers the area of knowledge, how it is obtained, how it is being defined, and what the specific connection is to knowledge, the researcher, and the topic. Axiological assumptions contain the role of personal characteristics and values that impact the research from beginning to end, suggesting that multiple personal factors contribute to why a researcher chases a topic area. Lastly, methodological points to the lens through which the researcher views the topic and research question (Creswell & Poth, 2018). Differing positions within these four philosophical assumptions have been responsible for growing pains throughout the history of the field of research, or as Gage (1989, p. 4) calls “paradigm wars.” As statistical research gained popularity, the resulting tension created beliefs that some sources of knowledge are more credible than others. These differing positions created polarizing views of ontological and epistemological perspectives, or what Slevitch (2011) calls “logic of justification” (p. 78), or the rationale for a study.

Positivism, Idealism, Constructivism, and Interpretivism

Understanding the basis for this tension also necessitates a broad understanding of positivism, idealism, constructivism, and interpretivism. A positivist believes that objective truth exists and that it can be measured and quantified, and it can be done with minimal impact or disruption to the phenomenon with proper care (Cresswell & Poth, 2018). For example, in double-blind clinical trials for medications, great lengths are taken to ameliorate the placebo effect by ensuring that neither the participant nor the researcher is aware of who receives the treatment (Thyer, 2010). This is an example of the study being designed around the assumption

that knowledge of an objective reality, the drug effect, can be achieved and must be free of disruption in the study, which will ultimately change the phenomenon. Conversely, an idealist acknowledges humans' impact on reality but takes this a step further, suggesting there is no one objective truth and that multiple versions of reality exist which are endlessly influenced by a person's experience of the phenomenon (Cresswell & Poth, 2018). The implication is that the impact of individual experience is a source of knowledge that matters and is eliminated when a phenomenon is stripped of its subjective data, that there is no such thing as one objective reality, which is especially the case in social science (Slevitch, 2011). Constructivism is the idea that knowledge is constructed by individuals, which is endlessly varied from person to person. Lastly, interpretivism points to the way that people make meaning in a variety of ways, and engaging in the study of some aspects of humanity cannot fit neatly into the same packages of other realms of natural science (Farrow et al., 2020).

The concept of multiple realities' usefulness is evident for collecting contextual data that exists primarily in human experience or the meanings that someone ascribes to a phenomenon. This is where qualitative methods shine —when little is known about the phenomenon, rather than discarding the impact of subjective forces, including them as one part of the whole picture. Qualitative methods lean into the idea that knowledge cannot objectively exist without being experienced, and therefore, the two cannot be separated (Padget, 2017).

While quantitative methods involve intentionally removing subjective factors to measure as objectively as possible, qualitative methods open their arms wide to the subjective components of phenomena. Further, the individual experience and context of the subject and researcher are emphasized as necessary facets of knowing. In qualitative research, the observer is not removed but joins and interacts with the environment (Haverkamp & Young, 2007, p. 268).

According to Padget (2017, p. 17), qualitative methodology is a valuable lens when exploring “messy, unbounded ways that do not lend themselves to standardized measurement.” Further, it is a means of seeing a phenomenon when it is contextual and prone to dynamism or a state of constant ebbs and flows (Padget, 2017). The research question that guided this qualitative case study captured knowledge that existed within a specific context in a specific period, prone to changes and fluctuations, and that also exists within multiple sources, including the personal perspectives of primary care professionals.

Limitations

Case studies have been critiqued for being particularly mentally taxing due to working in the subjective, potentially not fully understanding the phenomenon or research question until after data collection (Padget, 2017). A case study requires much from the researcher, including adaptability, keen mindful awareness, the ability to differentiate objective observations from subjective impressions, and the role of bias (Padget, 2017). This constant review creates a mental and emotional load necessary to ensure trustworthy data collection (Padget, 2017). The researcher addresses this drawback by journaling, memoing, consulting with peer support from colleagues in the doctoral program, and recording these impressions in memos (Padget, 2017).

Another drawback is that case studies are considered time consuming because the design is individualized to their respective cases, and there are fewer pre-determined procedures (Yin, 2018). Case study data collection has also been considered extremely time-consuming and complex due to collecting multiple forms of data that are lengthy and complicated to organize (Yin, 2018). The present study addressed issues of time limits by choosing a single case study versus a multiple case study, where multiple practice settings might be compared (Yin, 2018). The researcher also considered feasibility and time constraints in selecting the study site, and set

realistic goals for interview length (Padget, 2017). Another strategy for efficiency involves dedicating as much time to preparation as possible and making appropriate revisions along the way, which was informed by attention to detail specific to the study site (Yin, 2018). Lastly, the volume of data was simplified through software like Qualtrics, Zoom, OneDrive, and NVivo to expedite organization (Yin, 2018).

Cresswell and Poth (2018) argued that case studies can lack transferability or relevance to settings outside of the one being studied (Cresswell & Poth, 2018). According to Yin (2018), this determination should be made individually and not be compared against dissimilar settings or methods. Padget (2017) suggested that a detailed description of the site is enough to offer insight as to its usefulness to future research or similar settings. This was addressed by collecting a basic demographics survey of participants and collecting archives that informed the study site's context.

Implications and Conclusions

Primary healthcare professionals rely on partnerships with other professionals to ensure that patients receive timely care and support (McDowell et al., 2011; Voros et al., 2009). Benefits derived from risk assessment screening tools have also been noted (Christensen et al., 2023). A review of the relevant research on PHCP's perspectives on late-life suicide risk reveals areas of needed research. Studies addressing primary healthcare perspectives of late-life suicide are limited, especially for those done in the U.S. Furthermore, existing studies have isolated specific disciplines and not studied teams in one specific setting. None of the studies reviewed include insight into how and why primary care professionals make decisions about best practices. Lastly, studies have not used Durkheim's (1897) theory of suicide as the theoretical framework and lack insight into how screening tools detect social context risk factors as posed by Marson

(2019). The overarching research question is: How does one primary care practice recognize and respond to late life suicide risk?

CHAPTER 3: METHODOLOGY

The researcher conducted a qualitative case study to determine how one primary care practice recognizes and responds to late life suicide risk. The present study focused on one single primary care practice that treats older adults and utilizes a collaborative care model, considered an effective management of behavioral health in this setting (Bruce & Pearson, 2022). Further, Christensen (2023) found that most primary care practices use the PHQ-9 to screen. Since the PHQ-9 does not include social context factors in the four categories discussed by Marson (2019), this study explored professionals' perspectives. The research question was conceptualized with the specific aims to explore:

- Primary healthcare professionals' impressions of the presence and importance of social context suicide risk factors, as discussed by Marson (2019), when working with older adult patients and;
- The knowledge, tools, skills, and collaboration needed to provide optimal care and detection of late-life suicide risk;
- The role team collaboration has on how and when to screen older adults for suicide risk and how to care for those who have a positive screen.

Research Design Rationale

Miller et al. (2023) have discussed how philosophical assumptions guide a study design and procedures. This section provides an overview of the philosophical assumptions behind this study and their specific application to the study procedure. The ontological assumptions of this study are that information about the phenomenon exists in a specific context and subjective experiences of both participants and the researcher (Cresswell & Poth, 2017). This assumption guided the inclusion of multiple perspectives collected with multiple forms of both subjective

and objective data (Cresswell & Poth, 2017). The epistemological assumptions behind this study are that sources of knowledge exist as part of the participants' individual and collective experiences and were analyzed alongside objective data. This indicates the need for the researcher to quickly assimilate and establish rapport in the site and spend a significant amount of time in the study setting to gain access to knowledge (Cresswell & Poth 2017). Axiological assumptions guided the researcher to enter the site with an understanding of how their positionality and reflexivity impact the study. The researcher addressed this by writing a positionality statement and keeping subjective data separate from objective data, and impressions separate from the data (Padget, 2018). Finally, methodological assumptions of using a qualitative case study pointed to the need to make revisions and preliminary analysis throughout data collection. Most importantly, as new leads were collected, previously held understandings were reconsidered (Padget, 2018). Additionally, the researcher spent time with a key informant, or someone who was knowledgeable about the study site, prior to entering the study site to ensure trustworthiness of data (Cresswell and Poth, 2017).

Research Design: Qualitative Case Study

A case study is defined by Priya (2021) as an in-depth and rich exploration of the phenomenon of interest that exists within a specific context. Specifically, this was an instrumental case study, or a case study done to explore a specific issue, which is the recognition and response to late-life suicide risk (Cresswell & Poth, 2018). While this definition best describes the method, the rationale for the use of a case study is summarized with the following: The phenomenon exists within a specific real-life context (Yin, 2018; Merriam, 1995); The research question points to unique activities to be studied at a specific point in time (Yin, 2018; Stake, 1998);

An in-depth understanding or exploration is being conducted to provide rich and thick information about the phenomenon within its context (Merriam, 1995; Stake, 1995; Padgett, 2018);

- The real-life setting should be preserved as much as possible (Yin, 2018);
- The unit of analysis is multi-dimensional as it covers the overall context, sub-contexts, and individuals (Yin, 2018).
- The phenomenon can be explored by collecting data from multiple forms over a sustained period (Priya, 2021; Yin, 2018).
- The research question asks how or why, and the researcher has little control over the environment or events (Yin, 2003).

Case study design approaches share common methods in some ways but not all. Merriam (1995), Stake (1995), and Padgett (2019) approach case studies as being only qualitative. Merriam (1995) calls the case study an “intensive and holistic description” (p. xiii), whereas Stake (1998) emphasizes it as an opportunity to study phenomena under specific circumstances (p. xi). Yin (2018) stands out most from the other perspectives as being highly formulaic and including quantitative data collection. However, Yazan (2015) points out that the lack of planning and structure may not bode well for novice researchers in a case study, calling on the need for flexibility. Similarly, Stake (1998) suggests that “the course of the study cannot be charted in advance” (p. 22).

Data Sources

The use of case study requires that multiple forms of data are to be collected to provide a rich and thick description of the phenomenon and to triangulate data (Padgett, 2015; Yin, 2003). Sources of data used in this study included a demographic survey, one in-depth interview per

staff person, on-site observations, and collection of archives. Participant interviews served as a resource for archive collection and on-site observations. Yin (2018) influenced the case study protocol of this site as well as the conceptualization of the study sites and which specific sources of data would lead to the research question.

Instruments

However, the instruments used to collect data were most influenced by Padget (2019), specifically with the interview protocol, observations, archive collection, as well as aspects of reflexivity and positionality. To aid with data triangulation and transferability, a 13-item demographics survey was developed to collect objective data about the participants' training, experience, practices of suicide risk screening, and the screening tools used at the clinic (Padget, 2017; Yin, 2018). Questions on the survey were informed by surveys used in Christensen et al. (2023) and Daniels (2023). Survey questions contained in Appendix E.

Data Analysis

Lastly, Merriam (1995) and Stake (1998) informed aspects of the data analysis, specifically the idea that analysis and data collection should take place concurrently for the purpose of better understanding the setting as you progress in the study, making appropriate revisions as needed, and applying what you learn as you go. This was instrumental during initial data analysis of interview transcripts, where archives continued to be collected to understand the interview data better.

In-Depth Interviews

In-depth interviews are one of the most important sources of data (Yin, 2018). One-on-one, in-depth, semi-structured interviews are utilized to gain insight into each professional's personal impressions (Ryan et al. (2009). Kvale (2015) describes an interview as a space in

which knowledge is constructed between the researcher and the participant to understand the phenomenon from the person's specific perspective. Interviews have become a hallmark of qualitative research and are a tool that provides unmatched detail compared to surveys (Boyce & Neale, 2006). However, the inclusion of in-depth interviews matters less than establishing that participants are the experts on the topic, helping to write the story about their profession (Padgett, 2017). In the interest of limited time, an interview protocol was developed, but the semi-structured format encourages a collaborative approach, reinforcing the quality of the interview (Kvale, 2015, as cited by Cresswell & Poth, 2018). Interview protocol located in appendix F.

Observations

Observations are another important source of data for a case study, as they offer insight that might not be accessible from a participant's perspective (Morgan et al., 2017); for example, aspects of the phenomenon that interviewees were or were not aware of not aware and did not find useful to mention. Furthermore, observations are implied when the phenomenon is context-dependent and tacit (Morgan et al., 2017). On-site observations were made in various locations on site as detailed under procedures.

Archives

Archives comprise the third source of data, which consists of organization-specific materials (Padgett, 2017). Printed or electronic materials are widely used in healthcare settings to provide educational materials intended to positively direct patient outcomes (Giguère et al., 2020). Bowen (2009) remarks that the collection of documents is instrumental with qualitative case studies to corroborate other forms of data. Furthermore, it is an essential component of triangulating data or verifying what has been uncovered from other forms of data (Bowen, 2009).

Collecting documents from the setting is also practical and informs future data collection and interview content with individuals. These materials can point out areas that need further observation, offer historical perspectives, and supplement information discussed in interviews (Bowen, 2009).

Feasibility

The feasibility of studying a healthcare setting in great depth has been a significant focus while designing this study. Høyland et al. (2015) suggest that conducting research with healthcare professionals can be challenging as they have limited time and are difficult to recruit. According to this study, gatekeepers should be used to gain access to healthcare settings. Even after access is obtained, institutional limits create further feasibility issues, and significant environmental changes could burden the professionals (Krathwohl & Smith, 2007). Healthcare settings are often hectic and fast-paced, so the researcher anticipates that there will be an element of unpredictability. The researcher needed to stay flexible and remain available to participants working different schedules (Yin, 2018).

Research Questions

Yin (2003) asserted that a case study needs to include propositions similar to research questions. This term refers to questions that guide data collection that can be traced back to the overarching research question, how does one primary care practice recognize and respond to late-life suicide risk? Asking this question alone would not uncover meaningful data, so it needs to be distilled into questions that would (Yin, 2018). Three research questions informed this study:

Question 1. What are site professionals' impressions of the presence and importance of social context risk factors framed by Marson (2019) when working with older adult patients? A primary

care practice that uses collaborative care because experts suggest this is the best model to address mental health with older adults (Bruce & Pearson, 2022). Christensen et al.'s (2023) suggested most providers are utilizing screening tools that do not contain what Marson (2019) suggests precludes late-life suicide.

Question 2. What knowledge, skills, and tools are employed by professionals, including those that are tangible and invisible? Christensen et al. (2023) found the use of the PHQ-9 is most common for suicide risk screening (Christensen et al., 2023). However, this does not include information about professional insights, experiences, or impressions.

Question 3. What role does team collaboration have in decision-making on how and when to screen older adults for suicide risk and how to care for those who have a positive screen? This proposition offers a description of what it might look like to collaborate in teams-based practice on late-life suicide risk. What does it look like for those who are already practicing this model? Table 3.1 summarizes how the research questions inform the type of data being collected, organized using a table from Berg (2004, as cited by Hancock & Algozzine, 2011). Yin (2018) also recommends organizing multiple forms of data with research questions before data collection to provide general ideas of what to look for once on site.

Table 3.1

Checklist for Implementing Case Study (Berg, 2004, as cited by Hancock & Algozzine, 2011)

Research Question	Information Needed	Collection Method
What are site professionals' impressions of the presence and importance of social context risk factors framed by Marson (2019)?	Professional perspectives	In-depth interviews
What knowledge, skills, and tools are employed by professionals, including those that are tangible and invisible?	Professional perspectives Screening practices Organization policies	In-depth interviews Archives, such as org. Handbook, blank screeners, patient pamphlets Observations of staff communication
What role does team collaboration have in decision-making on how and when to screen older adults for suicide risk and how to care for those who have a positive screen?	Professional perspective Organizational documents on procedures /protocols Interaction between team members	In-depth interview Archives of organizational handbook/workflow Observations of team meetings, staff interactions

Research Setting and Context

Setting

This study took place at a single primary care (PC) practice in Pennsylvania. Specifically, this site practices family medicine, integrated behavioral health, and functions as a family medicine residency, meaning it is considered an academic health center. Throughout this paper, the study site will be referred to as Daisy Clinic to protect the organization's and staff's privacy. The site was selected because it is a primary care practice with collaborative behavioral health care, sees at least some older adults, and expressed interest in participating in the study. Daisy Clinic was feasible for the researcher to visit, and the staff expressed an interest in the topic. Daisy Clinic's primary features are typical of many other primary care practice sites in the state.

Population and Sample

This study interviewed staff at Daisy Clinic, conducted on-site observations, and collected archives. The population involved in this study is family medicine healthcare professionals in Pennsylvania. Snowball sampling was used for participant recruitment. This method was used to identify people eligible and interested in the topic (Padgett, 2011). This method was also useful because the researcher was an outsider, and specifics about the site were unknown, so the researcher depended on the participants' knowledge of Daisy Clinic to direct aspects of data collection (Parker et al., 2019). The researcher started with a seed or initial participant who gave multiple other recommendations. Each participant recommended coworkers to recruit for the study until saturation was reached (Parker et al., 2019). Saturation refers to the stage in data collection where information becomes repetitive, and more specifically in this case, the same names of people were being referred over and over (Guest et al., 2020). Eligibility to participate in the study included being employed by Daisy Clinic, being willing to participate in a recorded in-depth interview lasting 20-60 minutes on average, and being willing to provide archives and names of other staff who might be interested. To protect the confidentiality of the participants, the researcher assigned pseudonyms to them, which were generated by asking Chat GPT to give a random name for different alphabet letters.

Procedure

Yin (2003) cautions that case studies often need revisions during the study. Stake (1995) believes it is only possible to formulate the case study protocol as the researcher joins the site and begins data collection, building the plane while flying it. Informed by suggestions for gaining access to healthcare settings by Høyland et al. (2015), the researcher first set out to conduct an environmental scan and assess the existence of potential sites that met criteria that

would be feasible for the researcher to visit. The researcher cast a wide net and shared study aims with professional colleagues using an email summary and a request to pass the information on to those interested, which was done primarily by the researcher's MU email. Social media sites such as Facebook, Twitter, and LinkedIn were also used to try to make connections with relevant professionals or organizations. After networking led to an introduction to the school of medicine, the researcher was introduced to the person who would become the study's key informant. The researcher spoke with this person multiple times about the study aims and stayed in contact for several months while awaiting IRB approval. The critical informant invited the researcher to present the study aims for the behavioral health staff meeting. After obtaining MU IRB approval pending a letter of agreement, the researcher was invited to present the study aims to the key informant and the site's medical director. All IRB approvals were obtained from the local university involved with Daisy Clinic and MU IRB. The researcher obtained a letter of agreement and scheduled a first site visit with the key informant. On the first day of visiting the site, the key informant provided a tour of the building, explanations about the services and models of care, and archives related to the study topic. This person was also recruited as the first interviewee, and then recommended others to interview. Each study participant provided names and emails of their peers at Daisy Clinic to contact about the study. The researcher contacted each recommendation via MU email with the study summary and informed consent link. If the participant responded and completed the informed consent, the researcher sent the demographics survey link and scheduled the interview. At the end of the interview, the researcher asked for copies of the archives referenced and contacts for future interviews.

Interviews

Eight in-depth interviews lasting 60 minutes were conducted with recorded audio. Three of these took place in person on-site in the staff's private office space, and the remainder took place via Zoom, where the participants chose a location, and the researcher was in a private space using headphones. According to Padgett (2017), in-depth interviews should last at least an hour, but realistic considerations must be made for the specific population. In consideration of the staff's schedule in a busy healthcare clinic, interviews lasted a maximum of 60 minutes, and participants were prompted to communicate about any time parameters prior to the interview. The researcher was prudent in keeping track of time during the interviews and ending on time. The audio was only recorded to protect confidentiality further but also to ensure that no unneeded private information was captured accidentally, such as in the background of a video. The researcher developed a semi-structured interview protocol. Questions were informed by Vannoy et al. (2021), which began with five open-ended questions and later revised to seven after feedback from a colleague experienced in qualitative research. The seven-item interview protocol was piloted with a primary care physician for understanding and accuracy (Zimmerman-Clayton, 2022). The interview protocol underwent significant revisions following the pilot as additional items have been added to reflect aspects of the social context and team collaboration. Content experts and key informants refer to people who are indirectly part of the study, not as participants, but as people knowledgeable in geriatric mental health or in the specific practice setting (Yin, 2003). These materials were reviewed by three healthcare social workers, two of whom had experience with older adults. Yin (2017) and Stake (2003) suggested that case studies' designs often need to be revised after joining with the study site. Participants gave lengthy responses to all of the questions, and the researcher found that 60 minutes was not

enough time for nine semi-structured questions, so question 8 was eliminated because participants were already reflecting on the content of this question.

All interviews followed the basic outline of the interview protocol; however, in some cases, participants introduced new topics that the researcher did not anticipate. In these cases, the researcher attended to the participant and engaged with curiosity before returning to the remaining interview items. Aside from the specific items on the interview protocol, the researcher facilitated a space to treat all participants of the study with importance, empathy, and respect, which “almost always produces authenticity” and is critical for the trustworthiness of data (Padgett, 2017, p. 110). A collaborative approach was emphasized by using open-ended questions in a semi-structured interview protocol that allowed participants to pivot where needed (Kvale, 2015, as cited by Cresswell & Poth, 2018). The researcher also emphasized that each participant was an expert on the topic to ensure the quality of the content (Kvale, 2015, as cited by Cresswell & Poth, 2018). During the interview, the researcher read the interview protocol on the computer screen and used a blank piece of paper to write down phrases to clarify or return to in the interview.

Observations

The researcher conducted five separate on-site observations lasting one hour each. These took place in various locations on-site, according to what was recommended by the staff. The total time spent making on-site observations was five hours. The researcher made observations of two formal team meetings lasting one hour each, one hour long of informal lunchroom observations, one hour of waiting room observation, one hour of observations in the parking lot of the building, and observations made passing through the hallways on the way to meet with team members to conduct interviews. Acting as the observer and instrument in these

observations, this researcher kept objective information separate from subjective (Krathwohl & Smith, 2007; Yin, 2003). Notes were taken on a Word document on the researcher's laptop or handwritten, which were later typed. The researcher was also attentive to recording immediate impressions that were formulated following observations in memos (Padgett, 2017)

Archives

Seventy individual archives were collected from the study site. These were captured in four ways: as photographs taken on-site using the researcher's phone, hard copies provided to the researcher on paper, electronic documents and text emailed to the researcher, and screenshots from organizational websites and other publicly sourced documents referenced in the interviews. Documents photographed on-site during observations included photos of literature or flyers in the waiting room, front desk area, main entrance, and lunchroom of the clinic. Some paper copies of pamphlets, organizational policies, and workflows were collected as a paper copy. Two participants provided archives, and the remaining six did not, as they did not respond to emails requesting copies of archives. However, the researcher was able to obtain copies of all documents referenced in interviews except for one, a social determinants of health screening tool. Archives were supplied as paper copies on-site and as email text or attachments. All other archives were collected directly by the researcher on-site or online. All archives were saved electronically as either an image file or a Word document, depending on the type. These were then uploaded to NVivo and given a title that made it easy for the researcher to identify. The content of documents collected ranged from patient educational documents, staff procedural documents, and clinical scales to marketing materials posted on the website. Archives were collected from the introduction to the site through initial coding.

Data Recording and Storage

Padget (2017) cautions that the massive amounts of data collected in a qualitative study need to be well organized to keep it manageable. The researcher relied on software and document folders to ensure data was well-managed. Raw data was recorded directly using the Millersville University software OneDrive, Zoom, and Qualtrics, using the researcher's personal computer and the Daisy Clinic's Wi-Fi. MU software is protected through two-step authentication, encryption, and firewalls. Interviews included audio recordings and an initial automated transcription to the MU Zoom cloud and backed up to the MU OneDrive. Observations and memos were recorded directly to MU OneDrive on a Microsoft Word document and recorded by keeping descriptions separate from reflections (Cresswell & Poth, 2017). Any physical copies were destroyed after uploading to OneDrive.

Data was stored according to the guidelines of the National Research Council (2003). Data is protected with the use of secure software hosted by Millersville University, including walls, encryption, and two-step authorization. This includes the use of Zoom, Qualtrics, and MU OneDrive. NVivo software will also be used to analyze data and is not related to MU. Only one person will access the data, and the researcher's computer is protected with facial recognition. Raw data was stored separately from informed consent and analysis to further protect the identity of participants in a data breach.

Building Rapport

Rapport, or the relationship and connection established with participants of the study, was a critical element in not only gaining access to the site but also ensuring the trustworthiness of the data collected (Padget, 2017). Building rapport began first with connecting with the potential study site in June 2023 when the researcher discussed the desire to study primary care practice

and the importance of the study. Pre-existing professional connections made this possible. Building rapport with the site continued through the IRB approval process and the study duration from November 2023 to January 2024. After establishing rapport with the key informant, rapport was easily built with other Daisy Clinic staff. This included a tour of the building and some introductions to people on site. Building rapport was essential in brief contact with participants and, in some cases, without having met in person. The researcher relied on experience in healthcare and social work clinical skills to build quick rapport and establish a sense of trust during in-depth interviews. This was done through active listening skills, open expression of past experiences with healthcare systems, and acknowledging the importance of what people were saying during interviews (Padgett, 2017). Padgett (2017) suggests that researchers should be cautious about sharing their own personal information, but at times it is necessary. The researcher introduced herself as a candidate in the Doctor of Social Work Program with Millersville University, with experience as a licensed clinical social worker in healthcare, specifically with older adults. Providing this information offered a starting point to expedite rapport and allowed participants to focus on their perspective with minimal explanation of common medical terminology (Padgett, 2017).

Ethical Considerations

While conducting a site visit in a healthcare clinic and seeing many patients, the researcher was attentive to the importance of not impeding the staff's ability to do their work. This required flexibility and adaptability, which are the cornerstones of case study research (Yin, 2018). For example, the researcher scheduled an observation on-site but found out when they arrived that the meeting had been canceled. The researcher spent most of the time on site and made observations of common spaces.

The researcher made efforts to practice cultural humility and awareness of the specific field site and its physical location (Yin, 2018). The researcher did this by conducting independent research on the study site prior to the first site visit using publicly available information. Site with publicly available information to the extent able prior to beginning the study. The researcher presented as a visitor and guest in the study site to ensure minimal to no disruption to the setting (Cresswell & Poth, 2017). The researcher considered the way they dressed when entering the field, striving to appear more like the people in the setting than a business professional to avoid any bias and feelings of power differential (Padget, 2017).

Privacy and Confidentiality

The privacy and confidentiality of the study site and participants were maintained according to expectations for the protection of human subjects and under the guidance of the Millersville University Institutional Review Board (IRB) (National Research Council, 2003). The researcher has and will maintain the confidentiality of both the site and staff members' identities. Specific measures taken to protect identity included conducting all interviews in a private room with a door closed, recording only audio of the interviews, saving recordings by their date, and not providing any identifying information, changing any identifiers in the transcript, and cropping/editing out any identifying information from archives collected. Informed consent forms serve as the only place with the participants' identities, and these were never stored in the same place as raw data.

HIPAA and Patients

The Health Insurance Privacy and Portability Act protects the privacy and confidentiality of patients in healthcare settings (CDC, 2022). The researcher did encounter patients and patient information while on-site, such as in the waiting room or parking lot. No identifiable patient

information was collected for the study. Participants reflected on specific experiences they have had, which was the study's nature. Some patient information was encountered in staff conversations during on-site observations, but this was never identifiable to the researcher, and it was not collected. Staff conversations were observed for the overall content, process, and communication patterns only.

Technology

While the availability of technology makes it more feasible for the researcher to collect rich and thick data, the use of such also presents certain risks. Unfortunately, security breaches are possible, and data leakage can happen. The researcher made every effort to protect the data's security by utilizing safe technology practices involved with software encrypted and firewalled through Millersville University. This included Zoom, OneDrive, and Qualtrics accounts, where data was stored under two-step authentications. The original transcriptions of interviews were recorded directly on the MU OneDrive, and identifying information was removed during data cleaning. Transcripts were uploaded to NVivo for analysis only after identifying information was removed. This software is also password-protected and encrypted. The data will only be stored remotely on the MU systems as described and on NVivo software and not locally on the researcher's computer. Lastly, Qualtrics, through Millersville University's password-protected account, will be used to collect basic demographic data and to provide written informed consent to the participants. Links to both documents were sent to participants via their chosen email from the researcher's Millersville University email account.

Informed Consent

All participants reviewed informed consent of the study prior to participation, which outlined the pertinent details outlined below. Participants were told that participation was

voluntary and of their own free will to contribute to research. Informed consent documents detail the nature of this study as voluntary, the details about it, what participation will entail, and the risks and benefits of it. All participants were required to sign the informed consent to participate (National Research Council, 2003). The informed consent is provided in Appendix C.

Participants' Awareness of the Study Purpose. The researcher openly revealed the nature of this study and the research questions. There was no deception involved in this study. Participants were told this study was being conducted as a requirement of the researcher's dissertation for the Doctor of Social Work program with Millersville University. Lastly, the researcher offered to review the findings with the staff on-site at the end of the study.

Study Risks and Benefits. No compensation was offered for participating in this study, but there were some potential benefits associated with participation. The individual participants could have benefitted from positive feelings around the opportunity to contribute to research and tell their stories (Yin, 2003). The individual site and organization may also benefit from study findings if they are useful to organization processes and protocols. Lastly, the researcher offered to present findings to the study site at the end of the study as an incentive to host the researcher for the study. The researcher will offer to share the study results with the staff after the study has been completed. The potential risks of engaging in this study were psychological and informational. There was potential for individual participants to encounter distress from discussing the topic of suicide, and there was a risk involved in the use of the internet and data storage, as previously discussed. However, steps were taken to ensure secure technology use, and the risk is anticipated to be minimal even if difficult emotions do come up (Padgett, 2017). Mental health resources were compiled and attached to the informed consent document in case participants experienced emotional distress.

Data Analysis

The data analysis required flexibility and creativity (Yin, 2018). Both Stake (1995) and Merriam (1995) contend that data analysis should take place alongside data collection, using the analysis to guide the next steps. This section details the data analysis strategy for the current study as informed by Cresswell & Poth (2018), Hancock & Algozzine (2011), Padgett (2017), Stake (1995), Merriam (1998), and Yin (2018). Padgett (2018) remarks that a key component of case study analysis includes an in-depth view of the context but also of each of the individual parts while keeping “holistic integrity” (p. 156). Cresswell and Poth (2018) further defined that an embedded analysis includes the separation of the context and its parts as part of the analysis. Most relevant to this study is the fact that there were multiple forms of data reflecting on multiple systems touching Daisy Clinic. Thus, without fully understanding the context, individual pieces of data were a challenge to comprehend fully. This required zooming in and zooming out again. The researcher used the following strategies to begin the data analysis presented by Yin (2018):

- Data was organized electronically in folders as it was collected and then compiled with computer-assisted data analysis software NVivo.
- The researcher “played” (p. 167) with the data initially to search for emerging themes by using the NVivo word cloud and other visual representations to scan for emerging themes. This also involved organizing it in different ways, such as by system.
- The researcher organized the data by study propositions, theory, and findings of the literature, which led to overarching study themes.

The first step of formal data analysis began with data cleaning the transcriptions. This involved taking the automated transcription generated by Zoom and making corrections while

listening to the audio recording. The researcher conducted three rounds of data cleaning and transcribing to ensure the accuracy of the statements, to add punctuation that made it understandable when only being read and not heard, to remove identifiable information, and to remove unnecessary words. Unnecessary words or content were, for example, “you know,” “yeah,” “like,” “um,” and “uh” and clouded the content of the statements (Padgett, 2018). Some nonverbal communication was added in as a description, such as long pauses, sighs, or laughter. The content of the interviews was otherwise unaltered, using the original phrases and words chosen by the participants. The researcher’s first impressions were captured through memoing while cleaning the data so that initial meanings and experiences were not lost (Padgett, 2017). Transcriptions were created using a Word document that contained only the words of the interview, kept separately from memos, and organized by the minute/second that the statement was made in the recording.

Memoing

Memos were recorded throughout the study to capture thoughts and impressions in real time. This aided in capturing potential emerging themes, especially during the data cleaning, coding, and analysis. Memoing took place on the researcher’s computers and, when needed, in a notebook. According to Padgett, this is an important practice that can plant “seeds for later analysis” (Padgett, 2017, p.115).

Data Management

The researcher kept all data collected on the MU OneDrive, which was organized by data type: “Interviews,” “Archives,” “Observations,” and “Notes/Memos.” Once the data was uploaded to NVivo, the researcher created a title for each data file so that it could be quickly identified and recalled during the coding process. For example, archives collected on-site from

the waiting room were titled “Waiting Room Flyer 1.” Interviews were titled using a code the researcher understood so that it was easy to identify the context of each while coding.

Coding

All coding took place in NVivo. The researcher began with interviews first to go deep before going broad (Padgett). As coding continued, the researcher continued collecting archives as their understanding improved and new sources revealed themselves. Most archives were uploaded to NVivo as image files, and a few were uploaded as text, meaning they had to be coded by section of the image, not by text. This also means they were eliminated from any word frequency, or visualizations generated by NVivo. After interviews were coded, observations came second, followed by archives. The researcher employed open coding for broad themes that emerged and, in the process, developed definitions of each code’s criterion. The use of Bubbl was essential in this process to visualize and physically move around themes in a hierarchy. Multiple versions of this were created throughout the coding process and aided in the visualization of the overarching themes. Codes endured many revisions as new dots were connected and information realized. There were three rounds of data coding before the creation of larger themes and subthemes that could be organized in a conceptual model (Padgett, 2017).

Content Analysis

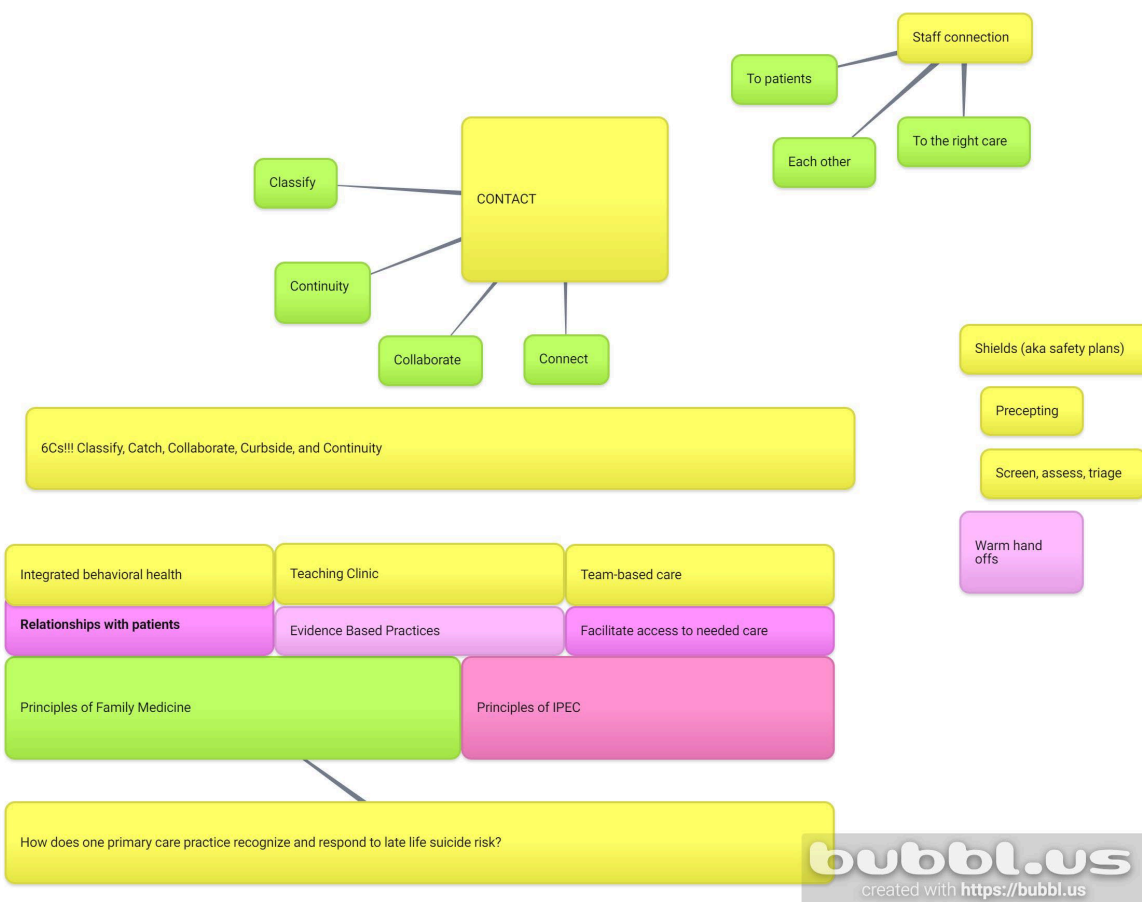
The data was reviewed for thematic analysis, a method that provides rich detail for a single case study (Cresswell & Poth, 2018). This was a long, dynamic process that involved looking at the data in multiple ways with many rounds of coding. The data was first open coded for emerging, then organized and visualized in different ways. There was a first round of emerging codes for emerging themes of only the interviews, which yielded 129 codes. Once archives were not being collected anymore, a second round of coding, which included all sources

As the overarching themes were not yet apparent, the researcher employed the use of visualization tools like NVivo word clouds, word frequencies, and Bubbl. A theme started to emerge relating to the importance of connection and successful patient care. Data was revisited with this realization in mind, and relationships emerged as an overarching theme, reducing codes to 77. The researcher visualized themes using the image of a brick-and-mortar building to understand the data better, with bricks at the bottom that were foundational to the system itself but were still different from what would be found inside the building (See image). Contact between people continued to emerge as relevant in multiple areas of the study: when the team worked well, when it did not work well, and when they worried about their patients. The researcher once again returned to relevant literature related to family medicine and interprofessional education and collaboration and was able to name what was emerging more clearly. This realization guided the understanding of foundational principles that emerged in the data, producing 16 main visual codes in Bubbl around these specific areas; the researcher once again reorganized the categories based on this understanding, where the codes went to 47. At this point in the analysis, the researcher was able to identify which data belonged to the site context and which spoke more directly to the research question, though all were interrelated and impossible to separate fully. Codes were reduced to 35 main codes. After collapsing more codes, the researcher went deeper into some of the overarching themes being identified and began to see there was a distinction in what was collected. This had to do with how they recognized and responded to late-life suicide risk, but it also related to what they saw as concerning factors in their older patients. This made it clearer that there were four distinct categories of data with 39 total codes. The four overarching themes of data collected were “Context,” “Contact,” “Crevice,”

and “Concerns.” Visualization provided in Figure 3.2 for how themes appeared in this phase of analysis.

Figure 3.2

Emerging overarching themes visualization created with Bubbl



Issues of Trustworthiness and Rigor

Rigor refers to strict precision and exactness (Merriam-Webster, 2023). In the context of qualitative research methods, there have been some varying characteristics of what constitutes rigor (Cypress, 2017). Cypress (2017) provides an in-depth overview of how, historically, qualitative methods have been critiqued for being less rigorous because they have been held to standards born of positivism and that differing paradigms and conceptual lenses that form research methodology indicate the need for unique and separate parameters in determining rigor.

In other words, standards that apply to the quest of knowing one true objective reality are less relevant to qualitative studies than other measures of rigor. Lincoln and Guba (1985) termed “trustworthiness” (p. 289) as a replacement for validity and reliability to inspect qualitative design. Adler (2022) points out that the researcher is the primary instrument in qualitative design, and therefore, transparency and trustworthiness are critical for a study to hold any relevance to the research community. Padget (2017) builds on this by summarizing the main threats to rigor and trustworthiness as reactivity and bias and offers ways to counteract their effects, where strategies may be relevant depending on the methods.

Reactivity refers to a tendency of people to act on their best behavior if they know they are being observed (Kratwohl & Smith, 2007). On the other hand, there is a risk of overly identifying with the study site participants if too much time is spent on site. This study was conducted over three months with multiple on-site observations. Prolonged engagement is a method to reduce the risk of participants withholding information from reactivity (Padget, 2017). However, the researcher was purposeful in making visits on site by scheduling visits in advance and only staying for 1-3 hours at a time per visit and remained until saturation was reached. The researcher became familiar enough to collect data and establish rapport, with the best and deepest understanding of the site taking place independently during analysis.

Triangulation was used to further combat both bias and reactivity (Padget, 2017). As a key characteristic of the case study method, this was done by collecting multiple forms of data, which were corroborated with content from the interviews (Miles, 2014). According to Padget (2017), congruence among multiple data sources creates confidence in the trustworthiness of data. The researcher also engaged in peer support with their dissertation committee and peers from the MU Doctor of Social Work program, who offered constructive feedback about data

collection codes and themes (Padget, 2017). Inter-rater coding is a process where different individuals participate in coding the same data to check for consistency and enhance the rigor of a qualitative study (O'Connor & Joffe, 2020). According to Campbell et al. (2013), 10-25% of the data set is acceptable for inter-rater reliability. One MU MSW student with qualitative analysis experience analyzed two interviews out of eight total (25%). Interviews were selected by asking the coder to select two random numbers between 1-8 and the researcher numbered them off in order of appearance in the list of interview files, where any identifying information was removed. The researcher emailed the alternate coder the study summary used in recruitment and the alternate coder reviewed the two interviews with open coding. The researcher facilitated a zoom call with the alternate coder after this and answered questions about context and staff roles. It was at this point that the alternate coder had questions about why the medical provider Gianna referenced telling other doctors how to practice so often. The researcher provided the important context of the site being a teaching clinic which gave the alternate coder an important understanding about why this person would be telling other doctors what to do so much. The researcher reviewed the open codes that the alternate coder assigned and noted areas where they might need more context and explanation about the site or staff role. After this, the researcher facilitated a second zoom call with the alternate coder to introduce them to the researcher's major themes and code book and provide more context about Daisy Clinic such as its team-based care, on-site counseling, and relationship to teaching. Following this conversation, the alternate coder used the researcher's codes to apply to their own previously formed codes. The alternate coder applied the researcher's themes consistently with the way the researcher had assigned them. For example, in one interview, a behavioral health clinician described how patients would not go to behavioral health services offered outside of the clinic, and that they needed a smooth

transfer between services, called a warm handoff. The alternate coder initially named this “rapport transfer” as part of referral for another type of care. After reviewing the researcher’s codebook, the alternate coder applied the theme connect, which is also how the researcher coded this content from the interview.

Researcher bias can also be decreased with an audit trail or thorough documentation of all actions taken throughout the study (Padget, 2016). The researcher kept all documentation of all steps in the data collection process: interviews scheduled, date and time of all interviews, all visits to the study site, emails related to the study, and memos of impressions throughout the data collection, coding, and analysis process including the initial codes formed by the alternate coder. Lastly, the researcher kept an audit trail of meetings with the dissertation chair and committee.

Evaluative Criteria

Transferability of the data was addressed by collecting data that would allow a rich and thick description of the study site (Padget, 2017). According to Padget (2017), a detailed description of the study context and participants should offer a vicarious experience such that its usefulness is apparent to those reading it. Yin (2003) suggests that collecting multiple forms of data for each research question is the best way to offer transferability. The researcher engaged in interviews but also on-site observations and collection of archives to depict the study site and has offered to return to the site to present findings at the study’s conclusion (Yin, 2003).

Credibility refers to the degree to which findings can be trusted as valid or true (Johnson et al., 2020). Padget (2017) remarks that rigorous study design and empowering participants as the experts of the topic are two instruments of credible findings. The researcher’s study has been approved by the MU IRB which was also reviewed by a secondary IRB linked with Daisy Clinic. All study participants were informed that they were the experts of their topics and reminded as

needed through the interviews. Johnson et al. (2020) suggests that interview protocols should be semi-structured to give participants an opening into unanticipated areas of the topic. The researcher read from an interview protocol but allowed the participants to lead the discussion. As suggested by Yin (2003) the researcher engaged with a key informant while designing the study and through data collection to inform specific terms and language and sources of data at the site. Study eligibility was designed to ensure credibility such that only staff at the site were participants. Lastly, the researcher engaged in a statement of reflexivity during the study design and continued to engage in reflective practice throughout data collection (Padget, 2017).

Dependability

Johnson et al. (2020) remark on the importance of the dependability of a study design, or the idea that if the study were repeated on the same site, it would produce similar findings. The researcher engaged in dependability enhancing measures like the development of an interview protocol prior to entering the site, documenting an audit trail, describing study procedures with as many specific details as possible, and memoing (Padget, 2017; Yin, 2003). These practices inform the comprehensive guide to conducting a similar study in the future (Watt, 2007).

Confirmability

This refers to the researcher's efforts to ensure that the intended subject is being captured in the study rather than just what the researcher assumes is the source of knowledge (Yin, 2003). Interview protocol included open-ended and semi-structured questions to allow participants to pivot to sub-topics related to the research question. Further, triangulation of multiple sources of data served to substantiate the collection of data. The researcher established quick rapport with participants and fostered a space of trust by using reflective and summarizing statements after participants spoke. Participants were also offered the opportunity to review the transcripts of

their interviews as a means of enhancing the trustworthiness of data, known as member checking, however none of the participants did (Padget, 2017). Lastly, a peer review of coding and analysis was completed to enhance confirmability (Padget, 2017).

A Statement of Reflexivity

According to Watt (2015), positionality refers to the knowledge that a specific person has on a subject, with attention to the fact that access to knowledge is not equal for everyone. Different people have different access to knowledge, and this is shaped further by personal experience. Reflexivity is a practice and a personal reflection of these aspects of myself as the researcher and the ways this has contributed to the study (Watt, 2015).

As a researcher, many factors influence the way I conduct myself as a professional and view the world. As a social worker with experience in healthcare, specifically with older adults, I engage with this topic with certain ideas of what I might find. I must acknowledge, too, my inability to immediately and clearly see all the systems of oppression that exist in systems like healthcare because of belonging to some privileged groups: I am a white female in a white female-dominated profession. I have health conditions, but I am privileged to have the kind that I can choose whom I disclose them to. Many patients in healthcare settings, especially in late life, do not have the luxury of informing only the people of their choice of their functional impairments or their age. I also acknowledge the necessity of stepping outside of myself in this quest of analyzing the data while noting I cannot fully exit my history. I am ever striving to take the stance that best reflects the voices of others and not one that is directional, with me at an elevated level looking down. I do realize that, at times, this will not be possible to overcome due to my ingrained and unchangeable history, the experiences of others, and the ways that I, or the groups I belong to, have contributed to systems of oppression. Though it is a challenge, it is a

worthy cause to which I remain committed in this study and beyond.

Summary

This study proposes the use of a qualitative case study to explore the phenomenon of how teams-based professionals recognize and respond to late-life suicide risk in primary care settings. Philosophical assumptions about how knowledge is obtained framed the formulation of the research method (Cresswell & Poth, 2017). Qualitative methods are indicated when there is not much known about the topic; the research question is one of how and why and points to a person's experience of a phenomenon (Padget, 2018). Furthermore, case studies are a method to use when exploring a phenomenon dependent on a specific context (Yin, 2018). The current study will explore this by collecting multiple forms of data and building a rich and thick description of the phenomenon. This will be done by conducting in-depth interviews, on-site observations, and collecting archives. In this study, the context of primary care, collaborative care partnership between staff, and individual perspectives make up the different units of analysis (Yin, 2018). This exploration is guided by questions about which tools, skills, and knowledge staff rely on to address this issue, how collaboration with others plays a role, and their perspectives on the issue of late-life suicide risk. The researcher has prepared a case study protocol with attention to the ethical considerations of both the participants and the organization where they will be hosted and patients they may encounter

CHAPTER FOUR: RESEARCH FINDINGS

This study explored how one primary care practice recognizes and responds to late life suicide risk. The existing body of research on primary care professionals is limited, and that which can be located at the time of this study isolated participants by discipline despite an emphasis on team-based care in the literature. Furthermore, it is unclear from prior research if risk factors outlined by Marson (2019) are recognized as warning signs for late life suicide by primary care professionals. A qualitative case study was conducted with one family medicine clinic in Pennsylvania that included five on-site observations, 70 archive collections, and in-depth interviews with eight staff. Data collection in qualitative case studies involves a large volume of data that point to both the research questions and the site context (Yin, 2017). To organize this volume of data and maintain participant privacy, the researcher created a chart of all data sources and the abbreviation used to refer to them throughout the paper. Demographic sources were also included as archives because their citation would reveal identifying information about the study site. Lastly, pseudonyms are used to represent participants, and the study site is referred to as Daisy Clinic, named by the researcher after the image in figure 4.6. Throughout the findings section, participants are referenced using their pseudonym and role, where their role has been obscured to protect privacy.

Findings are organized in two major sections: Context and Themes. In the data collection, information emerged that addressed both the research questions and basic information about Daisy Clinic's context. In case study design, context is a unique and important feature that needs to be included with findings, with the goal to describe the site in such a way that the reader feels like they can visualize being at the study site (Merriam, 1998). The extent to which the reader is given this in-depth understanding of what the site is like allows them to determine if findings are

relevant to their own research and understand the meaning behind the data (Miller et al., 2023). Lastly, the goal of a case study is not to demonstrate generalizability to the greater population but to offer readers an accurate representation of the case (Stake, 2005).

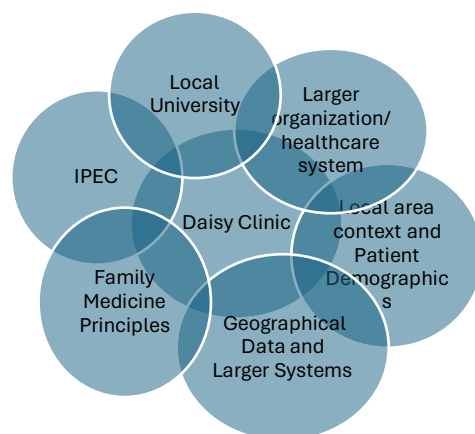
The second major section of this chapter summarizes themes. The researcher conducted data analysis of all three sources of data which yielded three overarching themes. Yin (2017) recommended presenting study findings by the research questions using specific examples from the data such as participants own words, archive descriptions, observation descriptions, and images (Yin, 2017). Staff had neutral to positive accounts of Daisy Clinic, as was reflected in the themes contact, concerns, and crevice. Contact has subthemes connect, classify, continuity, and collaborate. Concerns covered the topic of warning signs and risk factors for late life suicide risk and has subthemes of spectrum of concerns, burden of disease, and social context. In the final interviews of the study, themes emerged around practices and processes that were not working well, as is described in crevice. Crevice has the subthemes baby on the doorstep, busy, missed contact, and systemic issues. Case studies often yield a large volume of data which is paramount to conducting the study and presenting findings (Yin, 2017). For organization and clarity to the reader, data sources are summarized and described with an abbreviation used as a source citation through the rest of this paper. Additionally, Merriam (2016) suggested that charts and visualizations can be useful to include in the findings section to prevent the reader from being weighed down by the volume of data and understand a summary of the findings. Table 2 summarizes data collected by source, description, and abbreviation that will be used when it is referenced.

Table 4.2*Data collected by source, description, and abbreviation*

Data Name/Source	Description	Source Abbreviation
Interview Physician 1, "Arden"	60-minute interview with board certified medical doctor	ISA
Interview Behavioral health clinician (BHC) 1, "Barlow"	60-minute interview with behavioral health clinician who was either a licensed social worker or licensed practical counselor	ISB
Interview, BHC 2, "Charlotte"	60-minute interview with behavioral health clinician who was either a licensed social worker or licensed practical counselor	ISC
Interview BHC 3, "Daniel"	60-minute interview with behavioral health clinician who was either a licensed social worker or licensed practical counselor	ISD
Interview BHC 4, "Elena"	60-minute interview with behavioral health clinician who was either a licensed social worker or licensed practical counselor	ISE
Interview Care Coordinator, "Flora"	60-minute interview with a care coordinator with a bachelor's degree in social science related	ISF
Interview Physician 2 "Gianna"	60-minute interview with a board-certified psychiatrist	ISG
Interview Registered Nurse, "Harper"	60-minute interview with a registered nurse	ISH
Observation Notes	On-site Observation notes (Visits 1-5)	OS
Pamphlets Archive	On-site patient information pamphlet taken as hard copy	PA
Site Numbers Archive	Site statistics collected via email from staff person includes number of patients, staff, and disciplines	SNA
Website Archives	Refers to information found on the website for the health center clinic which includes 18 photos, screenshots, or passages of copied text. Website is hidden to protect identity of the clinic	WA
Beh Health Project Lunch room Archive	Student poster project of increasing access to behavioral healthcare from approximately 2019	LRA
Crisis Binder Archive	Crisis Binder, folder located on site detailing resources for a variety of urgent needs: Suicide risk flow chart, food banks, emergency shelter, hospital locations, adult, and child protective services contact	CBA
E-consultation in family medicine Archive	Description of evidence basis for using e-consults for psychiatry in family medicine teaching clinics, found publicly on organization website	EW
Waiting Room Archives	Photograph of signs and flyers in the waiting room of Daisy Clinic	WRA

Context of Daisy Clinic

Daisy Clinic is a setting that exists within a complex, multilayered system. The researcher found that data was difficult to interpret without a clearer understanding of the site context, which was achieved through creating multiple visualizations and mind maps on Bubbl, an online concept mapping tool. Once the context was more clearly understood, the researcher understood the data that informed the research questions. Specifically, the researcher used the image of a brick-and-mortar building and assigned layers to construct different aspects of the overall system that emerged in context related data. At the bottom of the building, the researcher wrote foundational principles like family medicine and IPEC. Additionally, context themes emerged around the site's immediate culture, environment, neighborhood, city, patient demographics, and other stakeholders impacting the functions of Daisy Clinic. This section was most heavily informed by the collection of archives, on-site observations, and some information collected from interview content (WA, OS, IS). Using the metaphor of a camera zoom lens, the context data provided the widest and farthest perspective which slowly moved in closer to the site participants, or Daisy Clinic staff. This section describes the site context, beginning with broad to specific, ending with a description of the study participants. Figure 4.1 is a visual of systems that impact Daisy Clinic context.

Figure 4.1*Daisy Clinic contexts visualization****Context: Geographical Data and Larger Systems***

Daisy Clinic interacts with outside organizations like Grassroots organizations, universities, hospital systems, specialists, healthcare insurance, the greater healthcare organization that it belongs to, and professional organizations that are adjacent to family medicine and IPEC (WA, IS). Daisy Clinic is under the umbrella of a much larger nonprofit healthcare system that encompasses hospitals, specialists, and many other medical practices (WA).

Located in an urban setting of Pennsylvania (PA) in the United States, this area's geographic composition has a unique concentration of urban industrial complexes and natural greenery (WA). According to Census Bureau (2021), data this city has a population of 302,905 with an average of 5,470 people per square mile. By race, the area is 64% White, 19% Black, 6% Asian, 4% Hispanic, and 2% identifying as more than one race. The immediate region's poverty rate is 19% of the population and 13% of the older adult population is living in

poverty. Most people in the region's population have at least a high school degree at 93.9% and 50.4% have a bachelor's degree or more (U.S. Census Bureau, 2021).

Daisy Clinic's city history is one significant aspect of the site's context and its older adult patients (WA, IS). Historically, the steel manufacturing industry was an essential component of the region's wealth and resources until around 1970, when its collapse led to a prolonged period of unemployment and poverty (WA). The area saw a comeback with the diversification of industry, most notably healthcare and technology (WA). This part of the city has seen dramatic growth in a relatively short period of time and explains why the region holds modern features built into or around original structures dating back to when the town was founded (WA). For example, the specific setting takes place in a humble lot situated by a well-known pharmacy chain, gas station, and fast-food restaurant while the neighboring buildings consist of upscale hotels and condos towering above (OS). It is in a residential area where the businesses are heavily concentrated as moderately expensive shopping and dining and is also a registered historic district founded in 1812 (WA). Daisy Clinic also exists in the same part of town where the original family medicine residency was established in 1970 by a local philanthropist (WA). While this site has been a family medicine teaching clinic since its establishment, the immediate area has endured enormous change, which older residents have lived through and can recall (WA, IS).

Context: Types of Care and Patient Demographics

Daisy Clinic is one of three family health centers of the same model that are run by the same larger organization, whose mission is to improve patient health and communities through training highly skilled physicians in comprehensive patient-centered care (WA). The site serves approximately 3,700 patients total, up to about 10,500 visits annually (NA, WA). Respondents

identified that the practice sees clients of all ages from infancy through late life, or as one participant said, “birth to death” (ISH). Patient age breakdown is as follows: adults 67 %, older adults 15%, and pediatric patients 18% (WA). The racial composition of patients served is primarily white at 57% and Black at 37% (WA). The clinic is surrounded by neighborhoods designated as medically underserved areas and populations as is depicted on the map in figure 4.2, generated by Health Services and Resources Administration (HRSA, 2024; WA). Medically underserved areas and populations refer to geographic locations that HRSA has designated as having a shortage of access to primary care services (HRSA, 2023). In the image below, Daisy Clinic is inside the larger black circle. Yellow areas indicate HRSA designated medically underserved areas and blue indicates medically underserved populations.

Figure 4.2

*HRSA Medically underserved designations near Daisy Clinic**



**Daisy clinic is located inside the larger black outlined circle. Yellow and blue areas represent medically underserved designated areas and populations. The smaller black circle has no meaning and could not be removed from the HRSA generated map.*

About 50% of the patients served in these family health centers are Medicare or Medicaid-funded (WA). Services are provided with teams of family medicine residents, attendings, pharmacists, behavioral health clinicians, social workers, behavioral health clinicians,

psychiatrists, nurses, dietitians, and care coordinators (WA, NA). Staff provide a range of medical care to all ages (ISH). The scope of care that is provided at the clinic covers a broad range of services which include team-based family medicine, specifically women's health, procedures, medication-assisted therapy (MAT), medication management for chronic illness, LGBTQ+ care, comprehensive behavioral health, osteopathic manipulation medicine, hepatitis C treatment program, radiology, and on-site ultrasound (WA, OS, AS).

Context: Inside the Clinic

This section introduces the site itself beginning with a photo of the clinic in Figure 4.3, collected as an archive, which was obscured for privacy. The teaching clinic, or residency is described before ending with an entry from the researcher's on-site observations.

Figure 4.3

Daisy Clinic photograph website archive, date, and time of photo unknown (WA)



The following is an excerpt from the researcher's observation notes during the first on-site visit to Daisy Clinic.

My first visit to Daisy Clinic was midafternoon on a cold November day. This trip required traversing roads at the center of a busy intersection leading to one of the only bridges in the immediate area connecting several major highways. Two things stand out

the most in the immediate area of the clinic: concrete and cars. Outside the clinic, there is a standard black pavement parking lot with worn-out white parking space lines. Trash blows in the breeze, and two large planters are outside the stout concrete building. Entrance to the site is through two sets of glass, automatic sliding doors that say, "No walk-ins permitted." The cold wind brings notes of fried food from across the street where a line of cars are waiting in the drive through. The clinic is sitting so far back into the parking lot that I might not have even seen it had I not been looking for it. Cars fly past on two sides of the lot where the clinic is located. There is nothing quiet about this location. One round of automatic glass sliding doors into the vestibule, a second round into the waiting room and you're inside the building. From there, there's two windows on the left where staff sit to check in patients. Straight ahead is a single door that goes into the clinic area. This is where staff pop out periodically and call a name from the waiting room to be seen. This is the only sounds in the waiting room aside from a TV playing in the corner that has the News on, and some murmurs of the front desk staff through the glass. The floor is made of shiny wooden panels and ceiling is a white paneled drop ceiling tiles, and long blocks of fluorescent lights. One wall of the waiting room is entirely dedicated to photographs of the providers that work on site. The other walls have various patient information like patient rights, information about vaccines and communicable disease. There are small containers of pamphlets on various surfaces that offer information about different resources. One wall has a box of free books, free clothes, and information about the food pantry hosted on site. Lines of chairs fill the space in the middle where I am sharing the space with only one other person. In front of me there are toys for kids to play with on a small kids sized table. Once behind the waiting room, there is a long square hallway that leads to the exam rooms and nurse's station. Toward the center of the building there is a precepting room which holds one long table in the center and floor to ceiling length cabinets filling one entire wall. Computers line the other walls. Inside these cabinets are laptops for residents to use on site, different patient education items and models, and a small supply of medication for patients who need it. Just outside the door there's some more small offices, a meeting sized room adjacent to it, and a locker room for the residents. Lastly, there's a break room with tables and chairs on wheels. A TV plays a game show in the upper corner of the room. There are two refrigerators and a counter with a sink and a microwave. Tables make the shape of a rectangle missing one side with chairs on the outside of it. One lone table on the side of the room has some snacks strategically placed suggesting they are communal. There are two doors leading into this room, each on a different side. It was fairly quiet in this room despite there being a handful of staff eating at the time. No matter which room you're in, you can always catch a whiff of rubbing alcohol and vague medical supply scents.

Table 4.2 contains a count of all the different types of staff at Daisy Clinic. However, this does not include other roles like administrative staff, scheduling, housekeeping, and other roles not encountered in this study.

Table 4.3*Daisy Clinic staff composition (NA)**

Role	# employed on site	# staff included in present study
Family Medicine Residents	14	0
Family Medicine/Psych Dual Residents	1	0
Fellows and Attending Physicians	7	2
Pharmacist	1	0
Pharmacy Resident	1	0
Nurse Manager	1	0
Behavioral Health Clinicians	4	4
Registered Nurses	5	1
Medical Assistants	2	0
TOTAL	36	7**

**Information provided by a study participant*

***Study also included one care coordinator who was not included in the total employee reported by study participant and does not fit into any of the noted categories in this table*

Context: Learning Environment

A vital component of Daisy Clinic's mission and culture is the family medicine residency, which trains residents, or a medical school graduate who is receiving supervised hands-on practicum (ISB, WA). All eight participants in the present study referenced the residency or interactions with residents. Website archives described Daisy Clinic's family medicine residency as one with a dedication to "outstanding patient care and graduate medical education," which influenced staff to "constantly strive to improve our work as clinicians and teachers" (WA). Daisy Clinic is not only the central hub for the organization's family medicine residency but is also one of the largest of its kind in the state (WA). The program recruits new residents each year to participate in hands-on medical practice for family medicine, dual family medicine and psychiatry, and pharmacy specialties (WA). The researcher's impressions of the presence and importance of the residency were observed in space and volume. There are more

archives on the website dedicated to the residency than to the actual medical clinic, multiple videos interviewing staff to share their experiences with the residency, and one of the largest rooms at Daisy Clinic is the precepting room (WA, OS).

Curriculum is described in detail on the website accompanied by resources for residents who just moved to the area. Residents have the option to participate in concentrations like sports medicine, geriatric medicine, international health, academic leadership, obstetrics and women's health, behavioral health, hospitalist medicine, addiction medicine, lifestyle medicine, and point of care ultrasound. Behavioral health clinician, Barlow, reflected positively on being involved with a teaching clinic, "we're surrounded by really fantastic learners from all over the country that are recruited to come here and spend three to four years here getting their training. So the whole system is kind of focused on education and learning." Behavioral health clinicians, Charlotte and Daniel discussed more specifically what it was like for them to work with residents. Charlotte said, "it depends on the resident. Our newer residents, obviously there are a lot more conversations of education on, you know, 'Here's what we can do. Here's what we can't do.'" Daniel reflected on his observation that the learning curve could be a challenge for residents because, "the doctors are learning their trade and so they can get pretty busy and overwhelmed with trying to do their stuff."

While the residency took center stage in the clinic's learning environment, the importance of social work education was also discussed. One point of evidence being the site's willingness to participate in the present study conducting social work research. In addition, the lunchroom at Daisy Clinic featured a large poster on the wall that contained a social work student project launched to follow up with patients who had been recommended behavioral health but had not followed up with it. Barlow reflected on his experiences working with social

workers and reported with enthusiasm that the clinic has had positive experiences hiring social workers starting out in the field “and training them,” which he described as “a really nice fit” for both the social workers and Daisy Clinic.

Context: Study Participants

Eight interviews were conducted in the Fall of 2023 and Spring of 2024 out of 14 people contacted for recruitment. Three interviews were conducted in staff’s private offices on-site at Daisy Clinic, and the remaining five were conducted via Zoom where staff chose the location. Each interview was 60 minutes in length. Most individuals who did not participate were either not referred by a colleague or did not respond to the recruitment emails.

However, two people responded to give a reason for their decision not to participate. One person declined citing a full schedule, and one declined because they did not believe their experience was relevant to the topic. All staff who chose to participate were provided with a link for the basic demographic survey pertaining to professional backgrounds as summarized in the table below. The demographic survey was completed by five out of eight participants.

Table 4.4*Study Participant Profiles*

Pseudonym	Education**	Role**	Years worked in healthcare	Years worked at Daisy Clinic	Other Experience Reported
Arden	Board Certified Medical Doctor	Medical Provider (MD)	5-9 years	5-9 years	Medication Education
Barlow*	Masters	Behavioral Health Clinician (BHC)	18 years	10 or more years	Older Adults
Charlotte	Masters	Behavioral Health Clinician (BHC)	1-4 years	5-9 years	Inpatient Hospital
Daniel*	Masters	Behavioral Health Clinician (BHC)	----	10 or more years	Community Mental Health
Elena	Masters	Behavioral Health Clinician (BHC)	1-4 years	1-4 years	Hospital OBGYN care
Flora	Bachelors	Care Coordinator (CC)	1-4 years	Less than 1 year	----
Gianna	Board Certified Medical Doctor	Medical Provider (MD)	20 or more	20 or more	Child/adolescents and community mental health
Harper*	---	Registered Nurse (RN)	---	---	Hospital

**Participant did not complete demographics survey and this information was provided by interview content or information on the organization website.*

***More specific job titles and education have been obscured in this chart and throughout the paper to protect participant privacy*

Context: Working at Daisy Clinic: Staff Descriptions

Participants described what it is like to work at Daisy Clinic by reflecting on their specific roles. Except for medical providers who may take on-call hours outside of clinic hours, the staff reported that they worked during the hours the clinic was open from 8:30 AM-5:00 PM, Monday, Wednesday, Friday, and Noon-8:30 PM, Tuesday and Thursday (IS, WA). However,

this study only captured the perspective of seven different roles out of the ten different positions employed at Daisy Clinic (SNA) so there may be other variations. The present study did not include any residents, pharmacists, managers, medical assistants, or other staff involved with housekeeping, medical supplies, technology, and maintenance.

Behavioral Health Clinicians (BHC). The Behavioral health clinicians (BHC), Barlow, Charlotte, Daniel, and Elena described their roles with some similarities. They all described team-based or collaborative relationships with other staff on site, working with certain special populations, and taking general behavioral health referrals from medical providers. These descriptions included managing a broad spectrum of case management, traditional counseling, and crisis intervention. Daniel explained that traditional counseling in his role consisted of hour-long counseling appointments with about 6-7 patients every day. However, Elena described seeing about 5-6 patients per day. Clinicians noted that while they primarily offered counseling, their role also involved resource coordination or case management described by Daniel as, “help with insurance, medication, housing, I mean, really the gamut. Food insecurity, and anything and everything.”

Barlow explained that his role involved many needs to respond to with varying degrees of urgency. Some tasks that were more urgent or crisis-related, were prioritized over other tasks, which required the behavioral health care team to collaborate around who and how more urgent needs would be met. Barlow described urgent situations as, “lethality, postpartum depression, homeless or food crisis.” In these cases, the team would “move things around,” to make sure the patient’s needs were met.

Behavioral health clinicians also named specific skills they used to address the spectrum of patient needs. These included motivational interviewing, crisis intervention, and cognitive

behavioral therapy (ISB, ISC, ISD, ISE). Three out of four BHCs talked about their roles as both meaningful and challenging. Barlow explained, “It’s a lot of work, though. I mean it’s.. seeing patients every day is a grind.” Similarly, Charlotte expressed that,

..you have moments where it's challenging. And you have moments where it's rewarding...you have the days and the moments where you're like, ‘Yes, this is exactly what I wanted to do with my career, ‘I’m helping people, it's great.’ And then you have days where you are like, ‘Why, why did I choose this path? This is exhausting. I'm tired. I'm burned out.’

Elena described her role as,

...exciting as well as challenging...for all the same reasons that it's wonderful, and yeah, thrilling because of the flexibility, It's also hard for all those same reasons and there are some very real barriers that we hit here when it comes to accessing care.

Medical Staff. The medical staff are grouped together because their roles were centered around direct patient medical care. Medical Providers, Gianna, Arden, and Registered Nurse, Harper discussed aspects of their roles which involved clinic visits with patients, patient consultation on the phone, or consultation with other staff. Patient care tasks discussed included screening patients for different medical and behavioral health concerns, making appropriate referrals, and instructing residents. The content of the conversation with them centered more around medical diagnoses, assessment, and triage compared to the behavioral health clinicians. Some differences noted between their roles were how much time they spent face-to-face with patients versus remotely providing care and consultation. For example, medical provider, Arden described face to face time with patients and tasks related to leading medical decisions with the team. He also described his role as being involved with Daisy Clinic policy, process, and best practice. Arden, gave a small laugh when asked what his role was like, and stated, “gets interesting... Every day is a new day, and there's always new problems. But overall, it's been a

good experience, I think.” Medical provider, Gianna had worked at Daisy Clinic the longest of anyone in the study and had originally done more direct patient care before shifting to doing strictly remote consultation with other staff. She reflected on her role and the ways it has changed over time,

I've just been doing consultations with the primary care docs, and also support for the behavioral health team. So I've been involved in that way. But it's not the way it was for the first, maybe 10 years or so.

Registered Nurse, Harper, the only nurse in the study, described her role as busy with many issues to resolve in one day which varied in degree of severity and urgency. Her role involved face to face patient care and consultation by phone. She explained that she encountered mild issues like having “a cold” to medical emergencies, like suicidal ideation. She explained that she works on resolving as many patient concerns independently as possible and consulted with team members when she could not manage them on her own. Harper noted the volume of patients she would interact with daily, “This is kind of like one issue after the next. Just rolls into the next issue.”

Care Coordinator. Care Coordinator, Flora explained that her role centered areas of patient care improvements, improving patient access to care and preventative services. Although her assistance was open to any Daisy Clinic patient, she explained that most referrals came from physicians. She described fielding a variety of phone calls each day and coordinating different supportive services for patients,

If they need to schedule follow-up appointments after their primary care visit, if they need help in arranging transportation or figuring out other barriers to care I kind of help liaison that and try to help them get the care that they need.

Findings

Four major themes Concern, Contact and Crevice were identified. Crevice is considered the opposite of contact. Contact holds the subthemes of Classify, Connect, Continuity, and Collaborate. Crevice is the only major theme that does not feed directly to one of the research questions and was an unexpected finding. As is consistent with aspects of systems theory, the themes are distinct but interrelated with other themes (Bertalanffy,1972). Since this clinic functions with a teams-based care and an integrative behavioral health model, it is difficult to isolate roles and responsibilities in conversations with the staff. (See chart below.) An explanation of how the themes were developed and named follows this section which describes the themes and what they mean. Each individual theme will be explored in depth paired with the related research question.

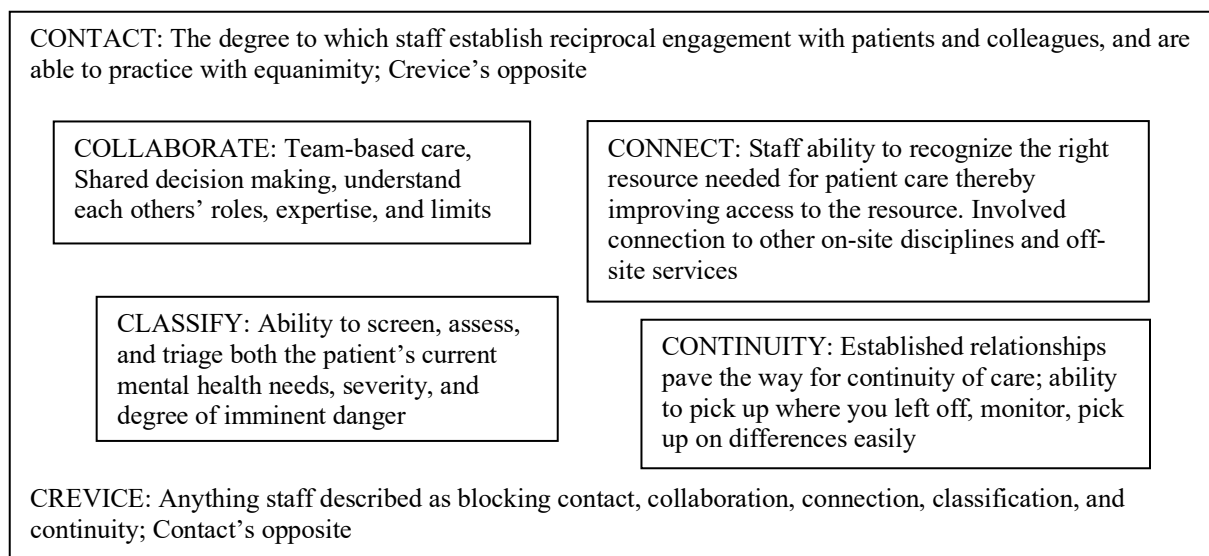
Table 5.4

Research questions and themes summary

Research Question and Corresponding (THEME: Subthemes)
1. What are site professionals' impressions of the presence and importance of social context risk factors framed by Marson (2019) when working with older adult patients? (CONCERN: Spectrum, Burden of Disease, Social Structures)
2. What role does team collaboration have in decision-making on how and when to screen older adults for suicide risk and how to care for those who have a positive screen? (CONTACT, COLLABORATION)
3. What knowledge, skills, and tools are employed by professionals, including those that are tangible and invisible? (CONTACT: Connect, Classify, Continuity)
Does not align with a research question, is the opposite of Contact (CREVICE: Baby on the doorstep, cold fumbles, busy, systemic issues)

Table 4.6

Major Themes and sub-themes informing questions 2 and 3



Research Question: What knowledge, skills, and tools are employed by professionals, including those that are tangible and invisible?

This research question refers to the ways that participants described specific screening tools and skills to screen and assess suicide risk or risk factors of suicide, and the immediate first step taken when they had determined the level of urgency. Lastly, clinicians reflected on skills they used but did not necessarily name them. This was originally described in an interview with Behavioral health clinician, Barlow where “engagement” and “steadiness” were described as two important skills. This description allowed the researcher to note this in other interviews, later named as “engagement” which was Barlow’s original term, and “equanimity,” which is how the researcher named it. Contact is an overarching theme with subthemes of classify, connect, continuity, and collaborate. However, collaborate, which does not feed into this specific research question will be discussed in the following section.

but reflected on the ability to speak with male clients in a way that resulted in them sharing personal and emotional content. However, Arden later commented that even his best attempts fell flat with some patients, especially older adults,

Sometimes they just don't want to engage with you and don't even wanna talk about their mental health...I get a lot more dismissive things like, 'Oh, I just bear with it,' And then some kind of like cynical, sarcastic comment, and like a chuckle. And then they kind of just wanna move on so I think that it's hard to know more in some sense.

Arden's comment depicts the value of this engagement in the relationship with patients where he notes that a lack of contact means getting less information about the patient's condition or struggles. Care Coordinator, Flora was the first to depict the way contact is provides a means to build a relationship with patients. She described one of the most important skills as,

"communication, being able to effectively communicate with patients. And when I say that, being able to have a relationship with your patients, so...warm.. that trust between the two of you, so that they're comfortable enough in being like, 'Okay, maybe I do need to get help.'

Similar to Arden's comment, she noted a lack of connection could impact the extent to which she could help a patient, "those conversations don't happen if that level of trust, isn't there. So I think that's important in terms of specific skills."

One aspect of contact, relationship building,' was aptly described by behavioral health clinician, Elena who said, "the beauty of primary care is that people get to build relationships with their doctors. And so what that means, that continuity is everything." She later restated this and applied it directly to late life suicide prevention,

It all comes back down to relationship building. If an Older adult feels trusted and seen by their doctor.. people are going to be safer, and people are going to be healthier..

Behavioral health clinician, Barlow reflected on the power of contact being the basis for one of the suicide prevention models they use at Daisy Clinic. He explained that the Brief Intervention and Contact (BIC) Model is about frequent contact as an intervention for suicide risk. He reflected on how critical it is for suicide prevention that patients are made to feel comfortable speaking with professionals reflecting on something he read during the COVID-19 pandemic,

students were telling that they were suicidal. I thought, 'that's fantastic. Yes, tell somebody, this is good. We want you to talk about it. If you talk about it, you're probably not going to do it. You're gonna get some support and let that out.' So the BIC model what it does is regular frequent contact with people and then, hopefully, what I've seen happen is when you have frequent contact, people also will reach out when they are in in a crisis. They'll reach back if they know that there's kind of that open communication open line with you.

Equanimity is the second half of Contact, which Barlow described as, ..staying steady in this and not over responding. What we don't want to happen is any time someone mentions anything in this vein that we just say, 'hospital. I'm done. Go to the hospital' right? So we have to at least stay steady and say, 'Okay, tell me more about it,' you know, cause it might not be that.

Daniel also described equanimity when reflecting on how suicide can create fearfulness for professionals,

“ I think as therapists and as caring people our urge is to try to stop them from harming themselves...I try to approach it from, 'I better have a good understanding of how they got to this point versus trying to stop them from getting to a different point.' Cause my understanding of how they got to this point is gonna help me help them make the choice not to get to suicide.”

Elena reflected on the importance of equanimity in ongoing monitoring of suicide risk too, and giving the patient permission to be truthful about suicidal ideation,

We talk about [suicide] every session, and we talk about it at that first appointment. For me, I make it very transparent that it's something I want to talk about, something that's important for us to talk about, something I know can be uncomfortable to talk about, but we normalize it, and no one has ever said, 'I don't want to talk about it.' Everyone has always said something, 'I want to talk about that. We're talking about it.' and so we do.

Contact Sub-theme: Classify

Participants described the use of formal screening tools, assessment practices, and clinical skills that they relied on to screen for mental health concerns, overall health, and suicide risk. Participants described the process of determining the problem's scope and urgency, which informed the first step taken. Staff whose position involved screening for suicide or suicide risk factors provided more information on the use of screening and required skills. All participants noted the use of screening tools in some way. Two behavioral health clinicians mentioned that open conversations were an important follow up to screening tools. Care coordinator, Flora, who was involved with referring patients to behavioral health did not implement screening tools, but knew what was practiced in Daisy Clinic. Behavioral health clinician, Barlow reflected that family medicine operates as the first contact for many patient needs and acted as somewhat of a guide to the rest of the healthcare system,

We try our best to be in in almost everything that could help. We see ourselves as the primary safety net for these people, right? That's how we're gonna catch things like suicidality in in terms of the healthcare network.

A total eight formal assessment tools were mentioned that contributed to uncovering possible suicide risk factors. It was noted that this is the standard practice for all patients and not just older adults, which are summarized below in table 4.5. The PHQ-9 was mentioned most frequently.

Table 4.7

Summary of screening tools and descriptions according to participants and archives

Screening Tool Name	Brief Description
Alcohol Use Disorders Identifications Test (AUDIT)	Tool to screen for symptoms of alcohol use disorder diagnostic criteria
Disabilities of the Arm, Shoulder, and Hand (DASH)	Assess symptoms and ability to complete tasks associated with use of upper extremities
Generalized Anxiety Disorder (GAD7)	Tool to screen for symptoms of generalized anxiety disorder diagnostic criteria
Patient Health Questionnaire (PHQ-9)	Tool to screen for the presence of depressive symptoms
Mental Status Examination	General observations of patient presentation and affect, and assessment of memory, cognition, and attention
Suicide Assessment and Five Step Evaluation and Triage (SAFE-T);	Screens for risk factors and severity of suicide risk, assessing for immediate danger
Social Determinants of Health (SODH)*	Screening tool to assess the social determinants of health or social needs that impact health (O’Gurek & Henke, 2018).

**Archive not provided. This description comes from ISE and resource cited but may differ from what is used at Daisy Clinic.*

Staff also reported the frequency at which they screened for suicide risk at Daisy Clinic. Table 4.6 summarizes this data collected as part of the demographics survey. The researcher learned through interviews that medical providers conducted initial suicide risk screening for patients, and repeated follow up screening was often completed by behavioral health clinicians. Most of the responses in the demographic survey were that suicide risk screening is conducted by multiple roles, consistent with interview findings. However, the frequency of conducting the screenings was unclear. Some responses indicated it is universal, with one person reported it is done just through case finding, which means screening for suicide risk only if there were other concerns such as a high PHQ-9 score.

Table 4.8*Suicide Risk Screening Practices Reported on Demographics Survey*

Pseudonym	Role**	How often does your practice screen patients for suicide risk?	Who is responsible for completing a suicide risk assessment in your practice setting?
Arden	Medical Doctor (MD)	Most/Often- Universal screening	Provider (MD, CRNP, PA)
Barlow*	Behavioral Health Clinician (BHC)	Most/Often- Universal screening	----
Charlotte	Behavioral Health Clinician (BHC)	Case finding- screen with those suspected of suicide risk	This task is shared by multiple roles
Daniel*	Behavioral Health Clinician (BHC)	----	----
Elena	Behavioral Health Clinician (BHC)	Most/Often- Universal screening	This task is shared by multiple roles
Flora	Clinical Coordinator (CC)	I'm not sure	----
Gianna	Medical Doctor (MD)	Most/Often- Universal screening	This task is shared by multiple roles Write in: Tablet screeners
Harper*	Registered Nurse (RN)	---	----

**Participant did not complete the demographics survey and information was gathered from interview data*

Another aspect of Classify was the emphasis on triage, or determining which patients needed to be prioritized based on most urgent medical needs. Participants described the range of urgency as being a person who was not actively suicidal but needed follow up with behavioral health, to most urgent which was someone who was actively suicidal and high risk according to their assessment. Suicide risk was described as assessed with the SAFE-T assessment, which stands for the Suicide Assessment Five Step Evaluation and Triage. This offers specific prompts and factors to consider when determining the level of risk of a patient's suicidality. Participants explained that most urgent situations were handled first, with actively suicidal patients being

referred for a hospital stay either voluntarily or involuntarily. Participants discussed employing a safety plan with patients, where they would review protective factors, which behavioral health clinician, Barlow described as “protective barriers” between a person’s emotional distress and self-harm. He described that this could be anything that added more time because suicide is often an impulsive act. Harper described “good triaging of the current situation” as one of the most important skills needed. She explained this was needed to “[assess] the patient where they are at this moment, assess the risk.” Medical provider, Gianna, remarked that incorporating screening into patient visits was important for suicide prevention, “they have to ask the question...it doesn't have to be every visit again. It kind of depends on what the visit is for but they have to ask the question, how's your mood doing?”

However, participants also described specific skills needed outside of formal screening tools. Both medical providers, Gianna, and Arden, remarked on the importance of starting broad when inquiring about mood or mental health and then working their way to more specific questions about suicide risk. Arden described, “peel back the layers of the onion” while Gianna similarly called this a “funnel,” described as,

“The questions going from more open-ended questions. Tell me more about it, and not only how often have you thought of, but what have you thought of? And then trying to get to...What have they thought of? Have they been considering any options? Have they taken any steps? What did they feel in terms of their intention at this point in time? Have they made attempts in the past?”

Both behavioral health clinicians, Daniel and Elena reflected on the value of having open-ended conversation with their patients about suicide risk rather than the use of a screener alone. They both suggested that they found such conversations to have valuable information.

Elena said,

I always say this when I’m doing PHQs with people that I think the questions on the PHQ9 are really vague. I don’t think they’re helpful. I have a lot of people say ‘Yeah, I feel this way all the time. What does that mean?’ And it's a helpful screener at the starting

point. But if it's the only screener that people are getting... I know we're not getting full pictures of how people are actually feeling.”

Similarly, Daniel remarked that he likes to have “more of a conversation about specific things that someone may or may not share,” versus just the items of a scale.

Contact Sub-theme: Connect

Participants described modes of connecting patients to the right type of care for their needs, acting as a navigator and a guide for how to get there, and in doing so, improving their access to care. The researcher visualized a bridge for this code, imagining that the staff directed patients on how to get to the bridge, and supported them in crossing it too. Connect was depicted as the step that came after classify, but it was also described on its own too. Staff used the words “Access,” “barriers to care,” and “levels of care” when they discussed this theme. Levels of care ranged from referring patients to another discipline on-site like counseling, social work case management, or a more specialized level of care outside the clinic such as emergency medical care, or other mental health treatment like intensive outpatient (IOP). Another aspect of connect was how staff described improving access to care when they directed patients because the services available are only as good as patients’ ability to get to them. Staff described their knowledge of resources and ability to direct patients as a mode of improving their access, or connecting them to what they need.

Connect first emerged with staff mentioning warm handoffs between medical staff and behavioral health clinicians. A warm handoff is the act of introducing a patient to one of the other staff members to initiate specific support from another discipline. This was either described by saying the words “warm handoff” or the act was described. The researcher first noticed that most of the participants mentioned warm handoff before understanding its meaning in the bigger

context of connecting patients to the right resource at the right time. Table 4.9 summarizes the way warm handoffs were discussed by participants.

Table 4.9

Participant descriptions of warm handoff

Participant	Description of Warm Handoff
Registered Nurse, Harper	“The patient is here with the doctor for a visit, and there's a concern. They will go and get one of those social workers and ask them to come right away and talk to the person if they are available. Just to kind of reach out to do that warm handoff just to kind of get started with behavioral health services for them.”
Behavioral Health Clinician, Barlow	...there's this rapport transfer between the doctor and the therapist, where the doctor says, “Hey, meet this therapist, I work with him. He's my partner. Good Guy, you'll like him.”
Care Coordinator, Flora	..since we have social workers in the clinic and behavioral health specialists, if something of that nature does come up, for example, I'm talking to a patient, and it seems like, they seem like they could use some extra assistance or counseling, my role is usually to connect them to social work.
Behavioral Health Clinician, Elena	it has been weeks since I've been called in for a warm hand off .
Behavioral health clinician, Charlotte	if I'm in the office.. [providers] come to me. If I'm not in the office. Then they'll go to whoever's on site and kind of pull them in to help support [the patient].
Behavioral health clinician, Daniel	The other thing that we try to do here is what we call ' warm handoffs .'. If a doctor has a patient that they want me to try to meet while they're still here at their doctor's appointment. I can go right into the appointment, and I can introduce myself and just get to know them. Just briefly. It's not intended to be like a counseling appointment. It's more just like an introduction to sort of see if they would be interested in counseling.

Warm handoffs are made possible by multiple disciplines working in the same space.

While Medical provider, Arden did not directly talk about warm handoffs, he reflected on the value of having other disciplines on sight to connect with, allowing providers to focus on medical problems, “I think it's so important we have counselors in our office. And there are also social workers. And oftentimes it's just so complicated that we need both help getting resources from the community.”

Staff also presented their knowledge of healthcare systems as an asset for patients.

Behavioral health clinician, Barlow mentioned this when describing the clinic's focus of "taking care of patients and providing access." Barlow explained this allowed patients to,

.understand how we work and what we do, and us understanding how they treat behavioral health conditions and what they're expecting and what they're willing to take on in our practice, and what we would need to refer to a more higher level of care for what you would consider like a more severe, persistent mental illness"

Behavioral health clinician, Daniel also reflected on older adults as being a group of people that seemed to especially benefit from increased access to other community resources because of involvement with the clinic,

I think the 65 and older, I do get a decent amount of social work stuff like resources. Maybe it's Medicare questions or helping them get set up with Medicare or and that medication. I do get some of that housing sometimes for seniors like if they want to get into the Senior High rise or something like that.

In some cases, patients need specialized psychiatric care, and Daisy Clinic provides some of this. This is important to mention as medical provider, Gianna and Registered Nurse, Harper explained that psychiatry referrals outside of the clinic have years-long waitlists. In fact, Daisy Clinic implemented a psychiatry e-consult to stretch their resources to more patients. Gianna described this as an assessment that residents and attendings completed which was reviewed by the psychiatrist remotely within five business days, a method that streamlined access for patients.

Staff described that they tried to offer as much as they could on-site to make the clinic itself a point of access too. Behavioral health clinician, Barlow explained that access was important to consider in the context of "the population you serve." He explained,

You have a population that has a car, they have private insurance, they can drive around, they can get whatever they want. When you start having a lot of barriers to care (social determinants of health), the inequity of the system kind of starts to weigh down on folks, it's really hard to get access...that's also the group that has the most burden of disease, the

most trauma, the most incidence of social determinants of health and barriers and inequities. So, their disease is gonna present in a different way than it does in the general population that has little more access to help.

Behavioral health clinician, Elena commented on patients having increased access through the Medication Assisted Treatment (MAT) program that Daisy Clinic offered on site. She mentioned the ability to offer “bridge prescription” or medications prescribed for substance use disorders to support recovery, and contrasted this with other models, which will typically discharge patients from the program if they miss several appointments,

I feel really grateful that counseling is not required, but it is available. But providers are able to provide bridge prescriptions that there's no real end date to if you miss X number of appointments that you're discharged from the program. But it's really trying to explore what harm reduction can look like in an outpatient clinic.

Elena further explained issues of access that faced their patient population,

When people miss appointments, there's always a reason behind it. Sometimes it's something as basic as the access van didn't come. Sometimes it's because your depression's really flaring up. Sometimes it's this or that, or something else. I think something that feels really important to me from the education that we can provide as [behavioral health clinicians] is just through reminding people through our language that people aren't no-shows. they just couldn't make it to an appointment. Let's figure out what got in the way, and especially with our older adults, where there are just so many more barriers to actually getting here.

Elena also described their clinic as a connector to the greater healthcare system when it was warranted. She explained that when one patient was connected to the hospital system, “it was a primary care doctor here who has become her anchor, and the person who's communicating with the specialist person is checking in with her after [Emergency Department] ED.” Registered nurse Harper also described the clinic's ability to assist patients with navigating services outside the clinic,

...if the patient comes in and expresses some issues, make sure they get established with...we can provide counseling services here with the social workers. Or if they are, need a little bit higher level of care, we can refer them out.”

Contact Sub-theme: Continuity

Daisy Clinic Staff described the tool of continuity which came from working in a family medicine environment. The theme of continuity was named by the researcher after observing the different ways staff described having long-term relationships with patients and ongoing follow up. As stated by registered nurse, Harper, patients could be seen at the practice “from birth to death.” The longevity of the relationship means there is long-term follow-up and monitoring in the family medicine setting. While family medicine may not always directly provide the services that patients receive, there is potential for the clinic to be involved with patient’s care for years, meaning staff must assess needs continuously and adjust as new ones arise.

Behavioral health clinician, Barlow, explained the implementation of the BIC model which suggests “frequent contact as a means to help with suicidal ideation.” Use of this model involved weekly check-ins for people who have had “a suicide attempt or they have suicidal ideation.” Barlow explained that this established an ongoing, reciprocal engagement with the patient around monitoring suicidal ideation. This model works in a setting with continuity, like family medicine, because of the ongoing involvement. Barlow explained that one interaction with a person is not enough to pinpoint what they need, but instead they need to “get more data points.” He explained that continuity and follow-up are ways to get more data about a patient and develop a “trend line,”

If we talk to them more often. Are you safe to go home today? Can we talk tomorrow? ‘Yeah, I’ll talk to you tomorrow’ that’s safe to have a safety plan in place. And then you develop more data points, and you get the idea: Is this person getting better? Are they getting worse? Is this normal for them? Some people walk around with suicidal thoughts all the time. We’re not going to change that that’s not. That shouldn’t be the goal of our intervention to eradicate thoughts.

Medical provider, Gianna also made mention of data points, and continuity as a tool for noticing patient changes, or what she refers to as “change of baseline,”

That would be one of the flags...if the patient's not taking their medications regularly and mostly had before. So anything. That's a kind of a change of baseline, because then it makes you wonder what else is going on. Is there a lot of stress? Is there new developments? Psychosocially like the person is no longer able to get to the pharmacy, and hasn't figured out how to, get the. But if it looks like there's been an interval change. I appreciate. The advantage of primary care, which is good is, if somebody has come before and is and keep keeps coming back. You can have you have this continuity that people, and sometimes that you'll be the medical assistants will say ‘this, doesn't you know it's just not looking good.’

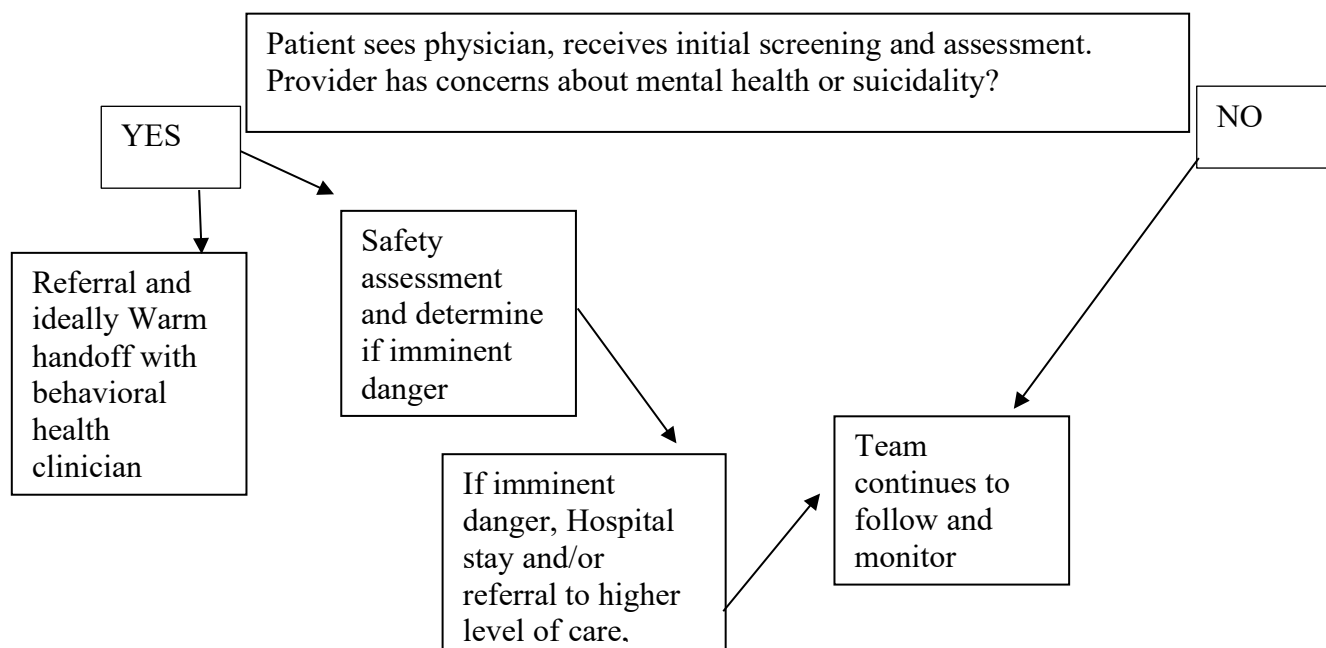
Daniel also explained the benefit of continuity as being able see changes in trends for patients with the PHQ9,

Usually, the doctor again will follow up as well. And so again they might do another PHQ-9. It's really just trying to, you know, coordinate. Say ‘okay, we wanna keep track.’ So, we, if someone wants to do the PHQ9, have to have some documentation of what's going on. So, it might be me. It might be the doctor. Because again, there's a good chance there's gonna be follow up with the doctor as well as me.

Behavioral health clinician, Elena discussed the value of the relationship built with patients in care and continuity, “It's the first line. It's relationship building. It's the people who are in community with you, and it's the person who you go to first for most concerns and the questions, then your triaged.” The theme of connect provided insight into the workflow or process that Daisy Clinic implements, which was corroborated with archival policy data (AS). Figure 4.4 provides a summary.

Figure 4.5

Flowchart of mental health and suicide risk screening process



Research Question: What role does team collaboration have in decision-making on how and when to screen older adults for suicide risk and how to care for those who may be at risk?

Another subtheme of Contact that staff discussed was collaborate. Within collaborate, team members reflected on the care model at Daisy Clinic as being team-based care that used integrative behavioral health.

Contact Sub-theme: Collaborate

Collaboration is an overarching theme that emerged around the ways staff worked together in the shared goal of quality patient care. Collaboration is a theme named for the different ways that team members worked together, sought each other's advice, and recognized each other's expertise. Whether this involved starting the day with a "huddle" (ISD) or practicing

“shared decision making,” (ISE) for the purposes of patient care, collaboration was infused in the major functions of the site. This involved not just collaboration between staff but engaging the patient as a team member, too. Daisy Clinic also formally operates under a teams-based care model which includes integrative behavioral health, both of which rely on collaboration (WA). Care coordinator, Flora described this working environment, “my experience working here has been super great and everyone has been very helpful and open.”

Team -Based Care

Observations, interviews, and archives all referenced team-based care. At its most basic level, this points to the presence of multiple disciplines under the same organization working to “engage and empower patients within collaborative multidisciplinary teams” and practice “evidence-based interprofessional team care” (WA). Evidence of team-based care was also referred to by participants saying the words “shared decision-making” (IS). Evidence of team-based care was also found in observations of team meetings (OS). Photographs on the website frequently feature groups of people doing something together: a photo of the team meeting in the precepting room, residents gathering for a vaccination event for their community (WA).

The aspect of team-based care is described in a recruitment video for the residency program which states,

We provide diverse, comprehensive behavioral health and addiction medicine learning experiences to advance medical knowledge, inform patient care, develop interpersonal communication skills, and encourage collaborative care. Our residents and fellows are immersed in inter-professional team models of care, working alongside social workers, psychiatrists, and pharmacists. Our graduates possess skills needed to implement and work effectively in team-based programs in future clinical settings.

Behavioral health clinician, Elena explained, “this whole clinic model is based on integration of

all of our helps, including our behavioral and mental health. And I think it is front and center.”

She later continued,

“It is the opportunity to just be with people where they are to really practice self-determination and shared decision making and, I feel really grateful that we have a team of providers around that, that are curious to learn more and to ask sharper questions and to be flexible with what life presents the people”

Behavioral health clinician, Daniel described actual practices on site that facilitated collaboration, from their electronic documentation system, Epic, to touch points throughout the workday,

[Daisy Clinic is] built around being a team and collaborating. We have huddles at the beginning of the day just sort of touch base...So we start off the day sort of team oriented. And then, we interact throughout the day and try to show my face. We use Epic which we can message other team members pretty easily. And then the afternoon session, we start off with another huddle again. So, we really do try to make it team oriented so that everyone is talking and collaborating, and it seems to work pretty well.

Medical provider, Arden’s perspective as a physician also focused on the medical value of team-based care for medical complexity, and for older adults especially,

With so much disease burden the team aspect really shines there. If you're stuck figuring out the numbers for insulin. You're just probably never going to get to the mental health component of things.

Arden, behavioral health clinician, Charlotte and registered nurse, Harper commented on how valuable it is to have team-based care with patients who are medically complex or are high risk for behavioral health. Arden said,

I think the pharmacists really help as well, because they help manage some of the chronic disease, we have pharmacists in house which is something more unique. I mean, other clinics have them, but it's not super common, and they do medical management visits with a lot of these older adults with a lot of disease burden and there is a lot of mental health in that. But like there’s just more access points. They can help offload some of the more medical stuff like titrating their insulin and things like that. That we can focus on other aspects like their mental health. I think that's huge. So, it it in both

directions, like the social work counselors, mental health, behavioral health team. They really help take share some of that mental health component. And then the pharmacists and support staff take some of that logistical and medical work away so that we can also focus on the mental health thing. So, we're kind of in the middle. I feel like we're able to deliver much better care for mental health because of help from both those directions.

Similarly, Charlotte commented on this from her perspective of working with medical complexity and behavioral health issues,

The doctors usually ask them just generally how things are going... And if the patients indicate any concerns about like feeling depressed or feeling really down you know, the doctors depending on the severity of the statement, they'll either come and get me if it's like a high concern that they think the patient should be kind of assessed more formally right then and there for safety. They'll come and get me, and I'll go in and talk to the patient if it's more of just kind of like a 'hey, probably should follow up with them. Maybe check in with a phone call.' They'll send the chart to either myself or [my coworker]. Whoever sees the patient and just kind of with like a 'Hey, can you check in with them? They said this today...They're struggling. Things are sad.

Harper explained that when complex behavioral health issues arise,

I don't have to wait or wait for responses to talk to. I mean, I can get up from my office and go in and talk to one of the social workers and say, 'Hey, I have this person that reached out to me and really concerned,' and then they can start right away the outreach attempts and get them scheduled and see what their needs are...I like our, I think we work really well as a team. And I think that really helps in issues like this, where everybody jumps on to kind of help out with that.

Behavioral health clinician, Barlow discussed individual characteristics that staff needed to have to function in team-based care. This involved being “interruptible” and “able to be pulled out and meeting a patient.” Barlow explained this would not work in other mental health models where, “everything’s really structured...There's no room for that collaboration. So, this is more open.” Barlow also commented on the importance of collaboration in high-risk situations like active suicidality or crisis,

You never handle these types of situations in a vacuum. You always pull in the attending, the preceptor, the manager, the social worker. You always get a couple of people

involved to hear what's happening. You don't make these decisions in a vacuum. You always say, 'Hey, I'm worried about this person. Seems like a high-risk thing. What should we do about it? Are we sending the police to somebody's house, or we sending them to the hospital? I need you to be in the room with this patient while I go and talk to my supervisor.'

Harper also described what team-based care would look like in a crisis, noting the benefit that, "you don't have to take on the burden of making that decision on your own." She said,

It's shared decision making, too. It's. 'Should we? Okay, we reach this person.' We talk to them now. 2 days later we call to check on them. We can't get a hold of them, like, you know. 'Should we call for a wellness check? Do we go that far? Do we call [911] and have them go out?' So that's a lot of like you end up talking it through with your team just to kind of come up with the best plan of action at that point.

Other elements of team-based care had to do with staff having knowledge of and respect for each other's expertise. Charlotte explained times that she had been "providing support to staff" around her expertise of working with high-risk behavioral health patients with frequent crisis,

"...I think they [other staff] struggle a lot with how to support these patients, because these patients present often in crisis, they're very misunderstood... These patients are very high risk. If they miss their medication, they could go into withdrawal. If they take their medication improperly they could. very severe things could happen... with our alcohol, use patients, the medication we give them, if they accidentally take an opiate, it could put them in precipitated withdrawal which could lead to death... I think that there's a higher risk for our staff, and so it leads to them being a little bit more panicked, and then that panic comes to us when they're not sure how to handle it. So, with [Daisy Clinic] specifically, there does tend to be kind of a high, a slightly higher stress component of trying to manage staff's expectations and emotions around the needs of the patients and helping them differentiate between what's an actual patient crisis versus when our patients are not actually in crisis. As opposed, especially differentiating with our regular behavioral health patients who call because they do present differently when they're in crisis."

Charlotte also described the importance of understanding each other's roles and respecting other discipline's expertise when providers asked for her advice,

...they're acknowledging that I'm the one who has the answers here which to me says a lot, because I think that a lot of people don't view [behavioral health clinicians] as experts, necessarily. And so, it's always very refreshing to be like, right? I am the expert here. I do have a wealth of knowledge. Yes, you should be asking me if this is something

possible. And I do. I think it also shows that they respect our time, and they respect if we're able to do something and they're not gonna make us kind of chase our tails. And I think it also shows that they respect our patients because they're not making empty promises to our patients that we're going to be able to do something for them.”

Integrated Behavioral Health (IBH)

Staff talked about Daisy Clinic’s integrated behavioral health program (IBH), available to any established medical patients. Behavioral health clinician Daniel explained that anyone being seen for counseling must also be established with a medical provider there. In other words, the site does not operate as a community mental health resource, seeing patients for mental health needs in isolation of medical needs. Behavioral health clinician, Barlow talked about how and why the IBH program launched,

In 2012, when we were successful in obtaining some grant money from several different philanthropic organizations in [CITY]. We got some seed money to start a behavioral health team...It was my job to help transition the team to doing more clinical work, still doing some case management, but taking on more clinical counseling and psychotherapy type of interventions that we could offer on-site so that started out with kind of a bare bone structure... So, starting out, we were doing very little counseling. Just like case management and helping people get their medicine and things like that. And that's valuable work, too. And we started offering, doing, screening for depression and anxiety and suicidality and substance use, and then started to add this on-site behavioral health interventions, short term that we could offer to the patients that were connected with their physicians.

Barlow further explained why Daisy Clinic chose to have an IBH program that was under the same organization and roof,

The traditional model is like different offices. Right? You just collaborate and you refer to offices to each other, and co-located, you're in the same building, and then integrated, you share the same office space, the same record, you're hired by the same company. All that type of stuff our organization had tried the co-located model for years where they brought a therapist in from another organization. It just didn't gel as much, didn't work. It didn't share the same medical record. There was like double documentation. You had two different masters. So that was difficult.

Barlow also explained why this model was best for access of care for their specific population of patients, reduced healthcare fragmentation, and suggested that on-site counseling provided this service to people who otherwise might not be able to go,

When you start having a lot of barriers to care (social determinants of health), the inequity of the system kind of starts to weigh down on folks, it's really hard to get access. So, bringing in... That's also the group that has the most burden of disease. The most trauma, the most incidence of, you know, social determinants of health and barriers and inequities. So, their disease is gonna present in a different way than it does in the general population that has little more access to help. So, what was happening? 'Hey, go to this other place?' People just wouldn't go. We weren't making any progress. We weren't getting any action with that. Partly because it's just so hard to do. And you have to go and meet somebody at a different place, and then the collaboration between the providers, there's no incentive for that. Everything is very siloed.

Medical provider, Gianna remarked that there was frequent contact between staff about behavioral health care needs, where consultations and discussions were a consistent part of their routine at Daisy Clinic,

It's every week, half an hour... It's about once a month, where we have an hour... It's during when a time where we can capture more people. And so, anybody you know who's seeing patients in our Residency program can say, 'I have this case.' And again, there's usually myself, and oftentimes it's [other staff] will be on there, it's actually nice because then there's more discussion...it gets us the opportunity to really get more detail and more in depth in terms of what that was going on with the interview on the mental status.

Staff also explained how this model worked in practice, and described a broad range of needs that patients sought help with. Behavioral health clinician, Daniel said,

If they want to see a therapist they can do that, but they have to see the doctor first 'cause the referral has to come from the doctor side of things...But we're letting people know: we know your mental health and your physical health, are connected so to see that also that mental health is connected right off the bat, I think, is really nice as well. So, I say, yeah, that this is a team approach. So, your doctor's gonna be talking about your mental health, I'm gonna be talking about your mental health. I talk about your physical health. They're gonna talk about your physical health so hopefully, just getting patients in that mindset...

Behavioral health clinician, Elena explained that in addition to behavioral health patients, the clinic also offered counseling for patients who are diagnosed with substance use disorder, including those who were being treated with Medication Assisted Treatments (MAT) at the clinic,

You have to be established with our clinic as PCP [primary care provider]. And then, if we identify that you have opiate use disorder or alcohol use disorder, and you're interested in medication treatment to help with recovery and help overcome that, then we will get engaged, as the MAT team.

Barlow and Daniel drew comparisons to traditional models of community mental health, which they described as separate physical locations and organizations from medical providers, offering counseling only. Information access was one major point of benefit where team members could easily find updates on their patients. Barlow explained,

Every time I write my note, I route it and click it in with the doctor, and they see it. And every time we're like, "Hey, how's it going with your therapist? How's it going with your doctor?" so there's an increased engagement from the patient standpoint"

Daniel compared team-based care to the more "isolating" work of being a community mental health therapist, where there are commonly not medical staff to work with,

You only get the information of that appointment, but what the patient gave you then. And so, I think working in sort of this collaboration is, you have more eyes. You have more information, and you have more perspectives

He applied this directly to recognition and response of late life suicide risk,

I think you just have more. You just have more of everything. When we're talking about suicide and elderly, I think that's just beneficial, you just have access to way more things and so I think that that's how the team approach does I think, help this specific population with this specific problem.

Crevice

The researcher had been hearing a lot of the same information that aligned with the theme of contact and its sub-themes until the seventh interview. At this point in the study, the researcher heard a new perspective being shared that seemed to reflect lack of contact, and as a result, missing opportunities that were linked with contact. The researcher named this theme crevice to indicate a lack of contact, and indicates fragmentation, or a gap, where two sides are not touching. It indicates that the process, role, or function of Daisy Clinic did not happen in an ideal way, which meant that connect, classify, continuity, or collaboration could not happen. After hearing this theme in the seventh interview, the researcher began to recognize similarities in other interviews that had happened previously. The issue was presented with the intensity of a drippy faucet. The researcher saw signs of an issue, but the scope of this study cannot detect the extent to which this issue reaches, in the same way, a leaky faucet can be a sign of a bigger issue with the pipes, or just mean a leaky faucet. The dripping seems to happen at the individual level with staff, and the overall burst might be somewhere else in the healthcare system, which is not detected by this study.

Medical provider, Arden was the first interview to suggest that active suicidality should be seen as a crack in the healthcare system,

We're focusing a lot of resources by the time they have a plan. And you know, really wish it [suicide]. It's like things have gone really far.

Registered nurse, Harper indicated that healthcare professionals set the tone and expectation of having conversations about suicidal ideation, "Probably you know, they're not talking about it, we're not talking about it, and nobody's talking about it. And you know, should we be bringing this up a little bit more?"

Baby on the Doorstep

The researcher envisioned a baby being dropped off on a doorstep with this next sub-theme. Harper and behavioral health clinician, Barlow both commented on some circumstances when patients expressed suicidal ideation through means that were not intended to receive urgent matters, and they could be waiting hours or more for follow-up. This happened when patients left voicemails, electronic messages or spoke with front desk staff who were not trained to respond to suicidal ideation. The idea is that patients in their vulnerable state reach out somewhere to someone, but it might not be the place that would get them the fastest and most direct response. Harper and Barlow expressed concern around patients expressing suicidal ideation through channels that were not direct contact with a staff person. Barlow recounted the use of the electronic messaging system, which only fields responses during business hours and may not yield a response for days. Additionally, he mentioned that patients had reached out to front desk staff to express suicidal ideation, but staff were not trained to discuss this. Harper described her experience of getting a voicemail indicating suicidal ideation,

We have a pretty high call volume, too. So, a lot of times, I'll be on the phone and then I have to catch up on messages, so I'll get to one of those messages and kind of have a little bit of a panic, because they called an hour ago, actively, you know, suicidal or harmful ideation. So, it's a panic of yeah, 'how we can we get to these patients?'

Arden and Harper, and Behavioral health clinicians, Elena, and Charlotte, discussed feeling like there was room for more late-life mental health and suicidality in educational or training settings. Harper said,

I definitely feel like it's probably something that maybe isn't addressed or isn't talked about a lot. You know, I feel like we have a lot of people. But again, I think that goes back to the fact that maybe they're not sharing their struggles with us until it's really too late. I have not had any personal experience with a older adult, you know, late life, suicide, attempt...so I haven't had any direct experience with it... But you know, in nursing school you have a very small chunk. That is your mental health. It's. might only

be a few weeks. Yeah, 6 weeks, something like that, you know. Just 1 one course, and then, you know, you're supposed to just be off into the world and ready to go.

Elena believed that some staff had misunderstandings about late life,

This misconception, that depression is a normal part of aging. So, if you see somebody who's 78 in the office and has lower affect. There's still an assumption. Well, that's part of aging, and I vehemently disagree with that. I don't think that has to be aging at all. I think aging can be beautiful, joyful.

Arden talked about wanting to highlight suicidality more specifically,

I think separating or highlighting suicidality from the rest of mental health is important in terms of screening, like just focusing on that by itself is important. and also, just we need to do it more in older adults. Cause, I don't think we get that much training or exposure to it, and I imagine it's way more common than I'm experiencing. But I just don't hear about it, and I don't see it in my patients thankfully.

Missed Contact

Staff discussed various scenarios when “Contact” with patients or each other was blocked in some way. What they discussed was errors in the system that kept successful contact from happening the way it should so that the other sub-themes could happen too. Participants indicated that if they lost patients at contact, they may not get another chance to operate within the other tools and resources available to them at Daisy Clinic (collaboration, continuity, classification).

Medical provider, Arden and Care Coordinator, Flora reflected on barriers to engagement with patients. Arden talked about times when he did not think engagement was reciprocated from patients,

I also think it's just hard to talk about that with some of these older adults, maybe as a generational thing. But sometimes they just don't want to engage with you and don't even wanna talk about their mental health. Or, you know I get. I think I get a lot more dismissive things like, ‘Oh, I just bear with it,’ And then some kind of like cynical, sarcastic comment, and like a chuckle. And then they kind of just wanna move on

Flora reflected on the issue that patients could not always engage with staff directly, so they relied on a personal relationship to do this on their behalf. She noticed that there seemed to be more problems or concerns to work through when people did not have someone like this in their life, or “especially if they're living by themselves... I think they have more difficulty in keeping up with when to request and how to request [medications].”

Another element of missed contact was discussed when staff reflected on workloads and the busy nature of patient care. In these discussions, busier schedules were associated with being able to do less for patients or coworkers. Medical providers, Gianna, and Arden described how much ground there was to cover in appointments with medically complex patients, and mental health might become an afterthought depending on the visit. Gianna said,

If they have 10 things on their medical list, they might not all. If they have blood pressure, they're not always gonna see the blood pressure, but they might address the lipid issue. If they have diabetes, they might not always address the diabetes issue. If somebody comes in for us, you know other things. So, they're not gonna even the primary care who knows them isn't necessarily gonna address everything all the time.

Arden indicated that when patients had more going on medically, their appointments were longer, whereas healthier individuals had more time to talk about things like mental health,

I feel like I have so much more information about suicidality and younger patients. and I just don't. I don't get to discuss that with the older adults. And some of that is disease burden, too. They all. A lot of the older adults are just, they're so sick, and you just don't have time.

Behavioral health clinician, Daniel talked about how having an overly busy schedule could be a barrier to collaboration with coworkers, too,

And sometimes it, it can happen here where it feels like that. We get stuck in our schedules again, like my schedules pretty busy. The doctor's schedules pretty busy. And so sometimes it can feel like we're just co-located. So again, we have these little anchors

that try to connect us and do things. I don't know how other practices that do integrated care solve that problem.

Gianna indicated that being overly busy might contribute to less completion of screening tools.

When asked to clarify which screening tool, she said,

It's the whole thing, the alcohol, and the drug, and the even the PHQ-9 or the GAD-7. It's not...It needs to be improved...But that doesn't happen consistently. So that's part of the teamwork, and all of that is not anybody's fault. It's just a process thing. That oftentimes is not prioritized because so much else is happening

Behavioral health clinician, Charlotte also talked about the screening tools process resulting in some missed contact between team members and patient follow up,

We used to do forms like physical forms and then those papers would get brought to us, and then we would go through them. We switched to digital, and since then we've been missing...We feel like we've been missing some because there's been like a breakdown in the process of like those forms. They don't get sent to us unless the doctor sends us the chart and like catches it right away

Cold Fumbles

This theme is named to be the opposite of “warm handoff,” as discussed in the theme of “Connect.” The meaning behind this theme is that there is missed contact that could result in patients being connected to less resources.

Elena talked about noticing a trend that she was “very rarely” contacted for warm handoffs when she was in the clinic,

I only have 3 patients today... and it has been weeks since I've been called in for a warm hand off...I have a hard time believing that 66 [patients] people today. there's not one person who would benefit from at least just half meeting a, face to face with [behavioral health]?

Elena also remarked that she believed this could be due to people having a perception that she was not available to do warm handoffs because it was known in the clinic that people had busy schedules. However, she also commented on the clinic’s opposing goals of

appointment retention and being available and flexible, noting that if your schedule was booked all day, “we don't have the opportunity to provide that same day support.”

Daniel (BHC) introduced the idea that patients share different things or indicate a willingness to seek recommended treatment or services when they are speaking with different members of the team,

“We still see a lot of people where they'll have a talk with the doctor, and the doctor will recommend therapy. And the patient will say, ‘Yeah, I'm really interested.’ And then they never schedule. And then we [BHC] try to reach out. And they say, ‘Oh, I'm not interested,’...I'm gonna do what the doctor says, Tell the doctor you know what they wanna hear because they may be like an authority figure or. But then they might not be interested. Now again, I think that's over across the board something you see.

Likewise, Daniel reflected on the dangers of failing to practice equanimity with patients in a crisis, and how this could make a difference in the outcome,

“I think there's unfortunately a lot of therapists that jump to conclusions pretty quickly. But they might not understand what someone is actually saying or thinking, and I think that that is actually more dangerous sometimes. You know, especially, I think if I'm thinking about the elderly patients that I've talked to, you know. I think you know again a lot you know, do feel isolated, especially the suicidal ones. And so, my thought is, if I can, you know...Keep them talking versus, if I jump to conclusions that's wrong, I might not talk to them again.”

Participants reflected on many things that could impact care from the staff continuity standpoint. In some cases, this reflected lack of staff, but others just reflected on staff changes. Gianna (MD) discussed the difficulty of picking up where another professional started with a patient,

. and then this happens in our clinics because it's a resident clinic. So sometimes they might see their main doctor a good portion of the time, but then something comes up and the main Doctor is out of town or on a different rotation, and so they have to see another doctor who doesn't know them. And so that then.. it's hard. As I mentioned, the mental status is never particularly beautifully documented in anybody's note, so it would be hard to kind of get a sense from a clue, a new doctor coming in to say, ‘this person just looks off their game.’

Charlotte (BHC) and Elena (BHC) both remarked that Daisy Clinic lacked a provider that specialized in MAT needs of patients. From their perspective, they felt this placed more responsibility on behavioral health clinicians. Charlotte said,

We don't have like...a dedicated provider. So, the other sites we have a dedicated provider who is their sole role is with the MAT clinic, and that's like, they manage the MAT Clinic...they're the only provider that does the MAT clinic. At [Daisy Clinic] we don't have that. So, we have the providers rotate. So [Daisy Clinic] comes with a little bit more challenges where there's a little bit more that. I don't wanna say it's not pressure pressure is not the right word, but I can't think of the right word. There's a little bit more ownership, I think, that goes on to my coworker and I... Whereas the other clinics will go to the doctor, the MAT Doctor. So, with it becomes. That's why I'm saying pressure is not the right word. It's like a..I guess responsibility. Maybe where there's more kind of more as like the point person more of the...it's a little bit easier to like. Get to that burn out point at [Daisy Clinic] because there's not quite as much. I mean, you're limited in what we can do for them. We're limited in the supports that we can give our patients.

Elena and Charlotte both discussed the vacancy of this role. Elena explained,

I think historically, when the program started, and over the first few years [Daisy Clinic] had essentially a designated MAT physician. That was their schtick. It's what they loved, and you had your point person, so even though at that time there was still only one day MAT Clinic, you had your point person, and that person has since transitioned different roles, and we have now a rotating cast of physicians, which is wonderful from a sustainability standpoint, I think, to have more people in it. But it does also mean that there's more. But it's harder to kind of know who do you go to for what?

When reflecting on general frustrations, Elena suggested that,

I think some of it might come from role clarification with our positions of what we're able to do, what they're able to do. And I think honestly, some more like honest reflection of what people's capacities are and where their interest lies.

Systemic Problems

The researcher's first glimpse at inefficient processes came during the interview with Harper (RN) who described the work and care that the clinic does to assess, screen, and triage a patient who has suicidal ideation. Then, after they are determined to need a hospital stay, Harper said that they call 911 just like anyone else would to initiate a hospital stay. It immediately struck

the researcher that despite the effort made to collaborate as a system within Daisy Clinic, they had to start all over again as soon as they needed anything outside the building. Despite skilled risk assessments being done by professionals who had a relationship with the patient, there was no warm handoff described between the clinic and the hospital. Daniel (BHC), Charlotte (BHC), and Elena (BHC) also commented on inefficient processes. Charlotte (BHC) offered a play-by-play of what it is like for patients to make a phone call to the clinic, using the words “scared, stressed, and worried” to describe how patients might feel,

“They probably dealt with central scheduling and [larger healthcare organization] phone system for 30- 45 minutes before they were able to leave a voicemail and are probably stressed and annoyed before they could even leave this voicemail. And now they waited, probably 2- 3 hours for this phone call back because we're busy at the office fielding phone calls. And so, they had 2 to 3 hours to sit and panic on their own about whether they were going to get what they needed. And then you finally called them back. And now they have 4 hours of stress that they're unloading on you, right? It's gonna come off as mean and cranky. And I, you know, we hear where the staff are coming from. Yeah, they're in crisis. They're stressed. You're now stressed, you're now feeling defensive because they're yelling at you and yeah, it's a whole cycle.”

Elena (BHC) suggested that staff having multiple roles could be overwhelming,

Because we have a rotating cast of positions, and their responsibilities are multi-pronged and other program things outside of addiction medicine, that inherently makes it hard like. I can't imagine having to be in charge of addiction and resident training, and this and that and this and that.

Elena introduced the concept of “appointment retention” (ISE), which also emerged in an on-site observation, where staff discussed site goals of increasing patient appointments at the clinic, citing that there had been an observed decrease. Reflecting on this, Daniel (BHC) discussed the time-consuming nature of building a relationship with a patient, noting that sometimes it could put providers behind schedule. However, going over the appointment time

does not mesh with needing to increase patient visits. He explained his preference for being able to take the time needed with each patient,

“If there's gonna be a problem, I'd rather it be on that side. And I think that's just being here, and also my own experiences with like the medical sort of establishment, I think. It's unfortunately going in the other opposite direction. Get as many people in as you can, shorten the appointments and keep them focused on, you know one thing”

Elena reflected on the process of referrals being made through providers and wondered if the behavioral health program would grow if patients were screened initially with Behavioral Health Clinicians,

And so, we're rarely the first touch point. There's somebody else that is, first catching it and then we'll get a glimmer of where we can be plugged in and therefore, I don't really know what those initial conversations look like. So, I think that's where I'd be curious, are we? Are we actually missing people? Or are we just realizing that a lot of our people are accessing other supports? And they're doing, okay? ...I mean, we function on a referral basis. So, the physicians or the MA's or the nurses have to have their little spidy tingle go off in order for anyone to get to us, and if they don't, then it might take longer for that person to get connected with us.

Charlotte (BHC) commented that from her perspective,

What we're hearing across the board from even outside of our centers, is every.. healthcare in general. All across the board is just understaffed since the pandemic. Yeah, pandemics saw a huge exodus and since then it's just healthcare in general has not been able to bounce back from the staffing perspective... I think every aspect of health care, no matter what your role is, from the front desk to the to the clinical staff. We're all. Everybody feels it.

How Contact, Connect, Continuity, Classify and Collaborate Were Named

This section describes the process of identifying how the theme of contact was an overarching theme for subthemes of connect, continuity, classify and collaborate. The researcher heard warm handoff in the first interview, without fully understanding what it was. As warm hand off was repeated in other interviews, the researcher began to identify that this referred to the process of passing off a patient to another discipline with a smooth transition, so that the

other discipline had the relevant information to pick up where the other person left off. It was not until the data analysis that the researcher realized that a warm handoff in this context referred to medical staff making referrals to behavioral health staff. Although warm handoffs were described and stated in interviews, they were not named anywhere in archives. Instead, Daisy Clinic's website had descriptions about increasing access to care and removing barriers to care. The researcher began to understand that warm handoff was just one aspect of the bigger picture at Daisy Clinic, which was when contact was named. The researcher was not yet aware of how all the themes were joined with contact, so originally, warm handoff was categorized as contact. However, as the researcher heard participants describe the ways they worked together as a team, the researcher began to understand that there were multiple subthemes where contact was an essential ingredient. Contact was necessary for collaboration, because if team members could not contact their patients or each other, they were not going to collaborate on their care. Contact was needed to classify too, because they needed to be able to successfully engage with patients to accurately determine the urgency of their needs. Contact was needed to connect as well, which was the act of referring patients to different care options, where warm handoff takes place. The warm handoff was not an overarching theme but was at the center of these intermingled themes.

The researcher named contact after staff repeatedly talked about skills needed to make the patients feel comfortable enough to engage with them and share symptoms and struggles. Equanimity was named by the researcher after hearing from three behavioral health clinicians about the importance of normalizing discussions about suicidal ideation and not jumping to conclusions about suicidal thoughts always being a crisis. However, the researcher realized after Arden's comment about how some patients seemed like they did not want to engage, that this interaction did not rest on staff skills alone, and that contact needed to be reciprocal in the staff

patient relationship. This was also discussed when behavioral health clinicians mentioned how useful the BIC model was for establishing a reciprocal communication pattern where the goal was to monitor suicide risk. The researcher also began to understand that contact led staff to work together, too. If there was missing patient contact or staff contact, there was unlikely to be collaboration either. Lastly, staff described the ability to make use of long-term relationships with patients, but they had to engage first, which led to naming the sub-theme of continuity. This is how the researcher saw that contact was the link between classify, collaborate, connect, and continuity.

Crevice emerged as a theme opposite to contact in the last two interviews, where staff described inefficient processes and frustrations. The researcher first recognized this as something that bothered the staff but did not realize it was the opposite of contact until re-coding all of the interviews to check for consistency. The researcher realized that staff were describing circumstances that prevented contact, collaboration, continuity, classification, and connection. It was named crevice because the researcher envisioned a physical crack in a sidewalk, where the two sides were close but not touching. If contact was missed, its subthemes (connect, continuity, classify, collaborate) might not happen either.

Concerns: Spectrum

Participants reported experiencing varying degrees of urgency with late life suicide risk. For example, medical provider, Arden said, “I can count on my hands. How many times anyone has volunteered active suicidality,” whereas registered nurse, Harper discussed that,

I'm definitely seeing more of that population reach out for mental health issues, you know, depression, anxiety, and some of them just don't know what's wrong. Had an elderly person in their eighties reach out and said, ‘I'm really going through a lot, and I just don't know what's out there for an old person like me’ they didn't even know what their options were.

Staff described the urgency of suicide risk as falling on a spectrum from passive suicidality to acute suicidal ideation and plan. Passive suicidality referred to the desire to die without having a plan for suicide or other suicidal behaviors, which was what they described as the most common. Arden described passive death wish for older adults as,

...they gave me this vibe of. They've been chugging along, life sucks, but they're just gonna keep doing it, and they kind of wish they could just die. But they don't have any plan, and it's not like within their values to contemplate active suicide, even though they're very, very depressed and would rather not go on.

Participants also described suicidality that was in their clinical judgment more imminent or pointed to active suicidal ideation, which referred to a person who had suicidal behaviors and active plans to end their life. Arden reflected that acute active suicidal ideation was infrequent in the primary care setting. Participants explained that active suicidality emerged on the tail of a huge life transition and was most concerning if the person had access to means of ending their life, like a firearm. Arden reflected on this, “I'd say the vast majority of people simply are struggling with either disease or social factors, and they say I often think about death, or I think about not existing anymore.” Similarly, behavioral health clinician, Barlow explained, “I see two

things really. One: The person is saying, 'my life is very stressful, and it'd be easier if I wasn't here.' There's a major problem going on that I don't want to deal with."

Arden and Behavioral health clinician, Charlotte described scenarios where patients might be in imminent danger because they could verbalize a method of ending their life. Charlotte said, "they thought about calling up their old dealer, because they know exactly how much they would need to take to fall asleep peacefully and not wake up again." Arden gave an example of something a patient might say, "I would think about walking in front of like an oncoming traffic, or just like not getting up in the morning and just lying there forever... I would do it with a firearm or pills."

Adjacent to suicidal ideation, some participants discussed that older adults will at times reflect on thinking about death as they processed the reality of death as the next stage for them. This was not described as suicidal ideation but as a different topic that might come up in their conversations around suicide risk. Behavioral health clinician, Barlow shared,

"I mean part of it, too, with the geriatric and taking care of older adults, is you're in this phase of life where people are moving towards the end of their life, you know, and they're thinking about palliative measures and hospice. And they start to think about the end is coming for me. And that's not even in a pathologized illness, sort of sense of like suicidal ideation, It's the reality.

more I'm prioritizing asking about their mental health. I think that's such a huge part. I think there are people who struggle with depression, anxiety, early and I think the people, the people who are getting it later on in life probably always had something. But I think the added stress of a disease burden really brings that out and makes people more open to talking about it.

Behavioral health clinician, Barlow also talked about burden of disease,

One issue is probably chronic mental illness that is, in a more stable state. So patients who have had a pretty tumultuous history of mental illness now, in their later years... It's kind of still there, but they're not as severe as it was when they were younger and had a lot going on. So, I think there's the group that needs some follow up, and they have a pretty severe history of the serious mental illness, and it's now tamped down. Second group is folks who are going through like medical complexity, and then they have comorbid depression, anxiety... On top of that. That tends to be probably the largest group that they start to have, you know, going downhill with their medical conditions, having a transition to maybe not living at home facility type of care and also having the adjustments with their family and that sort of thing.

Medical provider, Gianna discussed how chronic illness should trigger a discussion about mental health. She specifically named diabetes and chronic illness as being associated with higher levels of depression so they, "try to get them to screen intermittently."

Burden of disease was also described as a potential barrier to screening or opportunities to explore mental health concerns more. Both medical providers Gianna and Arden mentioned that older adult patients often have multiple health issues to discuss with their provider during visits and mental health may not get as much airtime as people with less medical concerns.

Arden said,

..a lot of the older adults are just, they're so sick, and you just don't have time...by the time they're on chronic oxygen and dialysis. And all these things like so much of your time budget is taken by more urgent if, though, like maybe less important, well maybe equally as important, but just more urgent medical problems. A lot of the older adults they have like 7 or 8 things that you have to address by them, and I don't know if they're that interested. But it's hard for us, and it's probably not number one for them anymore. Like they know that they're not doing well, but also, they're working on breathing rather than doing the long deep work of mental health

that for older adults with substance use disorders, burden of disease was coupled with “this concept of loss looms a lot bigger,” where,

This thought of loss of time and loss of youth. That a lot of it was experienced within their active addiction. Loss of future relationships, past relationships, and a lot of existential queries of you know, what do I do in the last few years of my life? And how do I promote my own longevity within it?”

Barlow explained his position that stressors might be easier to recover from for younger patients because,

I would just say that the stressors are more severe because much of the ability of the person and social structure are both kind of broken down. And also, the physical ability of the person has changed. So, their own health is impaired, the social structure is more burdened, and that can make these things more of a concern

Behavioral health clinician, Charlotte explained that any of her patients with substance use histories of every age had specific warning signs, too,

if they're mentioning who they're hanging out with, isolation from peers, their positive recovery peers specifically with our MAT patients we're looking at. If they are actively and have historically, actively been engaged with recovery support groups. We're looking at disengagement from those. So, a lot of isolating behaviors is a huge trigger for us that things are not going well.

Medical provider, Arden described the importance of not just having relationships, but having meaningful relationships, as well as the stress of caregiving,

I think I've seen more of that at that health center where the people often times that you know, are kind of isolated. They live alone... [have] friends, but they don't get the same level of emotional support. So, it's almost like that loss of support, plus being the caretaker of your significant other. it's usually not like...It's either their physical health or their relationships, plus the lack of like relationships that truly have some emotional support in them.

Elena discussed her top warning sign as,

“Maybe isolation. Sort of being cut off maybe from family, from friends So I think that's a big one from my 65 older I think, also adjusting to that like timeframe life, age.

In talking with my older adults, it weighs heavier. Because there's been more extensive loss of friendships, of relationships, be it through estrangement, or be it through death. And that there's I'm thinking about one of my patients in particular who wants nothing more than to have a core group of friends and have ideally a romantic partnership again in this future. Yeah. But the fear of rejection and the fear of like that not being a shared interest in the sense that everyone else has this but him has really stopped him from being able to make those steps towards connection again versus with some of my young patients who are in their twenties and thirties, where there's more opportunity, be it through work, or be it through like activities with their kids, or what have you.

Older Men

This topic was the only time when participants mentioned any specific profile of people who they had concerns about. In the context of social structures, medical provider, Arden, and behavioral health clinician, mentioned that they find it harder to engage older men in conversations about mental health. Arden said,

Well, the older men don't even come to the clinic, and usually it's their wives or daughters, or something making them come in. I think we're different now, generationally, but certainly the people from that generation I think fit that stereotype quite well.”

Barlow (BHC) similarly remarked,

I think men. I've seen men who will say that they'll just, ‘Well, you know, when the end comes, I'm not gonna tell ya.’ you know I think that person doesn't come into the office and say, I'm suicidal. They'd keep it to themselves, and just say I wouldn't let you know about that. I'll take care of what needs taken care of. It's more that sentiment than distressed, emotionally charged depression where you're acting out of desperation.

CHAPTER 5: DISCUSSION

This qualitative case study compiled important staff perspectives of how Daisy Clinic recognizes and responds to late-life suicide risk. The focus of this research explored the specific skills and tools used by individual clinicians, how the team functions together, and what they considered to be warning signs or risk factors of late life suicide in practice. This chapter synthesized the findings with the literature and theories, discussed the study's strengths and limitations, reviewed implications for social work leadership, and explored considerations for future research. Qualitative case study discussion needs to include a balance of description, findings, and interpretation, often produced as a narrative with the findings (Merriam, 2016). This discussion took a middle ground where findings are presented separately in the previous chapter, but other examples are revisited in the discussion.

Yin (2018) suggested that case studies require the researcher to report the findings in a way that allows the reader to understand the context, importance of the findings, and present this in a way that makes sense for the study. Yin (2018) remarked that a case study incorporates not just the setting as a place the participants belong to but as an essential element of the overall study. Further, Miller et al. (2023) suggested that case study context findings should be discussed with how they relate to other similar settings so that readers can easily determine the relevance to their site or study. Findings were interpreted with research questions, discussed in relation to the literature review (Yin, 2018). Lastly this included a discussion of study limitations and implications for future research, an essential component of any research (Merriam, 2016). Holly and Harris (2019) recommended that a qualitative dissertation should not just report findings but explain what findings could mean in practice. This section was organized like a funnel, beginning broadly, and moving into specific elements. This section began with the overarching

research question before shifting to specific aspects of the answer (Merriam, 2016; USC Libraries, 2024; Yin, 2017).

Review of Research Question and Major Findings

The present study explored how one primary care practice recognizes and responds to late life suicide risk and was conducted as a qualitative case study of one primary care practice that included eight interviews with staff, collection of archives, and on-site observations. The researcher analyzed all data using open coding and developed themes. Findings were presented and grouped with four major themes of context, concern, contact and crevice. Crevice is considered the opposite of contact, and contact holds the subthemes of classify, connect, continuity, and collaborate. As is consistent with general systems theory, the themes were identified as distinct but so interrelated with each other that it was difficult for the researcher to tell where one ended and another began (Bertalanffy, 1972). Rational systems theory provided a lens for Daisy Clinic organizational structure and context. Findings pointed to the participants' observations about factors of the social context that were also included in the study and are discussed in relation to consistency with Marson's (2019) theory of older adult suicide and findings in the literature review. Lastly, findings about team-based care are discussed with relevant literature about IPEC.

How does Daisy Clinic Recognize and Respond to Late Life Suicide Risk?

Daisy clinic operates from a model of team-based, integrated behavioral health care. Staff achieve contact with their patients through skills of engagement and equanimity, enabling patients to form a safe and trusting relationship where they can share their distress, needs, and concerns. This professional relationship facilitates the opportunity to accurately classify patients from levels of urgency and prioritize by degree of immediate needs and concerns. This

relationship also serves as a basis for staff to connect patients to other needed resources, catch a glimpse of other needs, and use their expertise of the healthcare system to act as a tour guide, directing patients where they need to go. The researcher envisioned the healthcare system as a multi-laned highway that is complex for patients to navigate. With exits on both sides, patients need someone to help them navigate the right course, and they need someone to follow up to ensure they arrived at the right place. Within the scope of family medicine, Daisy Clinic staff can rely on a product of their environment which is continuity. In family medicine, a patient may be seen for years, and there is potential for long-term engagement with the clinic. The longevity of the relationship provides opportunities for follow up, guidance, and direction in a variety of needs and concerns, including follow up in the greater healthcare system. Finally, staff collaborate. This means that they do not care for patients in isolation, but they have individual and communal expertise to lean on. Staff perspectives of this model are that it is instrumental to the work they do with patients of variety of ages, conditions, issues, and that provides the space to do more for patients than they could have done alone.

Within this team-based model of care, individual staff acknowledged and described characteristics that they believe to be risk factors or warning signs of late life suicide risk. Staff discussed that patients may only share critical information with professionals within the context of a trusting environment and relationship. Patient relationships were underscored as one of the most important tools in patient care and suicide prevention. However, their relationship with each other remains critical to ensure that the team can accomplish the myriad issues facing patients. When staff indicated a lack of collaboration with their teammates, it was presented negatively as a missed opportunity and frustration that resulted in missed contact with patients, too. The topic of screening tools being used less frequently than ideal also supported the idea that

processes could be improved to increase opportunities to make connections to resources. Staff also reflected on desiring more education about late life mental health and suicide.

Meaning and Importance: Daisy Clinic and Study Findings Compared with the Literature

This section systemically compared present study findings with the literature. Major findings have implications for future research and practice related to interprofessional collaboration and education (IPEC), primary care, family medicine, and adding healthcare fragmentation. Case study discussions also need to include an explanation of characteristic of other similar settings and how the study site compared so the reader can determine the usefulness of the data (Merriam, 2016), so this section begins with a comparison between the present study setting and other similar settings.

Daisy Clinic Characteristics Typical of other Similar Settings

Daisy Clinic is typical of practices with similar characteristics in terms of workforce roles, patient population, and functioning as a family medicine residency. According to Petterson et al., (2018), 42% of Pennsylvania's primary care workforce was practicing family medicine. The family medicine workforce consists of about 44% females, and about 46% of family physicians are over the age of 55 (Petterson et al., 2018). Primary care physicians also make up about one third of the nation's physician workforce, with 39% practicing in family medicine (Willis et al., 2020). Most people in the primary care workforce began their careers in their twenties and worked in the field for forty years, and in 2019, one-quarter of PC physicians were aged sixty and over.

Daisy Clinic is considered a non-physician-owned, employee-based practice, which is how 32% of the nation's primary care practices are also defined (Jacobs et al., 201). This means that there are different models of ownership in primary care, where physicians may own and

practice in their clinic, or where someone else owns the clinic and employs the staff (Jacobs et al., 2018). In Daisy Clinic's case, this clinic is owned and operated by a non-profit healthcare organization that employs 95,000 people across its settings (AS). Lastly, the clinic shares its academic setting characteristics with 47% of the nation's practices also functioning as teaching clinics. Out of the 43 family medicine residency training programs in Pennsylvania specifically, 44% operate with an integrated behavioral healthcare model (Jacobs et al., 2018). It was particularly challenging to locate data about primary care or family medicine that was not focused on only providers like physicians, physician's assistants, and nurse practitioners. Data reflecting the healthcare work force at large, including other disciplines, could not be located. The researcher determined after reviewing the data and available literature about primary care settings in Pennsylvania, that Daisy Clinic is typical of other family medicine practices that function as team-based, residency, integrated behavioral health within a non-practitioner-owned employee-based model. The present study is useful for future research as it has provided an in-depth detailed description of what it looks like to manage mental health in this type of setting, but also with models of care that have been named ideal practice (Barth et al., 2022). Past research has isolated participants' discipline without taking an in-depth look at the intricacies of the team (Christensen et al., 2021; Vannoy et al., 2011; Saini et al., 2018; Leavey et al., 2018; Wardig et al., 2022; Karlsson et al., 2021; Bjorkman et al., 2019; Svenningsson et al., 2018; Grundberg et al., 2016). The present study has filled some of this gap by centering the study around the function and impact of the team and by choosing a study method that would capture this.

In the literature review, primary care was described as a healthcare setting with collaboration and referral to other needed medical services (AAFP, 2022) and behavioral health

is managed in various ways (Christensen et al., 2023). However, Collier (2020) suggested that collaborative models, or those which include team-based care with medical and behavioral health staff, may decrease healthcare fragmentation, which is the way Daisy Clinic operates. In primary care settings, social workers are core providers of behavioral health services, and have been associated with positive outcomes for patients compared to routine care alone (Fraser et al., 2018). While the researcher obscured specific disciplines for privacy, Daisy Clinic operates with social workers as a key component of integrated behavioral health, where some provide on-site counseling (ISB). Out of the eight participants in the study, four people had a degree in social work, so this study captured primary social workers' perspectives.

However, the present study included perspectives of many disciplines as not to create further siloing in the research of healthcare (Teams, 2011). Siloing as a practice may also be especially detrimental for suicide education and training (Kramer et al., 2019). The present study included six distinct roles and five different educational backgrounds, and this interdisciplinary perspective offered insight into how different professions may view the same topic in the same environment. Including multiple disciplines in this study has provided insight on how perspectives might differ in the same environment.

Staff Reports were Inconsistent Around PHQ-9 Screening Rates

In the present study, staff reported suicide risk screening practices inconsistently. Four respondents listed universal screening, while one listed case finding, and one indicated they were not sure what the process was. Behavioral health clinician, Elena also discussed that this process seemed mysterious since she was not a part of how and why patients were referred to her, that this was determined by providers. Staff also had different answers as to which role oversaw suicide risk screening. One medical doctor responded that suicide risk screening is the

responsibility of the medical providers, while three respondents indicated that this task is shared by multiple disciplines. This is not enough information to make conclusions about why the answers are different, but it strikes the researcher as an interesting and unexpected finding that different staff would answer this question differently as it was intended to be an objective measure of practices at Daisy Clinic. This finding provided more evidence of the need to include multiple disciplines in studies done in interprofessional settings.

Daisy Clinic's practice of using the PHQ-9 administered by physicians is consistent with national data about other primary care practices (Christensen et al., 2023). However, this present study and Christensen et al. (2023) only included ideal practice reported, and not an actual measurement of screening frequency (Christensen et al., 2023). For example, it is different to suggest that the clinic has a practice to conduct universal screening than to measure the number of patients and the number of times the suicide risk screening was used. This became clear to the researcher in the interview with medical provider, Gianna, who despite indicating that the practice's standard was universal screening, their rate of screening completion could be better. These findings suggest that further research is needed to capture actual practices and screening completion rates based on medical records.

Different Disciplines, Different Discussion

While screening instruments have been emphasized in the literature, Ketel et al. (2021) found that most primary care patients with suicidal ideation did not present with psychiatric symptoms, and Fisk et al. (2009) found that older adults might be less likely to report emotional distress. The present study adds to the body of research about how primary care professionals at Daisy Clinic recognized warning signs and risk factors not contained in the PHQ-9 as Marson (2019) has urged professionals to do. At Daisy Clinic, staff shared different kinds of experiences

with conversations about suicidality. Behavioral health clinician, Charlotte conveyed that she found her patients to be very open and honest, and that she found her older patients to talk about similar struggles as did her younger patients. Behavioral health clinician, Elena suggested that her patients seemed willing to discuss suicidal ideation especially when she framed it as a normal conversation, and that no one had ever declined the offer. Medical doctor, Arden shared that he found some patients were more open than others, and that older adults at times were difficult to engage with mental health conversations. The differences in staff perspectives about experiences with conversations about suicidality is corroborated with behavioral health clinician, Daniel, who indicated patients might be affected by wanting to appear compliant with their physicians especially. Daniel recalled multiple times in the past when a patient told their medical provider that they were interested in a behavioral health clinician follow up, but upon follow up, the patient told him they were not interested in counseling. In summary, this demonstrated that patients may have different conversations with different disciplines, but the reasons are not clear and were not a part of the present study.

IPEC and Family Medicine in the Literature

Figure 5.1

Visualization of shared values between IPEC and Family Medicine

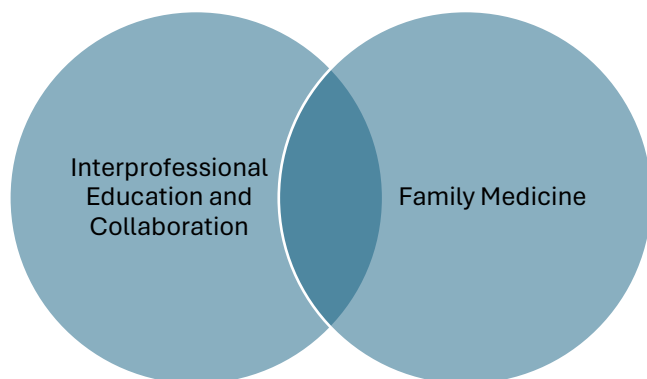


Figure 5.1 is a visualization of how the shared principles between IPEC and principles of family medicine align. After reviewing the literature and considering the study findings, the researcher found these two schools of thought to be complementary. According to Hashin (2016, pp. 76-77), there are five core values of family medicine: “compassionate care, generalist approach, continuity of relationship, and a commitment to professional and personal development.” Family medicine is also centered around the importance of respect and kindness in the approach of providers and a genuine desire to help within the context of the person’s social environment, culture, and community (Hasin, 2016). Family medicine practices within the bonds between patients and providers, and inclusion of patients’ social networks, where continuity of care can be practiced because a long-term relationship is built (Hasin, 2016).

Integrative Behavioral Health

The existence of the integrated behavioral health program is the clinic’s largest show of dedication to IPEC and Family Medicine principles. Rosenbaum et al. (2013) defined integrative behavioral healthcare broadly as a primary healthcare practice that provides behavioral health through various means. Some of these options included contracting out to other providers, co-locating with mental health providers of separate entities, and working in the same space for the same organization with the same medical record. Daisy Clinic practices with the latter of these and described that having mental health counseling available on site was important to provide more care to more people with higher quality. Lastly, Daisy Clinic exposed residents to this model of care by training them with an integrated behavioral health model.

Daisy Clinic staff described collaboration in ways that were consistent with the definition of interprofessional collaboration, defined as two or more disciplines working together to accomplish a goal (Green and Johnson, 2015). Team-based care was also defined by the National

Academy of Medicine as “health services to individuals, families, and/or their communities by at least two health providers who work collaboratively with patients and their caregivers to the extent preferred by each patient to accomplish shared goals within and across settings to achieve coordinated, high-quality care” (Mitchel et al., 2012, p.5). The present study adds to this definition with insight into the meaning that staff ascribe to team-based care, too. For example, registered nurse, Harper, described the team as her lifeline in a fast-paced and stressful job. Mitchel et al. (2012) and Green and Johnson’s (2015) definitions align with findings from interviews and archives. While staff remarked that team-based care was a tool that made their jobs and patient care more efficient, the payoff is much bigger than this. The World Health Organization called Interprofessional education and collaboration (IPEC) a critical component of reducing fragmentation in healthcare systems (WHO, 2010).

The emphasis on team-based care and collaboration was evident throughout all sources of data in the study and mentioned in all eight interviews. Bruce and Pearson (2022) suggested that collaborative care models in primary care settings are the gold standard for managing behavioral health for primary care patients. However, Sinclair (2023) suggested that there are staffing shortages across the healthcare system, which is likely to take a toll on primary care settings. IPEC has been proposed in part as a response to the healthcare shortage, as a proposed means of efficiency (IPEC, 2023). The only times team-collaboration was mentioned in a negative tone was when staff reflected that they were not getting enough of it, as discussed in the theme crevice.

Team-based Care and Late Life Suicide Prevention

Daisy Clinic’s staff expressed that their team-based care model was especially instrumental for their older patients who often presented with medical complexity, and efficiency

has a high value to ensure that each issue, including mental health, can be addressed. Staff reported that having more eyes on patients was a major benefit of the team and that integrating multiple disciplines gave them more sources of information from which to practice. Behavioral health clinician, Daniel, for example contrasted his experience in community mental health and used the word “isolating.” He explained that his resources were only what the patient shared, that he did not have ease of access to medical information about the patient automatically. For clinicians monitoring older adult suicidal ideation, it is invaluable to collaborate with a medical provider who is monitoring a common patient’s healthcare needs.

Staff commented that older adults might be especially vulnerable to late life suicide risk due to changes that take place in medical, functional, and social aspects of late life. Both medical providers, Arden and Gianna believed that the team-based model is especially important for health and well-being in late life. Behavioral health clinician, Daniel similarly commented that he found older patients were more likely to need assistance with resource coordination, too. Behavioral health clinicians, Barlow and Elena remarked that social structures were broken down more for older adult patients compared to their younger patients. Care coordinator, Flora also observed that older patients who either lived alone or lacked social support seemed to have more difficulty initiating services and care. The team-based model was described by staff as a resource that increased the interactions and options available to patients, which was especially important in the case of medical complexity and social changes that many older adults had been presented with, including the risk of suicide.

Staff overwhelmingly remarked that they appreciated having so many resources to offer patients at Daisy Clinic, especially behavioral health. The researcher first noticed the frequent mention of the warm handoff, which was an unanticipated finding not included in the initial

review of the literature, and not immediately understood when the researcher heard it. This theme stuck out as a term that only the people who worked at Daisy Clinic seemed to understand but had importance to them for how frequently it was mentioned and described despite not being anywhere in archives. Warm handoff was also described as a practice that was encouraged for suicide prevention efforts by Zero Suicide and the American Academy of Family Physicians (AAFP, 2019; Zero Suicide, 2022). Warm handoffs have been associated with a higher likelihood of patients following up with mental healthcare treatment options (Pace et al., 2018), and Daisy Clinic staff also found them important in establishing patients with behavioral health on-site. The researcher initially thought this was a way to introduce patients to their peers, but upon further inspection of the actual ways they described scenarios of using a warm handoff, it was evident that this was a practice most common to behavioral health referrals. The warm handoff is also possible because behavioral health is in the same location as providers, which would be harder to accomplish if they were referring the patient outside of the clinic.

It All Comes Back to Relationships

In the present study, relationships underline the major themes of contact, classify, connect, collaborate, and concerns. This was described in the context of the need to build and sustain relationships with patients, encourage patients to have meaningful relationships with others, and teamwork. Staff expressed a genuine desire to provide timely care, improve access to care, connect people to needed resources inside and outside the clinic, and provide follow-up. Staff reflected on and were knowledgeable about the cultural context in which they worked, commenting on the older adult population having lived through dramatic changes in their hometown and having grown up with few resources, now living in a neighborhood that was no longer the same place they grew up. Historical context archives provided the researcher with two

pieces of information: a richer context in which to observe the study site, and evidence of the staff's dedication to knowing and understanding their patients and the context in which they lived. IPEC suggested that quality patient care that is accessible and client-centered can improve population health outcomes too (IPEC website para 1.) In fact, behavioral health clinician, Elena noted an understanding of this in her statement that the key to preventing late-life suicide was in forming connections and relationships.

Archives also contained themes about the importance of relationships. Collaboration appeared as the rule and working independently seemed more like the exception at Daisy Clinic. Behavioral health clinician, Daniel offered a snapshot of how team members gathered twice a day to touch base; Web archives described the site as being team-based care, and job postings encourage prospective employees to “join the team” (WA); All eight staff interviews reflected on the benefit of shared decision-making, not feeling the pressure to make decisions alone, and being able to rely on each other's strengths. Behavioral health clinician, Daniel drove this point home in his explanation that patients start any service at Daisy Clinic with a medical doctor appointment, which indicates to patients that Daisy Clinic does not see mental and physical health as separate but rather connected, intertwined, and symbiotic.

Meaning and Importance: Rational Systems Theory and Crevice

Healthcare systems can be difficult to understand without a theoretical framework (Piña, 2015; IPEC, 2023). Piña (2015) proposed the use of rational systems theory to better understand healthcare organizations, goals, and roles. In this study, rational systems theory provided the frame used to collect contextual data about Daisy Clinic system and how they functioned together, which allowed the researcher to answer the research questions. In rational systems theory, an organization is successful if it has defined roles and accomplished goals (Scott &

Davis, 2007). Hallmarks of rational systems theory are the degree of transparency and clarity in individual roles. Through the lens of rational systems theory, Daisy Clinic functions with a hierarchy that includes leadership roles and formal job performance evaluations (Scott & Davis, 2007), demonstrated during on-site observations in a staff meeting that covered staff evaluations and expectations. Rational systems theory definitions of role transparency and clarity serve as a model to compare Daisy Clinic practices which were useful in noticing areas of breakdown (Anderson, 2016).

Rational Systems Theory and Missed Contact

In the final overarching theme, crevice, staff expressed that something was missing as they described feeling blocked from fully utilizing clinic resources, or that the clinic lacked the resources required to support patients to the best of their ability. Staff reported concerns when they detected that there were missed chances to collaborate due to lack of time, inability to engage successfully with patients, or when there was inconsistent follow up, much as what was mentioned about improving rates of screening tool use. Two staff reflected on vacant positions that they believed created a lack of role transparency and clarity. Behavioral health clinicians, Charlotte and Elena described increased responsibility and perceived increased anxiety from their colleagues due to a vacant position. Charlotte said she had experienced increased responsibility from trying to overcompensate for this void, while Elena talked about not receiving many warm handoff requests. This information suggested that these staff felt blocked from their overarching goals and that they and their peers experienced a lack of clarity around their roles. Elena's impression was that out of so many patients at the clinic per day, she should have some warm handoffs, and yet she reported that it had been weeks since anyone had called her in for one. Elena spent a large portion of her interview talking about communication that

should be more streamlined, where she suggested that part of the solution was more transparency and clarity between staff about their roles and interests. According to rational systems theory, Elena's suggestion aligns with ways to improve organizational goals (Scott & Davis, 2007). Similarly, interprofessional communication issues was one of the catalysts for the IPEC movement (IPEC, 2010). The theme crevice demonstrated the importance of not just having the right model of care but also making sure the individual pieces of the system are running smoothly together. The emerging theory being that missed contact might produce a cascade of effects. If a patient is not engaged with the clinic, they are unlikely to receive the other elements that come because of contact: classify, connect, and collaboration.

Behavioral health clinicians Charlotte and Daniel were the only two staff who commented on healthcare industry trends as a whole and how this has impacted leadership goals and staffing trends for Daisy Clinic. Charlotte's perspective was that Daisy Clinic had a staffing shortage, and that this was a trend across the healthcare industry. However, Daniel commented that healthcare trends emphasized seeing more patients total versus seeing fewer patients with depth. Behavioral health clinician, Elena also described her co-workers as "stretched thin," but there was no other information to corroborate Daisy Clinic being understaffed. However, in an on-site observation at a team meeting, staff discussed leadership goals to increase patient visits and retention. There was no other data collected on this topic to make sense of the patient to staff ratio trends at Daisy Clinic, or what the importance of this was.

The only other remarks about patient retention were made by medical doctor, Arden and Behavioral Health Clinician, Barlow, who commented that some older adult men either do not come in for appointments or they are difficult to engage on topics of mental health. This information prompted the researcher to consider a critique of rational systems theory, which is

that structure does not always mean more control, especially when it comes to humans (Durso & Drews, 2010). Barlow and Arden described being competent providers, confident in their knowledge of needed skills, and Arden even remarked having a unique ability to engage with male patients. Despite this, they expressed that there were some people with whom they failed to achieve contact. Durso and Drews (2010) suggested that while rational systems theory worked well to pinpoint breakdowns in machinery, humans are more unpredictable and complex. Even if staff are clear in their roles, confident in their ability to engage, increased structure may not change unpredictable elements of human nature. Furthermore, the dosage of structure matters, and too much can have a stifling and oppressive effect in organizations (Scott & Davis, 2007). The present study findings paired with rational systems theory are one way to look at the presence of this crevice in the system by outlining the importance of roles and goals in an organization, but it does not shed light on how far the issue runs, why it started, or how structures need to be adjusted to improve contact with certain patients.

Rational Systems Theory and Late Life Suicide Prevention Education

Three staff indicated that late-life mental health needs might not be specifically addressed in academic settings and training opportunities. It was not clear if this was directed toward organizational training or discipline specific training and licensure requirements. Perspectives included the belief that youth suicide education seemed more prevalent than was for older adults. One person also believed that public education about late life suicide risk might be beneficial. This is consistent with São José (2019) who found that there were fewer studies about late life suicide compared to younger age groups. The researcher considered these findings and believed that this could reflect an area where role clarity could be useful because if staff do not understand the issue of late life suicide it may be hard for them to understand their role in preventing it.

Late Life Suicide Risk Factors Discussed in Daisy Clinic and the Literature

This section is about risk factors and warning signs that staff described. It also includes a discussion of findings from Daisy Clinic paired with the review of literature, a comparison of Daisy Clinic staff's discussion of warning signs and risk factors categorized by Durkheim's theory of suicide (1897) applied by Marson (2019). This section is concluded with a discussion of findings that emerged that might not have been in the review of literature or included by Marson (2019).

Diversity of Older Adults

Stene-Larson and Reneflot (2019) found that 80% of people who died by suicide had been in touch with primary care in the year before their death, which indicated primary care staff are at the forefront of this issue. Behavioral health clinician, Elena referred to primary care as, "the first line." Staff discussed the degree of responsibility they had in primary care to catch issues as early as possible and to match patients with various levels of care if needed. Staff had different perspectives of what it was like to work with older adults, indicating that they did not find them to be homogenous and that people struggle differently. Medical provider, Arden reflected on this by describing how he had older adults in the younger age range who were in poor health compared to some people in their 80s who were in surprisingly good health. Behavioral health clinician, Elena reflected on her perspective that some healthcare staff had biases about depression being a normal part of aging; however, she specified that older adults who were struggling with mental health issues seemed to have fewer resources to draw on compared to younger individuals. These discussions were consistent with the findings of Santoni et al. (2015), reinforcing the need to see older adults on a spectrum with a range of different

issues. Interviews were framed around the struggles, concerns, and burdens facing older adults and are not meant to represent staff as believing all older adults are in poor health.

Burden of Disease and Social Structures

The two most prominent themes that emerged were the burden of disease and social structures. The burden of disease was initially introduced by medical provider, Arden, and remained a theme in all eight interviews. Hessel (2008, para. 1) defined burden of disease as “cumulative consequences of a defined disease or a range of harmful diseases with respect to disabilities in a community...[including] health, social aspects, and costs to society.” The burden of disease in the present study has the same definition, and refers to any physical and mental diagnoses, as well as the burden of these diseases on the individual, social networks, healthcare, and society. Mental health diagnoses did not stand out from physical illnesses in the conversation with staff but was instead equally concerning for suicide risk. For example, both medical providers, Arden and Gianna discussed how medical conditions are associated with poor mental health. Arden noted that any major surgery should trigger professionals to screen for mental health and suicide risk, while Gianna casually mentioned a connection between diabetes and depression. Mental health did not stand out as a factor that was separate from burden of disease but just part of the mix. The researcher interpreted this as further evidence that the staff practiced integrated behavioral health and worked to avoid siloing mental from physical health. Ironically, both medical providers discussed burden of disease as a risk factor for suicide risk, but also a reason mental health received less airtime in some patient visits. Hence, the overwhelming time that patients took discussing their acute illness increased their risk of suicide and could also be a barrier to discussing mental health. Arden suggested that health issues that limited a patient’s functioning like breathing issues, would usually take center stage for the patients’ visit.

Social structures were second to burden of disease, and included topics like isolation, living alone, lack of social networks to support activities of daily living, and a lack of meaningful relationships. Behavioral health clinician, Elena memorably said, as if speaking to an older patient, “I don’t think you understand how urgent this is, I need you to make some friends.” Every interview contained some mention of healthy social structures being protective and lack of healthy social structures being detrimental to older adults’ overall well-being. Staff reviewed issues that arise when older adults are isolated, live alone, or have experienced multiple losses.

An interesting finding about social structures was how it often accompanied discussions of burden of disease suggesting that some people receive the compounding impact of both burden of disease and issues with social structures, indicating that they exacerbated one another. For example, care coordinator, Flora talked about older adults who lived alone seemed to have more trouble renewing prescriptions. Similarly, a behavioral health clinician talked about older adults with substance use disorders resulting in a compounding burden of disease and isolation that came from substance use. Lastly, Arden reflected on the negative impact of caregiving for people with chronic illness.

Daisy Clinic Risk Factors and Theoretical Framework

Marson (2019) contended that in late life, there are specific warning signs belonging to four categories that professionals should be aware of to assess for and hopefully prevent late life suicide. The present study found evidence of fatalistic, anomic, and egoistic risk factors, as summarized in table 5.1. Marson (2019) suggested that altruistic risk factors are difficult to identify, and there was no support located for altruistic factors at the time of the present study. However, there may be subtle hints of altruistic factors in this study where Barlow gave an in-depth explanation of how social supports can be a protective factor but later shifts to a risk

factor, such as when a person believes they are a burden to others. What Barlow discussed is aligned with what Marson (2019) described as sliding, where an older adult might be out of the danger zone for suicide risk at one point in time, but remain at risk due to vulnerabilities in late life, and they can slide into a state where what was originally a protective factor becomes a risk factors (e.g. loss, bereavement). In altruistic suicidal factors, older adults would believe they are more valuable to others dead than alive, as is suggested in the idea of being a burden. Each category in Durkheim's theory (1897) is listed with Marson's (2019) specific life course events, evidence in the literature, and lastly how study findings align or contrast in table 5.1.

Table 5.10

Late life suicide warning signs according to Marson (2019), Daisy clinic staff, and the literature

Durkheim's Category with examples in late life (Marson, 2019)	Older adults who attempted or completed suicide in the literature had	Daisy Clinic Staff Descriptions of Warning Signs
Fatalistic: Failing health, poverty, key factor is hopelessness around bleak circumstance for extended period	Multiple health problems, failing health, chronic illness, belief that health was poor (1) (2) High rates of food insecurity (3) Financial Distress (4)	Burden of disease, new diagnosis, chronic conditions, major surgery Social determinants of health
Anomic: Loss of a spouse, changes to professional roles integral to the person's culture and identity, and recent admission to institutionalized care, such as a nursing facility.	Loss of spouse (5) More likely to have a recent hospitalization (6) Recent nursing home or hospital admission (7)	Bereavement Loss of a partner Loss of time, function Nursing home admission Changes to role for Caucasian older men noted as a possible cultural factor
Egoistic: Living alone, and poor social connections from marital and living arrangements, includes long-term nursing home admission*	Likely to have been divorced, widowed, live alone, report few social supports, and have experienced family conflicts (8) *Systemic review suggested suicide is rare in long-term facilities	Living alone Isolation Lack of social structures Long-term nursing home admission*
Altruistic: Feeling like a burden to others and potentially having assets	No literature detected	Feeling like a burden to others could be but more information needed
<p>(1) Almeida et al., 2016; Artero et al., 2006; Cabello, 2020; Calati et al., 2017; Mokhtari et al., 2019; Jackson et al., 2020; Juurlink et al., 2004; Miller et al., 2008; Ozer et al., 2016; Schmutte & Wilkinson, 2020; Terranova et al., 2012; Tsoh et al., 2005; Turvey et al., 2002.</p> <p>(2) Calati et al., 2017; Artero et al., 2006; (Tsoh et al., 2005; (Juurlink et al., 2004; (Miller et al, 2008).</p> <p>(3) Cabello et al. (2020)</p> <p>(4) Steele (2017)</p> <p>(5) Tsoh et al. (2005)</p> <p>(6) Meghini & Evans, (2000)</p> <p>(7) Artero et al., 2006; De Leo et al., 2001; Jackson et al., 2020; Menghini & Evans, 2000; Hedna et al., 2020; Jackson et al., 2020; Mokhtari et al., 2019; Mokhtari et al., 2019; Turvey et al., 2002; Torresani et al., 2014; Shah, 2009).</p> <p>(8) Mezuk et al. (2014)</p>		

Daisy Clinic Findings and Literature Missing from Marson (2019)

End of Life. Daisy Clinic staff discussed some late life suicide risk factors that were also supported in the literature but were not included by Marson (2019). The first of these is end of life. Three Daisy Clinic staff challenged the notion that frequent thoughts about death is inherently a suicidal behavior, as suggested by the SPRC definition (2020). Behavioral Health Clinicians Barlow and Elena, and Medical Doctor Barlow mentioned that sometimes older adults talked about the end of life as the reality of being in late life. They did not find this to be suicidal behavior and found it important to distinguish. However, registered nurse, Harper, introduced more abstract concepts around this asking, if an older adult decided to stop actively living and refuses treatment, is that suicide? Barlow indicated that staff should be prepared to have these conversations and not misunderstand them, recounting an experience where a patient was determined to be suicidal when reflecting on the end of their life nearing. This points again to equanimity of staff and the ability to apply the right level of care to a patient's needs.

Lethal Means. The second area of importance introduced by staff but not included by Marson (2019) was access to lethal means. Behavioral health clinicians, Barlow and Daniel, registered nurse, Harper, and medical providers, Arden and Gianna mentioned the importance of assessing for access to lethal means, noting the use of the SAFE-T assessment with individuals at risk. Sinyor et al., 2015 and Steele et al., 2018 discussed that access to lethal means remains one of the most dangerous risk factors of suicide across all age groups. Marson's (2019) focus is on prevention that is intended to catch suicidal behaviors before they start and does not emphasize lethal means. However, access to lethal means is repeated in the literature because there is no room for error once they have been employed by the person at risk, especially in the case of firearms. Assessing access to firearms is a critical point of suicide prevention (Steele et al., 2018)

which Daisy Clinic assessed. However, it is unclear from their descriptions whether they assessed everyone for access to lethal means, or only assessed people they determined to be at risk. More research would be needed to describe this in more depth.

The Male Factor. Medical doctor, Arden and behavioral health clinician, Barlow commented on older men being more difficult to engage in conversations about mental health, which could offer some useful insight into the issue of older men having the highest rates of suicide (CDC, 2022). The rate of suicide for older men is cited in the literature repeatedly pointing to this issue (Adler et al., 2022; Almeida et al., 2016; Apeso-Verano, 2018; Bamonti, 2013; Beghi (2021); Bishop, 2016; Canetto, 2015; Chen, 2021; Cho, 2021; Conjero, 2021; Cui, 2020; Chatton et al., 2022; Holm et al., 2020; Laflamme et al., 2022; Martinez-Ales, 2022; Steele et al., 2017). Barlow, who was aware the suicide rates are higher for Caucasian men reflected that he observed a cultural element where some people expressed a sense of importance in deciding when to die, and from his experience, at times expressing that they would not tell anyone they were at risk. While the CDC (2022) reported that older white men have an especially high rate of suicide, demographic information about the region could skew Daisy Clinic's perspective since they see more white patients than other races at Daisy Clinic (WA).

Given the evidence of concern for late life suicide risk in this population, it is surprising that it was not included by Marson (2019). However, there is evidence that certain risk factors that have been detected in males specifically might be related to the four factors, as discussed in the review of literature. Older adult men may be especially vulnerable because of their vulnerability to risk factors that were also described by Daisy Clinic staff in social structures, burden of disease, and missed contact (Frausing et al.; 2020; Valtorta et al., 2017). With this being a small qualitative study, generalizability was not a part of the design. In quantitative

studies, older men living alone had poorer health than those who did not, and there may be a relationship between weaker social relationships and longer hospital stays when warranted, where authors found evidence that weaker social relationships could exacerbate existing illnesses (Frausing et al.; 2020; Valtorta et al., 2017). Valtorta et al. (2016) also found a correlation between loneliness and isolation and risk factors for coronary heart disease and stroke. Hold-Lunstad et al.'s (2015) findings suggested that loneliness and isolation are associated with risk factors for mortality. While Daisy Clinic does not offer a big enough sample to support these findings specifically, it is possible that staff offered what they see as being a barrier to better health outcomes for older adult men.

Knowledge, Skills, and Tools Described by Staff and the Literature

Screening Tools and Rates of Completion

In addition to being able to recognize warning signs, Daisy Clinic staff reflected on a plethora of knowledge, skills, and tools that they turned to in recognizing and responding to late life suicide risk. A recent study suggested that the Patient Health Questionnaire (PHQ-9) is the depression screening tool of choice for most primary care providers studied, where 53.8% reported screening routinely for all or most patients (Christensen et al., 2023). Daisy Clinic staff also reported using the PHQ-9 and screening routinely for all or most patients. In addition, staff reported the use of the SAFE-T assessment to follow up depending on findings of the PHQ-9. Like the findings of Christensen et al. (2023) most Daisy Clinic staff reported that providers conducted the initial screenings, but others reported that this was shared by multiple roles or completed on an electronic tablet.

Christensen et al.'s (2023) major criticism of common suicide risk assessment screening tools was that they might be unrealistic in practice at primary care practices. The present study

offered some insight into similar concerns. Medical Doctor, Gianna discussed the need to improve the rate of implementing screening tools at the practice, and Behavioral Health Clinician, Charlotte talked about there being a lack of notification of behavioral health if they flagged concerns. Behavioral health clinicians Elena and Daniel expressed that they found the PHQ-9 to be a good starting point but they preferred to go deeper with an open-ended conversation. However, both staff who said this were behavioral health clinicians and had master's degrees in clinical skills, so this might reflect their skillset. Registered Nurse, Harper, indicated having had little education surrounding mental health in her education, for example. Screening tools might be especially useful for staff who feel less confident in open-ended clinical skills, but this was not addressed in this study. Lastly, the perspectives of these staff do not include actual screening rates at Daisy Clinic, and this information is not known, nor was it collected. Staff perspectives might differ from actual screening rates.

Unanticipated Findings: Knowledge, Skills, and Tools Discussed

The present study's findings that were not anticipated or discussed in the literature included staff mentioning having open-ended conversations and using skills belonging to Motivational Interviewing (MI) and Cognitive Behavioral Therapy (CBT). Freedenthal (2018), an expert in suicide prevention strategies recommended the use of cognitive behavioral (CBT) strategies. Beck (2011) has also suggested that suicidal ideation can be detected in thinking patterns which can be challenged and altered, as is a cornerstone of CBT. Marson (2019) also recommended open-ended conversations to be used in tandem with risk assessments, arguing that many tools do not assess for factors specific to late life. Support for use of MI for suicide prevention is mixed in the literature: Lundahl et al.'s (2023) systemic review of motivational interviewing methods applied to suicide prevention found that there is not a statistically

significant association between reduction of suicidal ideation or increased mental health seeking behaviors. However, Britton et al. (2011) suggest MI might be complementary when used in conjunction with CBT.

Daisy Clinic's Evidence-Based Practices for Suicide Prevention and the Literature

In addition to individual skills, findings of the present study suggested that Daisy Clinic uses evidence-based methods for late life suicide prevention studied in primary care settings as discussed in the review of literature (Holm et al., 2020; Okolie et al., 2017; Wallace et al., 2021). These are summarized in table 5.2, denoted with an X if it was discussed in the present study.

Table 5.2

Daisy Clinic Practice and evidence-based practices in the literature

Prevention Characteristics	X for Detected in Study with Daisy Clinic
Treatment of physical and mental problems (Holm et al., 2020)	X
Referral (Holm et al., 2020)	X
Educational program for community education (Holm et al., 2020)	Not detected, but clinic's connection with local university may contribute to educational programming opportunities
Patient Education on Warning Signs (Holm et al., 2020)	Not detected in the present
Social Support (Holm et al., 2020)	X
Incorporate depression screening and management (Okolie et al., 2017)	X
Pharmacotherapy (Okolie et al., 2017)	X
Psychotherapy interventions (Okolie et al., 2017)	X
Telephone counseling offered on a geriatric support line (Okolie et al., 2017)	Use BIC model, description is like telephone counseling in Okolie et al., (2017)
Community-based outreach programs (Okolie et al., 2017)	Not detected in the present
Case management (Wallace et al., 2021)	X
Home visits (Wallace et al., 2021)	X Home visits offered for some patients within traveling range
Community Education (Wallace et al., 2021)	Not detected in the present

Discussion of Present Study's Limitations and Strengths

Findings from Daisy Clinic add additional perspective to the body of research contributing to late life suicide prevention, specifically how some professionals recognize and respond to late life suicide risk in a team-based, family medicine setting. A major strength of this study is the perspective of how team collaboration may contribute to recognition and response to late life suicide risk. This study also provides a rich and thick description of a single case of primary care that treats older adults. This was done through the practice of spending an extended period on site engaging with participants and collecting multiple forms of data. The researcher triangulated data by considering all sources of data that supported emerging themes, which was noted in findings. The present study is also one of few studies to address (1) how a primary care practice addresses the issue of late life suicide risk, (2) what specific skills clinicians draw on to address this risk, (3) important factors to consider in late life suicide risk prevention and (4) the role of team collaboration without isolating participants to one discipline. Another strength of this study is that the researcher is a former healthcare social worker and was able to easily assimilate to the study site and could bypass explanations about common terms, enabling the professionals to focus on their experiences in the limited time together. The researcher's experience contributed to their understanding of the issue, knowing enough about the healthcare system that they could visualize a study that took place in a health care facility before joining it.

However, every study has a balance of strengths and limitations and there is no perfect study. There may be bias in the data collected because although the researcher was an outsider to the organization, the researcher may have been treated more like an insider as participants were informed of the researcher's healthcare experience with older adults. While the researcher could have been at risk of "going native," the researcher controlled this by spending no more time on

site than was needed to collect data (Padget, 2017). On the other hand, the researcher's experience of healthcare prevents them really being able to compare their experience with going in as someone without this experience, and it would have been hard to detect either way.

Another potential limitation is that behavioral health clinicians were overrepresented in the study compared to non-behavioral health care staff, constituting four out of a total eight participants. This could have placed greater weight on perspectives more common to work in behavioral health, knowledge of evidence-based practices, or clinical skills. Since half of the sample already were practicing as behavioral health professionals, this knowledge might be different than findings of the entire clinic or more medical staff. On the other hand, the remaining staff in the study had a diverse array of positions in the organization and included a broad spectrum of roles at Daisy Clinic including nursing, medicine, and care coordination.

With this study being limited by the constraints of time, evidence might have been more strongly triangulated with patient data. However, this was not possible to collect in the time frame of this study. The downside of this is that the researcher could not verify the staff reports with actual documented practice or compare it with patient experiences. Furthermore, feasibility prevented the researcher from using more than one site for this case study to make comparisons. With more time, studying the remaining family practice centers at this organization would have made for more convincing evidence of findings to conduct a multi-site case study.

Present Study's Implications for Social Work Practice, Research, and Leadership

Areas of Future Research

If money or time were no object, it would be most ideal to replicate this study at Daisy Clinic's sister centers in the organization to make comparisons and investigate discrepancies. This would allow for more information about differences between sites which could offer insight

into the specific site context and compare skills and tools clinicians are using to prevent late life suicide. Additionally, similar studies in the future could include quota sampling to get a higher representation of different disciplines and avoid having behavioral health dominate the sample. In addition, it would be ideal to get a larger sample to be able to increase confidence that findings are relevant to other similar healthcare settings.

The present study's findings about screening practices suggest that more research is needed in this area. Christensen et al. (2023) reported practices that providers have, but studies are needed that confirm reports with actual practice verified in the medical record. There is a difference between an organizational policy, ideal practice, and actual practice that is being done consistently. This information would have important implications for barriers to completing screening and could make contributions to improved practice if better described. The present study did not offer insight as to how this information is tracked. More research is needed around patients with whom clinicians have difficulty engaging despite being skilled in this area. This might have important implications for working with people who are reluctant to engage with PCPs and healthcare overall, specifically older adult men who are particularly at risk of suicide. Two of the staff included in this study mentioned this as an area that could be better understood. Lastly, this study does not include any perspectives about people who do not seek healthcare services. There is already a bias present in that the staff could only talk about patients who come to the clinic at some point. There are very likely to be other people who are not seeking medical care, do not have access to it, or lack the ability to reach out because they do not have the social support needed to facilitate this. More research is needed about late life suicide targeting other healthcare areas like hospitals, nursing facilities, or other acute care and long-term facilities. This was noted in the literature and by participants but was not the focus of this study.

The literature has identified that older men have a high prevalence of suicide (De Leo, 2022) and that they may be more at risk of health problems if experiencing social disconnect ((Frausing et al.; 2020; Valtorta et al., 2017). Lastly, the present study included commentary that older men may be harder to engage in healthcare services. This remains a concern where this group is not only at high risk but potentially not engaging with resources for prevention, and if they are, may be disengaged from conversations about mental health as Medical Doctor, Arden described about his encounters with this segment of the population. More research is needed about this group and these concerns.

An interesting finding of this study suggested that behavioral health clinicians value the flexibility that their clinical skills give them in being able to have open-ended conversations with people. This is useful to know but also highlights the fact that staff without training in clinical skills might not feel as confident and could rely solely on the use of screening tools. While screening tools are not perfect, they offer a reasonable option to staff who may not be able to fall back on clinical training skills. It would be useful to know more about these specific skills that clinicians are using, what kinds of open-ended conversations they are having. This could have useful implications for suicide prevention in practice and better inform intervention studies.

In the absence of time constraints, a longitudinal study including actual outcomes with patients and practices would be useful to eventually study more to contribute to an understanding of cause and effect. This study did not assess professionals' knowledge of the issue of late life suicide, and in fact those who felt that they did not know much about it might have self-selected and not participated. In fact, one person opted out of the study because they believed they did not have enough knowledge about the topic. Future research should attempt to gain a wider range of perspectives regardless of knowledge about late life suicide as a subject.

Additionally, it remains difficult to truly know the scope of this issue, as discussed in the review of literature. Many deaths by suicide might be excluded from the literature as it is difficult to define a death by suicide unless it was completed in an active way that can be detected (such as with a gun) (Richards, 2017). There is a philosophical disagreement among individuals and diverse cultures about what really constitutes suicide, especially in late life. This makes it difficult to determine if passive suicide, like refusing nutrition and hydration or medication would be suicidal behavior or merely understandable conscious decision-making around end-of-life matters. This is subjective and dependent on the individual. One might consider this a right to die while another considers it suicide (Freedenthal, 2018).

Implications for Late Life Suicide Prevention Practices in Primary Care

This section outlined the major implications of the present study and potential implications for suicide prevention practices in primary care settings.

- (1) ***Team-based care for late life overall health.*** The usefulness of team-based care was of benefit to Daisy Clinic staff, and they perceived it as a useful resource that makes it more seamless to work in this environment and provide patient care. Furthermore, medical complexity especially unaddressed is a risk factor in the literature and as discussed by Daisy Clinic staff (Steele et al., 2018).
- (2) ***Successful engagement with others in healthcare environments.*** The ability to achieve contact with others in primary care settings was underscored as an important skill, but since it is two sided, more studies are needed to define this phenomenon. Future research would be useful to determine what qualities and skills are specifically being described.
- (3) ***Warm handoffs.*** Clinicians should practice warm handoffs because they are evidence-based, and this study provided several descriptions (Zero Suicide, 2022; AAFP, 2019).

- (4) ***Age-related bias.*** Healthcare settings need to address potential bias of information being centered around suicide in younger groups, which was described by medical provider, Arden, and discussed in the literature (São José et al., 2019).
- (5) ***Isolation and loneliness.*** The present study found evidence of issues that have already been discussed in the literature as a major health concern for older adults, and especially men (Frausing et al.; 2020; Valtorta et al., 2017). Isolation and loneliness emerged as being important for older adults to have meaningful relationships but also have people for support, which is supported in the literature (Frausing et al.; 2020; Valtorta et al., 2017). Interventions targeting loneliness and isolation might have positive implications for mental health and suicide risk in late life and would be likely to have benefits such as improvement of quality of life.
- (6) ***Late life suicide risk for older men.*** The present study findings suggested that staff found this group to be especially difficult to engage in mental health (Conejero, 2018). More research is needed to address how late life suicide risk may be prevented with men specifically.
- (7) ***Be a safe space.*** Freedenthal (2018) has reminded scholars that people cannot be reduced to risk factors because most people will still not die by suicide. Instead, Freedenthal (2018) urged clinicians to hold a presence that patients can engage with and trust. Daisy Clinic staff understood this in their description of engagement and equanimity. They understood that patients were unlikely to come to them if they did not feel like they could talk openly. Daisy Clinic staff also emphasize the use of clinical skills and presence outside of what can be offered in a screening tool with a checklist. Marson (2019) has also suggested that healthcare settings may favor quantitative screening tools, but that

open-ended conversations with older patients could have important implications for preventing suicide in late life. Like Behavioral health clinician, Barlow, Marson (2019) recommended collecting a variety of data on patients to look at the big picture, as Barlow referred to multiple data points.

(8) *Are screening tools less important than the person administering it?* The use of risk assessment for suicide prevention is frequently recommended (Zero Suicide, 2022) but some critiques have suggested this might be for lack of a better idea (Heisel & Duberstein, 2016). The practice of risk assessment is limited by the facts that (1) we cannot operationalize suicide risk with certainty, (2) there may be lack of evidence that suicide risk assessments predict suicide, and (3) suicide is distinct from suicidal ideation and associated diagnoses (Heisel & Duberstein, 2016). The risk assessment may be less important than if it is being done in the context of a trusting relationship. Simon (2011) suggested that no scale is an adequate substitute for a thorough clinical assessment. Freedenthal (2018) urged that standardized scales should be used with caution and that clinicians should search for warning signs, which are more acute than risk factors, which tend to be long-standing (Rudd, 2014).

Conclusion: Teamwork Makes the Dreamwork

On the other hand, if a healthcare setting is already busy, changing or adding processes could be unrealistic. Staff talked about issues of time constraints and the emphasis on seeing more patients in a day. It may not be feasible to implement all the best practices. Further complicating this is the healthcare shortage and aftermath of the COVID-19 pandemic, as expressed by Behavioral Health Clinician, Charlotte, “We all feel it.” IPEC is proposed as not just an ideal practice that has positive outcomes for patients, but it is something that offers hope

to a system that is overburdened and recovering from the emotional impact of a pandemic. IPEC (2023) suggested that individuals of healthcare systems can accomplish more when they collaborate, and this starts at the top of the system. This has important implications for leadership, policy, education, and direct practice in primary care settings. Students need to learn IPEC, so they are prepared to practice in this manner. Education should be lead with interprofessional faculty, and educators should have knowledge of the skills for collaboration. Preventing late life suicide risk is a complex issue to which there is no one answer and many different drivers of risk for a group that is already likely to be facing chronic conditions and loss. However, Daisy Clinic demonstrated how a team does and can work together to care for patients, to work toward better access to healthcare services, and to serve as a safety net for people in their community. The present study, if nothing else, serves as a description of the way that Daisy Clinic provides behavioral health services in a way that reduces barriers, increases access to patients, and practices evidence-based methods of late life suicide prevention.

REFERENCES

- Aberdeen, T. (2013). Yin, RK (2009). Case study research: Design and methods. Thousand Oaks, CA: Sage. *The Canadian Journal of Action Research*, 14(1), 69-71.
- Adler, R. H. (2022). Trustworthiness in Qualitative Research. *Journal of Human Lactation*. 38(4):598-602. doi:[10.1177/08903344221116620](https://doi.org/10.1177/08903344221116620)
- Administration for Community Living (ACL). (2021, May). Profile of older Americans. ACL Administration for Community Living. Retrieved February 18, 2023, from <https://acl.gov/aging-and-disability-in-america/data-and-research/profile-older-americans>
- Agency for Healthcare Research and Quality. (2019). Data Overview. Medical Expenditure Panel Survey background. Retrieved March 7, 2023, from https://meps.ahrq.gov/mepsweb/communication/household_participant_back.jsp
- Agha, L., Frandsen, B., & Rebitzer, J. B. (2019). Fragmented division of labor and healthcare costs: Evidence from moves across regions. *Journal of Public Economics*, 169, 144-159.
- Ahmedani, B. K., Simon, G. E., Stewart, C., Beck, A., Waitzfelder, B. E., Rossom, R., & Solberg, L. I. (2014). Health care contacts in the year before suicide death. *Journal of General Internal Medicine*, 29, 870-877.
- American Academy of Family Physicians. (2019, December 12). Primary care. AAFP Home. Retrieved June 5, 2022, from <https://www.aafp.org/about/policies/all/primary-care.html#:~:text=Primary%20care%20is%20the%20provision,context%20of%20family%20and%20community.>
- Aminzadeh, F., & Dalziel, W. B. (2002). Older adults in the emergency department: a systematic review of patterns of use, adverse outcomes, and effectiveness of interventions. *Annals of Emergency Medicine*, 39(3), 238-247.

- Alexopoulos, G. S., Reynolds, C. F., 3rd, Bruce, M. L., Katz, I. R., Raue, P. J., Mulsant, B. H., Oslin, D. W., Ten Have, T., & PROSPECT Group (2009). Reducing suicidal ideation and depression in older primary care patients: 24-month outcomes of the PROSPECT study. *The American Journal of Psychiatry*, *166*(8), 882–890.
<https://doi.org/10.1176/appi.ajp.2009.08121779>
- Anderson B. R. (2016). Improving health care by embracing Systems Theory. *The Journal of Thoracic and Cardiovascular Surgery*, *152*(2), 593–594.
<https://doi.org/10.1016/j.jtcvs.2016.03.029>
- Austin, M., Brody, R. & Packard, T. (2009). *Managing the Challenges in Human Service Organizations: A Casebook*. SAGE Publications, Inc.
<https://doi.org/10.4135/9781452274805>
- Ball, E. (2018). (Order No. 10751740). Available from ProQuest Dissertations & Theses Global; Publicly <http://pitt.idm.oclc.org/login?url=https://www.proquest.com/dissertations-theses/ageism-social-work-education-factor-shortage/docview/2036363775/se-2>
- Barth, R. P., Messing, J. T., Shanks, T. R., Williams, J. H. (2022). *Grand Challenges for Social Work and Society*. Oxford University Press.
<https://doi.org/10.1093/oso/9780197608043.001.0001>
- Bardach, S. H., & Rowles, G. D. (2012). Geriatric education in the health professions: Are we making progress? *The Gerontologist*, *52*(5), 607–618. <https://doi.org/10.1093/geront/gns006>
- Bee, H. L. (1996). *The journey of adulthood*. Helen L. Bee. Xix.
- Ben-Harush, A., Shiovitz-Ezra, S., Doron, I., Alon, S., Leibovitz, A., Golander, H., Ayalon, L. (2017). Ageism among physicians, nurses, and social workers: Findings from a

qualitative study. *European Journal of Ageing*, 14(1), 39-48. Doi:

<https://doi.org/10.1007/s10433-016-0389-9>

Benek-Higgins, M., McReynolds, C. J., Hogan, E., & Savickas, S. (2008). Depression and the elder person: The enigma of misconceptions, stigma, and treatment. *Journal of Mental Health Counseling*, 30(4), 283–296. <https://doi.org/10.17744/mehc.30.4.5176q06311813715>

Bonnewyn, A., Shah, A., & Demyttenaere, K. (2009). Suicidality and suicide in older people. *Reviews in Clinical Gerontology*, 19(4), 271-294.
doi:10.1017/S0959259809990347

Bruce, M. L., & Pearson, J. L. (1999). Designing an intervention to prevent suicide: PROSPECT (prevention of suicide in primary care elderly: collaborative trial). *Dialogues in Clinical Neuroscience*, 1(2), 100-112.

Britton, P. C., Patrick, H., Wenzel, A., & Williams, G. C. (2011). Integrating motivational interviewing and self-determination theory with cognitive behavioral therapy to prevent suicide. *Cognitive and Behavioral Practice*, 18(1), 16-27.

Britz, J. B., Huffstetler, A. N., Brooks, E. M., Richards, A., Sabo, R. T., Webel, B. K., & Krist, A. H. (2024). Increased Organizational Stress in Primary Care: Understanding the Impact of the COVID-19 Pandemic, Medicaid Expansion, and Practice Ownership. *The Journal of the American Board of Family Medicine*, 36(6), 892-904.

Bryan, C. J., Allen, M. H., Thomsen, C. J., May, A. M., Baker, J. C., Bryan, A. O., Harris, J. A., Cunningham, C. A., Taylor, K. B., Wine, M. D., Young, J., Williams, S., White, K., Smith, L., Lawson, W. C., Hope, T., Russell, W., Hinkson, K. D., Cheney, T., & Arne, K. (2021). Improving Suicide Risk Screening to Identify the Highest Risk Patients:

- Results from the PRImary Care Screening Methods (PRISM) Study. *Annals of Family Medicine*, 19(6), 492–498. <https://doi.org/10.1370/afm.2729>
- Boyce, C., & Neale, P. (2006). *Conducting in-depth interviews: A guide for designing and conducting in-depth interviews for evaluation input (Vol. 2)*. Watertown, MA: Pathfinder International.
- Burke, B., & Harrison, P. (1998). Anti-oppressive practice. *Social Work: Themes, Issues and Critical Debates*, 229-239.
- Capps, R., Fix, M., Bachmeier, J. D., & Van Hook, J. (2022, June 27). A demographic, socioeconomic, and health coverage profile of unauthorized immigrants in the United States. *Migrationpolicy.org*. Retrieved February 18, 2023, from <https://www.migrationpolicy.org/research/demographic-socioeconomic-and-health-coverage-profile-unauthorized-immigrants-united-states>
- Carter, S. M., & Little, M. (2007). Justifying Knowledge, Justifying Method, Taking Action: Epistemologies, Methodologies, and Methods in Qualitative Research. *Qualitative Health Research*, 17(10), 1316–1328. <https://doi.org/10.1177/1049732307306927>
- Centers for Disease Control and Prevention (CDC). (2022). Facts about suicide. *Suicide prevention*. Retrieved June 5, 2022, from <https://www.cdc.gov/suicide/facts/index.html>.
- Child, J. (2015). *Organization: Contemporary principles and practice*. John Wiley & Sons, Incorporated.
- Chrisler, J. C., Barney, A., & Palatino, B. (2016). Ageism can be hazardous to women's health: Ageism, sexism, and stereotypes of older women in the healthcare system. *Journal of Social Issues*, 72(1), 86-104. Doi:<https://doi.org/10.1111/josi.12157>

Christensen, M., Fontanella, C. A., Campo, J. V., & Culp, S. L. (2023). How can social workers facilitate suicide prevention in primary care? Findings from a national survey of primary care physicians. *Social Work in Health Care*, 62(2-4), 107–120.

<https://doi.org/10.1080/00981389.2023.2193227>

Chen, Y. Y., Cai, Z., Chang, Q., Canetto, S. S., & Yip, P. S. (2021). Caregiving as suicide-prevention: an ecological 20-country study of the association between men's family carework, unemployment, and suicide. *Social psychiatry and psychiatric epidemiology*, 56, 2185-2198.

Centers for Disease Control and Prevention (CDC). (2022, June 27). Health Insurance Portability and Accountability Act of 1996 (HIPAA). Public Health Professionals Gateway.

<https://www.cdc.gov/phlp/publications/topic/hipaa.html#privacy-rule>

Chervoni-Knapp T. (2022). The Staffing Shortage Pandemic. *Journal of radiology nursing*, 41(2), 74–75. <https://doi.org/10.1016/j.jradnu.2022.02.007>

Collier, S. (2020, May 27). Collaborative care: Treating mental illnesses in primary care. Harvard Health. <https://www.health.harvard.edu/blog/collaborative-care-treating-mental-illnesses-in-primary-care2020052719918#:~:text=This%20model%20of%20care%20is%20time-limited%2C%20generally%20six,12%20weeks%2C%20followed%20by%20three%20monthly%20maintenance%20sessions.>

Conejero, I., Olié, E., Courtet, P., & Calati, R. (2018). Suicide in older adults: current perspectives. *Clinical Interventions in Aging*, 13, 691–699.

Cooper, H. E., Camic, P. M., Long, D. L., Panter, A. T., Rindskopf, D. E., & Sher, K. J. (2012). *APA Handbook of research methods in psychology, Vol 2: Research designs:*

Quantitative, qualitative, neuropsychological, and biological (pp. x-701). American Psychological Association.

Cowles, L. A. (2003). *Social Work in the Health Field: A Care Perspective, Second Edition: Vol. 2nd ed.* Routledge.

Creswell, J. & Poth, C. (2018). *Qualitative Inquiry & research design: choosing among the five approaches (4th ed).* Sage.

Crosby, A., Gfroerer, J., Han, B., Ortega, L., & Parks, S. E. (2011). Suicidal thoughts and behaviors among adults aged >_18 Years--United States, 2008-2009. Retrieved May 8, 2023 from <https://www.cdc.gov/mmwr/preview/mmwrhtml/ss6013a1.htm>

D'Amour, D., Ferrada-Videla, M., San Martin Rodriguez, L., & Beaulieu, M.-D. (2005). The conceptual basis for interprofessional collaboration: Core concepts and theoretical frameworks. *Journal of Interprofessional Care*, 19, 116–131.
<https://doi.org/10.1080/13561820500082529>

De Leo, D. (2022). Late-life suicide in an aging world. *Nature aging*, 2(1), 7-12.

De Leo D., Draper, B., Snowdon, J., Kolves, K., (2013). Suicides in older adults: A case control psychological autopsy study in Australia. *Journal of Psychiatric Research*, 47: pp. 980-988. [10.1080/13607863.2015.1078282](https://doi.org/10.1080/13607863.2015.1078282). Epub 2015 Aug 25. PMID: 26305860.
[doi:10.1001/jama.2014.16394](https://doi.org/10.1001/jama.2014.16394)

De Mendonça Lima, C. A., De Leo, D., Ivbijaro, G., & Svab, I. (2021). Suicide prevention in older adults. *Asia-Pacific Psychiatry*, 13(3), 1–12. <https://doi.org/10.1111/appy.12473>

Department of Human Services (DHS). (2022). Life (Living Independence for the Elderly). Department of Human Services. Retrieved February 17, 2023, from <https://www.dhs.pa.gov/Services/Disabilities-Aging/Pages/LIFE.aspx>

- Durkheim, E. (1897). *Suicide: A study in sociology*. London: Routledge & K. Paul.
- Dybicz, P. (2015). From person-in-environment to strengths: The promise of postmodern practice. *Journal of Social Work Education, 51*(2), 237–249.
- Educational Policy and Accreditation Standards (EPAS). (2022). 2022 EPAS educational policy and accreditation standards - CSWE. Educational Policy and Accreditation Standards. <https://www.cswe.org/getmedia/94471c42-13b8-493b-9041-b30f48533d64/2022-EPAS.pdf>
- Ehlman, D. C., Yard, E., Stone, D. M., Jones, C. M., Mack, K. A. (2022). Changes in Suicide Rates — United States, 2019 and 2020. *MMWR Morb Mortal Wkly Rep 71*:306–312. DOI: <http://dx.doi.org/10.15585/mmwr.mm7108a5external icon>
- Farrer, L., Marinetti, C., Cavaco, Y. K., & Costongs, C. (2015). Advocacy for health equity: A synthesis review. *Milbank Quarterly, 93*, 392–437. doi:10.1111/1468-0009.12112
- Farrow, R., Iniesto, F., Weller, M., & Pitt, R. (2020, June 8). Interpretivism. *Research Methods Handbook*. <https://open.library.okstate.edu/gognresearchmethods/chapter/interpretivism/>
- Fiske A. & O’Riley A. (2016). Toward an understanding of late-life suicidal behavior: The role of lifespan developmental theory. *Aging Mental Health, 20*(2):123-30. Doi: 10.1080/13607863.2015.1078282. Epub 2015 Aug 25. PMID: 26305860. doi:10.1001/jama.2014.16394
- Fiske, A., Wetherell, J. L., & Gatz, M. (2009). Depression in older adults. *Annual Review of Clinical Psychology, 5*, 363-389.
- Fraser, M., Lombardi, B., Wu, S., Zerden, L. D., Richman, E., & Fraher, E. (2016). Social work in integrated primary care: a systematic review. University of North Carolina, Chapel

Hill: *Carolina health workforce research center, the Cecil G. Sheps Center for Health Serv Res.*

Fulmer, T., Reuben, D. B., Auerbach, J., Fick, D. M., Galambos, C., & Johnson, K. S. (2021). Actualizing Better Health and Health Care for Older Adults: Commentary describes six vital directions to improve the care and quality of life for all older Americans. *Health Affairs*, 40(2), 219-225.

Frausing, K. P., Smærup, M., Larsen, P. L., Maibom, K., Juel, K., & Munk, K. P. (2022). Health and health-care utilisation in old age: the case of older men living alone. *Ageing and Society*, 42(6), 1252–1279. doi:10.1017/S0144686X20001439

Gage, N. (1989). The Paradigm Wars and Their Aftermath: A “Historical” Sketch of Research on Teaching Since 1989. *Educational Researcher*, 18(7), 4–10.

<https://doi.org/10.3102/0013189X018007004>

Gamliel, E. & Levi-Belz, Y. (2016). To end life or to save a life: Ageism moderates the effect of message framing on attitudes towards older adults’ suicide. *International Psychogeriatrics*, 28(8), 1383–1390. <https://doi.org/10.1017/S1041610216000636>

Guest, G., Namey, E., Chen, M. (2020). A simple method to assess and report thematic saturation in qualitative research. *PLoS ONE* 15(5): e0232076.

<https://doi.org/10.1371/journal.pone.0232076>

Giguère, A., Zomahoun, H. T. V., Carmichael, P. H., Uwizeye, C. B., Légaré, F., Grimshaw, J. M., Gagnon, M. P., Auguste, D. U., & Massougbody, J. (2020). Printed educational materials: effects on professional practice and healthcare outcomes. *The Cochrane Database of Systematic Reviews*, 8(8), CD004398.

<https://doi.org/10.1002/14651858.CD004398.pub4>

- Greene, R., Wright, M., Herring, M., Dubus, N., & Wright, T. (2019). *Human Behavior Theory and Social Work Practice with Marginalized Oppressed Populations*. Routledge.
- Hasnain, M., Gruss, V., Keehn, M., Peterson, E., Valenta, A. L., & Kottorp, A. (2017). Development and validation of a tool to assess self-efficacy for competence in interprofessional collaborative practice. *Journal of Interprofessional Care, 31*(2), 255-262.
- Hashim, M. J. (2016). Principles of family medicine and general practice - defining the five core values of the specialty. *Journal of Primary Health Care, 8*(4), 283–287.
<https://doi.org/10.1071/HC16006>
- Havens, D. H., & Boroughs, L. (2000). “To err is human”: a report from the Institute of Medicine. *Journal of Pediatric Health Care, 14*(2), 77-80.
- Heisel, M. J., & Duberstein, P. R. (2016). Working sensitively and effectively to reduce suicide risk among older adults: A humanistic approach. *The Oxford Handbook of Behavioral Emergencies and Crises, 335-359*.
- Hessel, F. (2008). Burden of Disease. In: Kirch, W. (eds) *Encyclopedia of Public Health*. Springer, Dordrecht. https://doi.org/10.1007/978-1-4020-5614-7_297
- Hing, E., Cherry, D. K., & Woodwell, B. A. (2006). National ambulatory medical care survey: 2004 summary. Advance data from vital and health statistics; 374. Hyattsville, MD: National Center for Health Statistics. [[PubMed](#)]
- Hernandez, S. C., Overholser, J. C., Philips, K. L., Lavacot, J., & Stockmeier, C. A. (2021). Suicide among older adults: Interactions among key risk factors. *International Journal of Psychiatry in Medicine, 56*(6), 408–421. <https://doi.org/10.1177/0091217420982387>
- Holt-Lunstad, J., Smith, T. B., Baker, M., Harris, T., & Stephenson, D. (2015). Loneliness and

social isolation as risk factors for mortality: a meta-analytic review. *Perspectives on Psychological Science*, 10(2), 227-237.

Holley, K., Karri, A. & Harris, M. S. (2019). *The qualitative dissertation in education: A guide for integrating research and practice*. Routledge.

Health Resources and Services Administration (HRSA, 2024.). HRSA Map Tool.

Data.HRSA.gov. Retrieved March 11, 2024, from <https://data.hrsa.gov/maps/map-tool/>

Health Resources and Services Administration (HRSA) (2023, November 1). What is shortage designation? Retrieved March 11, 2024, from <https://bhw.hrsa.gov/workforce-shortage-areas/shortagedesignation#:~:text=What%20is%20a%20Medically%20Underserved,.organizations%20or%20community%20health%20centers>

Iachini, A. L., Bronstein, L. R., & Mellin, E. (2018). *A guide for interprofessional collaboration*. CSWE Press.

Interprofessional Education and Collaboration (IPEC) (2010). What is interprofessional education? Retrieved March 8, 2024, from <https://www.ipecollaborative.org/about-us>

Interprofessional Education Collaborative. (2023). *IPEC Core Competencies for Interprofessional Collaborative Practice: Version 3*. Washington, DC: Interprofessional Education Collaborative.

Ivbijaro, G., Mendonça Lima, C. A., De Leo, D., & Svab, I. (2021). Suicide prevention in older adults. *Asia-Pacific Psychiatry*, 13(3). <https://doi.org/10.1111/appy.12473>
<https://aspe.hhs.gov/reports/community-dwelling-older-adults-dementia-their-caregivers-key-indicators-national-health-aging-0>

- Jacobs C., Brieler, J. A., Salas J., Betancourt, R. M., Cronholm, P. F. (2018). Integrated Behavioral Health Care in Family Medicine Residencies: A CERA Survey. *Fam Med*. 50(5):380–384. <https://doi.org/10.22454/FamMed.2018.639260>.
- Johnson, J. L., Adkins, D., & Chauvin, S. (2020). A Review of the Quality Indicators of Rigor in Qualitative Research. *American Journal of Pharmaceutical Education*, 84(1), 7120. <https://doi.org/10.5688/ajpe7120>
- Joiner, T. (2005). Why people die by suicide. Harvard University Press.
- Kleinman, T. C. Pellmar, & S. K. Goldsmith. (2002). Reducing Suicide: A National Imperative. National Academies Press.
- Karlsson, J., Hammar, L. M., & Kerstis, B. (2021). Capturing the Unsaid: Nurses' Experiences of Identifying Mental Ill-Health in Older Men in Primary Care—A Qualitative Study of Narratives. *Nursing Reports*, 11(1), 152–163. MDPI AG. Retrieved from <http://dx.doi.org/10.3390/nursrep11010015>
- Ketel, C., Hedges, J. P., Smith, J. P., Hopkins, L. W., Pfieffer, M. L., Kyle, E., Raman, R., Pilon, B. (2021). Suicide detection and treatment in a nurse-led, interprofessional primary care practice: A 2-year report of quality data. *The Nurse Practitioner* 46(4) DOI: 10.1097/01.NPR.0000737208.68560.b8
- Kim, S., Lee, H. K., & Lee, K. (2021). Which PHQ-9 items can effectively screen for suicide? Machine learning approaches. *International Journal of Environmental Research and Public Health*, 18(7), 3339.
- Kotsani, M., Kravvariti, E., Avgerinou, C., Panagiotakis, S., Bograkou Tzanetakou, K., Antoniadou, E., Karamanof, G., Karampeazis, A., Koutsouri, A., Panagiotopoulou, K., Soulis, G., Stolakis, K., Georgiopoulos, I., & Benetos, A. (2021). The Relevance and

- Added Value of Geriatric Medicine (GM): Introducing GM to Non-Geriatricians. *Journal of Clinical Medicine*, 10(14), 3018. <https://doi.org/10.3390/jcm10143018>
- Kühl, S. (2013). *Organizations: A systems approach*. Taylor & Francis Group.
- Szelényi, I. (2011, April 12). Durkheim and Social Facts. Internet Archives. Retrieved March 8, 2024, from https://archive.org/details/podcast_foundations-modern-social-t_25-durkheim-social-facts_1000093014319
- Kroenke K, Spitzer RL, Williams JB. The PHQ-9: validity of a brief depression severity measure. *J Gen Intern Med*. 2001; 16:606-13.
- Kroenke, K., Spitzer, R. L., Williams, J. B. (2003). The Patient Health Questionnaire-2: Validity of a Two-Item Depression Screener. *Medical Care*, 41:1284-92.
- Kroenke, K., & Spitzer, R. L. (2002). The PHQ-9: A new depression diagnostic and severity measure. *Psychiatric Annals*, 32(9), 509–515. <https://doi.org/10.3928/0048-5713-20020901-06>
- La Guardia, A. C., Wright-Berryman, J., Cramer, R. J., Kaniuka, A. R., & Tufts, K. A. (2022). Interprofessional Suicide Prevention Education. *Crisis*, 43(6), 531–538. <https://doi.org/10.1027/0227-5910/a000813>
- Laflamme, L., Vaez, M., Lundin, K., & Sengoelge, M. (2022). Prevention of suicidal behavior in older people: A systematic review of reviews. *PloS ONE*, 17(1), 1–14. <https://doi.org/10.1371/journal.pone.0262889>
- Lebrasseur A., Fortin-Bédard N., Lettre J., Raymond E., Bussièrès E. L., Lapierre N., Faieta J., Vincent C., Duchesne L., Ouellet M. C., Gagnon E., Tourigny A., Lamontagne M. È., Routhier F. (2021). Impact of the COVID-19 Pandemic on Older Adults: Rapid Review. *JMIR Aging*, 4(2): doi: 10.2196/26474. PMID: 33720839; PMCID: PMC8043147.

- Lesser, S., Zakharkin, S., Louie, C., Escobedo, M. R., Whyte, J., & Fulmer, T. (2022). Clinician knowledge and behaviors related to the 4Ms framework of Age-Friendly Health Systems. *Journal of the American Geriatrics Society, 70*(3), 789–800.
- Lin, V. W., Lin, J., & Zhang, X. (2016). U.S. social worker workforce report card: Forecasting nationwide shortages. *Social Work, 61*(1), 7. Doi:<https://doi.org/10.1093/sw/swv047>
- Luoma, J. B., Martin, C. E., & Pearson, J. L. (2002). Contact with mental health and primary care providers before suicide: a review of the evidence. *The American Journal of Psychiatry, 159*(6), 909–916. <https://doi.org/10.1176/appi.ajp.159.6.909>
- Luker, K. (2008). *Salsa Dancing into the Social Sciences: Research in an Age of Info-glut*. Harvard University Press.
- Lundahl, B., Howey, W., Dilanchian, A., Garcia, M. J., Patin, K., Moleni, K., & Burke, B. (2024). Addressing Suicide Risk: A Systematic Review of Motivational Interviewing Infused Interventions. *Research on Social Work Practice, 34*(2), 158-168. <https://doi.org/10.1177/10497315231163500>
- Marson, S. M. (2019). *Elder suicide: Durkheim's vision*. NASW Press.
- Marson, S. M., & Lillis, J. P. (2019). Durkheim's greatest blunder. *J. Soc. & Soc. Welfare, 46*, 155.
- Mann, J. J., Michel, C. A., & Auerbach, R. P. (2021). Improving suicide prevention through evidence-based strategies: A Systematic Review. *American Journal of Psychiatry, 178*(7), 611–624. <https://doi.org/10.1176/appi.ajp.2020.20060864>
- McLaren, S., Castillo, P., Tindle, R., Corboy, D., Klein, B., & Burmeister, O. (2022). Suicide risk among older adults: The moderating role of hope. *Clinical Gerontologist, 1–15*. Advance online publication. <https://doi.org/10.1080/07317115.2022.2039827>

- Morgan, S. J., Pullon, S. R., Macdonald, L. M., McKinlay, E. M., & Gray, B. V. (2017). Case study observational research: A framework for conducting case study research where observation data are the focus. *Qualitative Health Research, 27*(7), 1060-1068.
- Miles, R. (2015). Complexity, representation and practice: Case study as method and methodology. *Issues in Educational Research, 25*(3), 309.
- Miller, E. M., Porter, J. E., & Barbagallo, M. S. (2023). Simplifying Qualitative Case Study Research Methodology: A Step-By-Step Guide Using a Palliative Care Example. *Qualitative Report, 28*(8).
- McCrae, N., Murray, J., Banerjee, S., Huxley, P., Bhugra, D., Tylee, A., & Macdonald, A. (2005). 'They're all depressed, aren't they?' A qualitative study of social care workers and depression in older adults. *Aging & Mental Health, 9*(6), 508-516.
- Medical Expenditure Panel Survey Background. Agency for Healthcare Research and Quality. https://meps.ahrq.gov/mepsweb/communication/household_participant_back.jsp. Accessed July 7, 2020.
- Meiboom, A.A., de Vries, H., Hertogh, C.M. et al. Why medical students do not choose a career in geriatrics: a systematic review. *BMC Med Educ, 15*, 101 (2015). <https://doi.org/10.1186/s12909-015-0384-4>
- Merriam, S. B. (2016). *Qualitative research: A guide to design and implementation*. Sharan B. Merriam, Elizabeth J. Tisdell. Jossey-Bass, a Wiley Brand.
- Merrick, J. (2006). Suicide and politics pre-revolutionary France. *Eighteenth-Century Life 30*(2), 32–47.
- Mezuk B., Rock A., Lohman M. C. and Choi M. (2014), Suicide risk in long-term care facilities:

a systematic review, *Int J Geriatr Psychiatry*, 29, pp. 1198–1211, doi:

[10.1002/gps.4142](https://doi.org/10.1002/gps.4142)

Miller, E. M., Porter, J. E., & Barbagallo, M. S. (2023). Simplifying Qualitative Case Study Research Methodology: A Step-By-Step Guide Using a Palliative Care Example. *Qualitative Report*, 28(8), 2363–2379. <https://doi.org/10.46743/2160-3715/2023.6478>

Mitchell, P. H, Wynia M., Golden R., et al. (2012). Core Principles & Values of Effective Team-Based Health Care. Discussion Paper. Washington, DC: Institute of Medicine; 2012. www.iom.edu/tbc.

Morgenstern H. (2008). Ecological studies. In: Modern Epidemiology. 3rd Edition. Editors: Rothman, Greenland, Lash. Lippincott Williams and Wilkins.

Mueller, A. S., Abrutyn, S., Pescosolido, B., & Diefendorf, S. (2021). The social roots of suicide: Theorizing how the external social world matters to suicide and suicide prevention. *Frontiers in Psychology*, 12, 763.

Mulder, R., Newton-Howes, G., & Coid, J. W. (2016). The futility of risk prediction in psychiatry. *The British Journal of Psychiatry*, 209(4), 271-272.

National Association of Social Workers. (2023). Read the Code of Ethics. NASW, National Association of Social Workers. Retrieved April 29, 2023, from <https://www.socialworkers.org/About/Ethics/Code-of-Ethics/Code-of-Ethics-English#principles>

Niles-Yokum, & Wagner, D. L. (2019). The aging networks: a guide to policy, programs, and services / Kelly Niles-Yokum, Donna L. Wagner. (Ninth edition.). Springer Publishing Company, LLC.

- National Association for Social Workers (NASW) (2021). Eighteen Organizations Express Support for the Collaborate in an Orderly and Cohesive Manner (COCM) Act. Retrieved March 10, 2024, from <https://www.socialworkers.org/News/News-Releases/ID/2357/Eighteen-Organizations-Express-Support-for-the-Collaborate-in-an-Orderly-and-Cohesive-Manner-COCM-Act>
- National Institute of Mental Health. (2020). Suicide. Retrieved March 9, 2023, from <https://www.nimh.nih.gov/health/statistics/suicide#:~:text=The%20total%20age%2Dadjusted%20suicide,13.5%20per%20100%2C000%20in%202020.>
- Nelson, T. D. (2016). Promoting healthy aging by confronting ageism. *American Psychologist*, 71(4), 276–282. <https://doi.org/10.1037/a0040221>
- O'Connor, C. & Joffe, H. (2020). Intercoder reliability in qualitative research: Debates and practical guidelines. *International Journal of Qualitative Methods*, pp. 19, 1–13.
- O'Gurek, D. T., & Henke, C. (2018). A Practical Approach to Screening for Social Determinants of Health. *Family Practice Management*, 25(3), 7–12.
- O'Neill, A. (2022, June 21). France: Life expectancy 1765-2020. Statista. Retrieved April 27, 2023, from <https://www.statista.com/statistics/1041105/life-expectancy-france-all-time/>
- Oyama, H., & Sakashita, T. (2016). Long-term effects of a screening intervention for depression on suicide rates among Japanese community-dwelling older adults. *The American Journal of Geriatric Psychiatry*, 24(4), 287–296. <https://doi.org/10.1016/j.jagp.2015.10.008>
- Padgett, D.K. (2016). *Qualitative methods in social work research* (3rd ed.). Thousand Oaks, CA: Sage Publications.
- Pai, M., & Kaufman, J. S. (n.d.) Case studies of bias in real life epidemiologic studies. Retrieved

April 15, 2023, from chrome extension://efaidnbmnnnibpcajpcgglefindmkaj/https://
www.teachepi.org/wpcontent/uploads/OldTE/documents/courses/bfiles/

The%20B%20Files_File3_Durkheim_Final_Complete.pdf

- Parker, C., Scott, S. and Geddes, A. (2019). Snowball Sampling. SAGE Research Methods Foundations. doi:10.4135/
- Perry, S. W., Rainey, J. C., Allison, S., Bastiampillai, T., Wong, M. L., Licinio, J., & Wilcox, H. C. (2022). Achieving health equity in US suicides: a narrative review and commentary. *BMC Public Health*, 22(1), 1360.
- Petterson, S., Wilkinson, E., Kessler, A.C., Stone, C., Bazemore, A. (2018). The State of Primary Care Physician Workforce. Washington, D.C.: The Robert Graham Center, 2018.
- Petriceks, A. H., Olivas, J. C., Srivastava, S. (2018). Trends in geriatrics graduate medical education programs and positions, 2001 to 2018. *Gerontology Geriatric Medicine*; 4:2333721418777659.
- Peyre, H. M. (2023, April 11). Émile Durkheim. Encyclopedia Britannica.
<https://www.britannica.com/biography/Emile-Durkheim>
- Pirkis, J. A., Gunnell, D., Appleby L., Morrissey J. (2020). Trends in suicide during the covid-19 pandemic. *BMJ* 371:m4352 doi:10.1136/bmj.m4352
- Piña, I. L., Cohen, P. D., Larson, D. B., Marion, L. N., Sills, M. R., Solberg, L. I., & Zerzan, J. (2015). A framework for describing health care delivery organizations and systems. *American Journal of Public Health*, 105(4), 670-679.
- Raue, P. J., Ghesquiere, A. R., & Bruce, M. L. (2014). Suicide Risk in Primary Care: Identification and Management in Older Adults. *Current Psychiatry Reports*, 16(9), 1–8.

- Phelan, E., Williams, B., Meeker, K., Bonn, K., Frederick, J., LoGerfo, J., & Snowden, M. (2010). A study of the diagnostic accuracy of the PHQ-9 in primary care elderly. *BMC Family Practice, 11*, 1-9.
- Richards, N. (2017). Old age rational suicide. *Sociology compass, 11*(3), e12456.
- Richards, J. E., Simon, G. E., Boggs, J. M., Beidas, R., Yarborough, B. J. H., Coleman, K. J., & Ahmedani, B. K. (2021). An implementation evaluation of “Zero Suicide” using normalization process theory to support high-quality care for patients at risk of suicide. *Implementation Research and Practice, 2*, 26334895211011769.
- Rogers, A. T. (2022). *Human Behavior in the Social Environment: Perspectives on Development and the Life Course*. Routledge.
- Rosenbaum, A. J., Rozenman, M., Wiblin., J, Zeltzer, L. (2015) Integrated Medical-Behavioral Care Compared with Usual Primary Care for Child and Adolescent Behavioral Health: A Meta-analysis. *JAMA Pediatr. 169*(10):929–937. doi:10.1001/jamapediatrics.2015.1141
- Rudd, M. D. (2014). Core competencies, warning signs, and a framework for suicide risk assessment in clinical practice. *The Oxford Handbook of Suicide and Self-Injury*, 323-336.
- Ryan, F., Coughlan, M., & Cronin, P. (2009). Interviewing in qualitative research: The one-to-one interview. *International Journal of Therapy and Rehabilitation, 16*(6), 309–314.
- Sandelowski M. J. (2008). Justifying qualitative research. *Research in nursing & health, 31*(3), 193–195. <https://doi.org/10.1002/nur.20272>
- Santo-Novak, D. A., Duncan, J. W., Grissom, K. R., & Powers, R. E. (2001). MSHAKE: A tool for measuring staff knowledge related to geriatric mental health. *Journal of Gerontological Nursing, 27*(2), 29-35.

- São José, J. M. S., Amado, C. A. F., Ilinca, S., Buttigieg, S. C., & Taghizadeh Larsson, A. (2019). Ageism in Health Care: A Systematic Review of Operational Definitions and Inductive Conceptualizations. *Gerontologist*, *59*(2), e98–e108.
- Santoni, G., Angleman, S., Welmer, A.-K., Mangialasche, F., Marengoni, A., & Fratiglioni, L. (2015). Age-Related Variation in Health Status after Age 60. *PloS ONE*, *10*(3), 1–10. <https://doi.org/10.1371/journal.pone.0120077>
- Scheufele E., Rajmane, A., Dankwa-Mullan, I., Rhee, K. (2020). The State of Primary Care in the United States: A Chartbook of Facts and Statistics. October 2020
- Selvin, H. C. (1958). Durkheim's suicide and problems of empirical research. *American Journal of Sociology*, *63*(6), 607-619.
- Shah, A. (2010). The possible evidence for an epidemiological transition hypothesis for elderly suicides. *International Psychogeriatrics*, *22*(2), 219–226.
- Sharp, L. K., & Lipsky, M. S. (2002). Screening for depression across the lifespan: a review of measures for use in primary care settings. *American Family Physician*, *66*(6), 1001.
- Sinclar, L. (2023, May 23) The Evolving Importance of Interprofessional Education for Collaborative Healthcare [IPEC 2023 Keynote Address]. Interprofessional Education and Collaboration Institute May 2023. Online.
- Sinyor, M., Tan, L. P. L., Schaffer, A., Gallagher, D., and Shulman, K. (2016) Suicide in the oldest old: an observational study and cluster analysis. *Int J Geriatr Psychiatry*, *31*: 33 – 40. Doi: [10.1002/gps.4286](https://doi.org/10.1002/gps.4286).
- Social Determinants of Health. Primary Care Development Corporation. (2019, August 2). Retrieved March 7, 2023, from <https://www.pcdc.org/what-we-do/performance-improvement/hip/social-determinants-of-health/> creative=631394531744&keyword

=social+determinants+of+health+examples&
 matchtype=e&network=g&device=c&gclid=EA1aIQobChMI363V8bHK_QIVS
 smUCR3T7QH_EAAYAiAAEgKiHvD_BwE

Steele, I. H., Thrower, N., Noroian, P., & Saleh, F. M. (2018). Understanding Suicide Across the Lifespan: A United States Perspective of Suicide Risk Factors, Assessment & Management. <https://doi.org/10.1111/1556-4029.13519>

Stene-Larsen, K., & Reneflot, A. (2019). Contact with primary and mental health care prior to suicide: A systematic review of the literature from 2000 to 2017. *Scandinavian Journal of Public Health*, 47(1), 9-17.

Suicide Prevention Resource Center. (2014, September). Suicide Screening and Assessment. Waltham, MA: Education Development Center, Inc.

Suicide Prevention Resource Center. (2020). Topics and terms. Suicide Prevention Resource Center. Retrieved April 27, 2023, from <https://sprc.org/topics-and-terms/>

Sullivan, M., Kiovsy, R. D., Mason, D. J., Hill, C. D., & Dukes, C. (2015). Interprofessional collaboration and education. *AJN The American Journal of Nursing*, 115(3), 47-54.

Szmukler, G., & Rose, N. (2013). Risk assessment in mental health care: Values and costs. *Behavioral Sciences & The Law*, 31(1), 125-140.

Tadic, V., Ashcroft, R., Brown, J. B., & Dahrouge, S. (2020). The role of social workers in interprofessional primary healthcare teams. *Healthcare Policy*, 16(1), 27.

Team-Based Competencies: Building a Shared Foundation for Education and Clinical Practice. (2011).

Turecki, G., Brent, D.A., Gunnell, D. et al. Suicide and suicide risk. *Nat Rev Dis Primers* 5, 74 (2019). <https://doi.org/10.1038/s41572-019-0121-0>

- Trautman, D. E. & Deal-Williams, V. R. (2023, May 22). Advancing IPE for collaborative practice. [PowerPoint Slides]. IPEC Collaborative. Retrieved May 27, 2023, from <https://ipcollaborative.mobilize.io/main/groups/37057/lounge/resources>
- Uncapher, H., & Areán, P. A. (2000). Physicians are less willing to treat suicidal ideation in older patients. *Journal of the American Geriatrics Society*, 48(2), 188–192. <https://doi.org/10.1111/j.1532-5415.2000.tb03910.x>
- University of Southern California (USC) Libraries. (2024). Research guides: Organizing your Social Sciences Research Assignments: Writing a case study. Writing a Case Study - Organizing Your Social Sciences Research Assignments - Research Guides at University of Southern California. <https://libguides.usc.edu/writingguide/assignments/casestudy>
- U.S. Department of Health and Human Services. (n.d.). Ask suicide-screening questions (ASQ) toolkit. National Institute of Mental Health. <https://www.nimh.nih.gov/research/research-conducted-at-nimh/asq-toolkit-materials>
- U.S. Census Bureau (2022). American Community Survey 1-year estimates. Retrieved from Census Reporter Profile page for [REMOVED FOR CONFIDENTIALITY]
- U.S. Census Bureau. (2020, October 8). 65 and older population grows rapidly as baby boomers age. Census.gov. Retrieved February 20, 2023, from <https://www.census.gov/newsroom/press-releases/2020/65-older-population-grows.html>
- U.S. Census Bureau. (2021). American Community Survey. U.S. Census Bureau. Retrieved April 29, 2023, from <https://data.census.gov/table?q=population%2Bby%2Bage>
- Valtorta, N. K., Kanaan, M., Gilbody, S., Ronzi, S., & Hanratty, B. (2016). Loneliness and social isolation as risk factors for coronary heart disease and stroke: systematic review and meta-analysis of longitudinal observational studies. *Heart*, 102(13), 1009-1016.

- Valtorta, N., Collingridge, D. M., Barron, L., Stow, D., and Hanratty, B. (2018). Older adults' social relationships and health care utilization: A systematic review. *American Journal of Public Health* 108, e1_e10, <https://doi.org/10.2105/AJPH.2017.304256>
- Vannoy, S. D., Ming Tai-Seale, Duberstein, P., Eaton, L. J., Cook, M. A., & Tai-Seale, M. (2011). Now what should I do? Primary care physicians' responses to older adults expressing thoughts of suicide. *JGIM: Journal of General Internal Medicine*, 26(9), 1005–1011. <https://doi.org/10.1007/s11606-011-1726-5>
- Von Bertalanffy, L. (1972). The history and status of general systems theory. *Academy of Management Journal*, 15(4), 407-426.
- Walby, F. A., Myhre, M. Ø., & Kildahl, A. T. (2018). Contact with mental health services prior to suicide: a systematic review and meta-analysis. *Psychiatric Services*, 69(7), 751-759.
- Wallace, M., Miller, V. J., Fields, N. L., Xu, L., & Mercado-Sierra, M. A. (2021). Empirically Evaluated Suicide Prevention Program Approaches for Older Adults: A Review of the Literature from 2009-2021. *Journal of Gerontological Social Work*, 64(5), 480–498.
- Watt, D. (2007). On becoming a qualitative researcher: the value of reflexivity. *Qualitative Report*, 12(1), 82-101.
- Welch, B. (2022). Healthcare Worker Shortages and Potential Solutions. *Journal of Medical Practice Management*, 38(1), 5–6.
- White, K. R. (2019). *The well-managed healthcare organization* / Kenneth R. White, John R. Griffith. Health Administration Press.
- Willis J., Antono B., Bazemore A., Jetty A., Petterson S., George J., Rosario, B. L., Scheufele E., Rajmane A., Dankwa-Mullan I., Rhee K. 2020. The State of Primary Care in the United States: A Chartbook of Facts and Statistics. Retrieved from:

<https://www.grahamcenter.org/content/dam/rgc/Apublicationsreports/reports/PrimaryCareChartbook2021.pdf>

- Winiiecki, D. J. (2010). Rational, natural, and open: Organizational system typologies and their relevance for performance improvement professionals. *Performance Improvement*, 49(5), 35-41.
- Wittink, M. N., Levandowski, B. A., Funderburk, J. S., Chelenza, M., Wood, J. R., & Pigeon, W. R. (2020). Team-based suicide prevention: lessons learned from early adopters of collaborative care. *Journal of Interprofessional Care*, 34(3), 400-406.
- World Health Organization (WHO, 2021). Suicide worldwide in 2019: Global health estimates. Retrieved March 10, 2024, from <https://iris.who.int/bitstream/handle/10665/341728/9789240026643-eng.pdf?sequence=1>.
- World Health Organization (WHO, 2010). Framework for action on interprofessional education and collaborative practice (No. WHO/HRH/HPN/10.3). World Health Organization.
- World Health Organization (WHO, 2018). Global Health Observatory
- World Health Organization (WHO). Global Health Observatory Data Repository—Suicide Rate Estimates, Crude, 10-Year Age Groups. Estimates by Country <https://apps.who.int/gho/data/node.main.MHSUICIDE10YEARAGEGROUPS?lang=en>
- Worth, M. J. (2021). *Nonprofit management: principles and practice*. Los Angeles.
- Yanez, D. (2018). *Lived Experience: Aftercare That Makes a Difference*. Best Practices Zero Suicide. <https://zerosuicide.edc.org/toolkit/transition/best-practices>
- Yoshimasu, K., Kiyohara, C., and Miyashita, K. (2008) Suicidal risk factors and completed suicide: Meta-analyses based on psychological autopsy studies. *Environ Health Prev Med* 13, 243–256 (2008). <https://doi.org/10.1007/s12199-008-0037-x>

Yin, R. K. (2018). *Case study research and applications* (Vol. 6). Thousand Oaks, CA: Sage.

Yin, R. K., Clarke, C., Cotner, B., & Lee, R. (2012). Case study methods. In *Handbook of complementary methods in education research* (pp. 111-122). Routledge.

Zero Suicide (2022). *Best practices ensuring safe care transitions*. Retrieved March 21, 2024, from <https://zerosuicide.edc.org/toolkit/transition/best-practices>

Zimmerman-Clayton, E. (2022). *I'm not afraid of your answer: Primary care perspectives of older adult suicidality*. [Unpublished manuscript].

Zonneveld, N., Driessen, N., Stüssgen, R. A. J., & Minkman, M. M. N. (2018). Values of Integrated Care: A Systematic Review. *International Journal of Integrated Care*, 18(4), 9. <https://doi.org/10.5334/ijic.4172>

APPENDIX A

Recruitment Documents

Study Summary used for Networking via Email

Seeking:

At least one primary healthcare practice that:

- Utilizes a collaborative care model for behavioral health (providers who work directly with a behavioral health team in the primary care setting).
- Sees at least some people who are 65 and older as patients.

Purpose: This study will be conducted as part of a doctoral dissertation. The goal is to conduct a case study of at least one primary care site by collecting multiple forms of data. This will include conducting in-depth interview(s), collection of organizational materials and educational literature, and conducting on-site non-patient observations.

Recruitment: Once a site is recruited, all professionals of the site will be invited to participate in the study. As many people as possible will be recruited within the site. Participants will be asked to refer others within the practice who might be willing to participate.

Research Question: How does one primary care practice recognize and respond to late life suicide risk? *By conducting a case study I hope to capture the practices in place at one primary care setting as related to the research question. In doing this, I want to collect multiple forms of data what will inform the following:*

- *What formal tools (screening, assessments, etc) are used*
- *How professional knowledge and insight is used*
- *The role that collaborative care plays*
- *What do professionals think is important to know about preventing late life suicide risk?*

Why? Older adults 65 and older have the highest rate of suicide of any age group. Also, most people who die by suicide have made contact with primary care in the last year before their death, and many of these people have been older adults. Studies I read suggest efforts should be directed to primary healthcare settings but they face barriers like conflicting guidelines, limited time and resources, staff shortages and increasing caseloads. Studies suggest that use of the collaborative care model is indicated to address some of these barriers and meet patient needs.

Recruitment flyer used to recruit participants within study site

Seeking Study Participants: Recognition and Response to Late Life Suicide Risk in Primary Care

Who can Participate? Anyone who is employed by the site and is at least 18 years or older is invited to participate. Recruitment will be done using snowball sampling, otherwise known as a referral chain. Interviewees will recommend other people on site for the researcher to speak with, and so on. The researcher will conduct as many interviews as possible within the time frame of September-December of 2023.

Participation: Involves completion of a brief demographics questionnaire and in-depth interview(s) lasting from 20-60 minutes on average where audio is recorded. The researcher will also request copies of organizational materials intended for staff or patients that are referenced in the interview. Lastly, non-participant observations will be made by the researcher in common areas in the site or of staff lasting 20-60 minutes per observation session on average. The researcher will also ask if you have others in mind from the site that might be interested in participating.

Purpose: To conduct a qualitative case study of how one primary care practice recognizes and responds to late life suicide risk. A case study involves collection of multiple forms of data to inform the study.

Specific research questions include:

- What are staff impressions of the presence and importance of social context risk factors when working with older adult patients?
- What knowledge, skills, and tools are used by staff, including those that are tangible and invisible in addressing the phenomenon?
- What is the role of team collaboration in the decision-making process of how and when an older adult is considered to be at risk of suicide?

Risks and Benefits:

- Potential risks are informational and psychological and estimated to be minimal for this study. Informational risks refer to potential risk of data breach involved with use of online storage of data. Psychological risks refer to those associated with discussing a particularly sensitive topic during the interview (late life suicide).
- No monetary compensation will be provided for this study. Some participants may experience the benefit of positive feelings from contributing to research, and by contributing to their field. The information of the study could be of potential benefit by helping to inform practices of suicide risk assessment and prevention practices

Who is the Researcher and How to Contact: Elizabeth Zimmerman-Clayton, LCSW (she/her) is a licensed clinical social worker with experience working with older adults, mental health, and healthcare settings. She also teaches for the Master's of Social Work program for the University of Pittsburgh. She is conducting this study as her dissertation for the Doctor of Social Work program with Millersville University. Please direct any questions to ekzimmer@millersville.edu

APPENDIX B

IRB Approval Letter

Administrator Initial Review

co-Chair 1 Suggested Review

Exempt

co-Chair Initial Review

co-Chair Suggested Review

Administrator summary notes and review assignment

This section is to be completed only after the two initial reviews are completed.

Final Level of Review (exempt, etc)

Administrator Approval

Exempt

Approved with no revisions

Exempt Notes & Required Revisions

Investigator is required to provide documentation of study site approval to the IRB prior to commencing any further aspect of the study.

Millersville Protocol Information

Millersville University IRB Protocol Submission Form

MU IT is not responsible for the maintenance of this system.

QUESTIONS? CONTACT [JEFFRY PORTER](#)

The Human Subjects Review Protocol form for all researchers must be submitted and approved by the IRB before implementing the project. Additional information regarding Informed Consent can be found [HERE](#).

Information on [Federal guidelines regulating human subjects research](#), the [ethical considerations regarding human subjects research](#), [definitions of human subjects research](#), [kinds of IRB review](#) and [other information](#) can be found by following the included links. If you have not completed CITI training, please do so as soon as possible. If you are unsure whether or not your research will require IRB review, please use this [flow chart](#) to help inform your decision. If you have any questions regarding the need for IRB review, this form or the review process, please contact Rene Munoz, Director, Sponsored Programs by phone at 717.871.4457 or by email at rene.munoz@millersville.edu. Additional help for completing this form can be found [HERE](#)

To complete this form you will need to have .pdf copies of the following documents:

1. [Informed consent](#)
2. Assent form (if necessary)
3. Any surveys or other instruments
4. Any advertisements or other recruitment tools (e.g. copies of recruitment emails)
5. [CITI Training completion certificate](#)

You will have the opportunity to save and resume your work.

If you have received IRB approval from another institution to conduct research at Millersville, please complete this form and upload a copy of the IRB protocol submitted to and approved by your home institution. No other uploads will be needed.

All uploads MUST be in PDF format or you will be unable to submit successfully

A NOTE REGARDING EMAIL

Millersville students (undergraduate and graduate) submitting an IRB protocol will receive all IRB/Protocol related communications at their millersville.edu email address. Using your University email address will ensure that email messages are delivered and are secure. Email messages sent from the MU IRB will originate from "Kuali Notifications no-reply@mail.kualibuild.com"

I am a:

MU Doctoral Student

Is this a:

New Protocol

Principal Investigator Information

Student Name

Elizabeth Zimmerman-Clayton

Graduate Program of Study

Doctor of Social Work - Leadership and Education

MU Faculty Mentor/ MU Faculty Sponsor

Laura Granruth

MU Faculty Mentor/ MU Faculty Sponsor

laura.granruth@millersville.edu

Have you completed CITI training?

Yes

Please upload your CITI Certificate

[citiCompletionCertificate_10398294_44566109.pdf](#)

Do you have a co-Investigator?

No

Project Summary

Protocol Title

How does one primary care practice recognize and respond to late life suicide risk?

Protocol Abstract

People who are 65 years of age and older have the highest rate of suicide of any other age group in the United States (Conejero et al., 2018; Laflamme et al., 2022; National Institute of Mental Health, 2020). According to Luoma et al. (2002) 77% of older adults who died by suicide had also made contact with their primary health care provider in the last year before their death. Christensen et al. (2023) found that some primary care providers are implementing universal suicide screening, but that a large portion still do not. Interprofessional education and collaboration (IPEC) has received attention for its emphasis on teamwork between medical providers in healthcare settings because professionals face barriers of time and resources, and inability to tackle every issue on their own (Bruce & Pearson, 2022). IPEC has also been linked with improved patient outcomes (Sinclair, 2023). A specific model that falls within the scope of IPEC is collaborative care (CC), which is a partnership between providers and behavioral health staff. CC has been recommended for late life in particular as it is associated with reduced suicidal ideation (Collier, 2020). **The purpose of this study is to explore how one primary care practice recognizes and responds to late life suicide risk using a qualitative case study.**

Project Start Date

Project End Date

September 6, 2023

December 29, 2023

Does your proposed project meet the Federal Definition of Research?

Yes

Is your proposed project exempt, or will it require expedited or full review?

Exempt

Exemption Justification

This research protocol involves no greater than minimal risk and meets criteria of exemption category #2

1. The information is being recorded in a way that the identity of the human subjects cannot readily be discovered (See privacy and confidentiality section)
2. Any potential disclosure of the subjects' responses would not reasonably place the subjects at risk as outlined in *MU Levels of Human Subjects Research*
3. The sample does not include participants in at-risk categories and all participate voluntarily (See eligibility)
4. Participant names will only be recorded on informed consent forms, which will be stored separately from the raw data, transcriptions, and analysis.

Will your study use Previously Collected (Secondary) Data.

No

Project Detail

Project Background and Purpose

Study Purpose

1. What are staff impressions of the presence and importance of social context risk factors as framed by Marson (2019) when working with older adult patients?
2. What knowledge, skills, and tools are used by staff, including those that are tangible and invisible in addressing the phenomenon?
3. What is the role of team collaboration in the decision-making process of how and when an older adult is considered to be at risk of suicide?

Describe in detail the study design and all procedures.

1. The researcher networked within their professional community to locate potential sites that would also be feasible to use for a case study. This was done by providing a brief summary of the study topic via MU email (See Recruitment documents attached). This led the researcher to connect with a key informant, the Director of Behavioral Health for a primary care organization that is interested in participating as the study site pending IRB approval (See letter of interest attached).
2. Individual participants of the study site will be recruited using snowball sampling, beginning with the key informant (See recruitment document).
3. Individual participants will participate in a brief demographics survey via Qualtrics, and an audio recorded semi-structured, in-depth interview (see interview protocol attached). The interviews will either take place on-site or on zoom, lasting an average of 20-60 minutes.
4. As many participants as possible will be recruited until saturation is reached (Padget, 2017).
5. As a means of triangulating data, the researcher will request copies of any archives referenced in the interview. Some examples might include: patient or staff educational documents, blank screening tools, handbooks, pamphlets displayed on-site, flyers, and materials publicly available online. Archives will be collected in the form of physical documents, photographs of documents, and screenshots of documents available online.
6. Participants will be offered the opportunity for member checking, which is the chance to review the transcripts of their interviews as a means of enhancing trustworthiness of data (Padget, 2017).
7. The researcher will make on-site observations as a non-participant observer. These will be done for an average of 20-60 minutes per observation and will continue until saturation (Padget, 2017). Observations will include the waiting room, parking lot, immediate location of the physical building, staff breakroom, other areas on-site designated for staff only. Some observations will also be made virtually as some team meetings take place via Microsoft teams. Observations will be described using a template from Poth & Creswell (2018) where objective and subjective information will be kept separately from impressions and memos (see observations notes template attached).
8. Memoing will be used throughout the study as a means to document thoughts and impressions of potential emerging themes (Padgett, 2017).
9. Raw data will be collected in the Millersville University software OneDrive, Zoom, and Qualtrics.
10. Interview audio will be transcribed with any identifying information omitted. All data will be uploaded to NVivo for analysis. Data will be coded for themes and content analysis (Padget, 2017). Data analysis will take place concurrently with data collection as is the practice in a case study (Stake, 1995). Use of intercoder reliability will be used to check for consistencies in coding to enhance trustworthiness of findings (Padget, 2017).
11. Post-study, the researcher will offer to return to the site and present the findings of the study to staff.

Describe any alternatives to participation in the study which might be advantageous to the subject.

N/A

Identify the nature of any information to be purposely withheld from subjects, and provide justification for the nondisclosure.

No information will be withheld from the participants. They will be aware of the study's purpose and the research questions. They will also be full informed on the researcher's role as a student in the Doctor of Social Work program at Millersville University.

Describe any monetary or other forms of compensation which will be provided to subjects, and any conditions which must be fulfilled to receive compensation.

No compensation will be provided to the participants. Potential benefits include positive feelings associated with contributing to research and sharing their personal perspective.

Describe in detail how confidentiality and privacy will be maintained

The researcher will keep confidential the identity of all participants and identifying information will not be released. Specific measures have been taken to protect the identity of individuals who participate by:

1. Choosing to only record audio of interviews to protect the participants' identity
2. Asking participants not to use identifying information in the interview
3. Cropping or blurring any identifying information on archives prior to uploading an electronic copy of them to MU OneDrive. Archives will be copied through the use of the researcher's phone and uploaded to MU OneDrive before deleting it from the phone locally. If paper copies of archives are also collected, they will also be electronically duplicated and the paper copies will be shredded.
4. All raw data and analysis will be stored separately from informed consents so that they are not connected to one another in the event of a data breach.
5. Raw data will be recorded to secure software through MU and NVivo which use encryption and firewalls.
6. The researcher will be the only one with access to the data and their personal computer which will be used to collect the data to MU OneDrive. This computer also uses facial recognition technology.
7. The researcher will request the use of a private space with a door for in-depth interviews conducted on site. For interviews done via zoom, participants will be encouraged to consider their surroundings, images, or sounds that could appear on screen for their own privacy. They will also be encouraged to participate in a space that is private with a door, and to use headphones.
8. Interviews or observations conducted virtually will be done in a private space with a door with the use of headphones.
9. All data will be retained for at least 3 years according to federal regulation, after which it will be deleted.

Please attach a copy of any surveys, questionnaires, instruments, etc. that will be used to collect data

[Interview protocol.pdf](#)

Characteristics of the Participant Population, Risk and Consent

Description of participant population

Participants are any staff members employed by the study site.

Estimated no. of participants

As many as possible will be recruited with snowball sampling until saturation (Padgett, 2018).

Participant Exclusion Criteria

Anyone who

- Is under 18 years old
- Does not work for the study site organization

Will sex or gender be used as an exclusion criteria?

No

What is the subjects age range and why was this range chosen?

Participants must be at least 18 years and older according to the IRB definition of vulnerable persons. The exact range of ages of the site is not yet known and will not be asked as part of the study.

Please attach a copy of any advertisements, the text of any emails, etc. that will be used to recruit subjects

[Recruiting Documents .pdf](#)

Please list any potential risks. Specify types and levels of risk.

Potential risks are informational and psychological and estimated to be minimal for this study. Informational risks refer to potential risk of data breach. Psychological risks refer to those associated with discussing a particularly sensitive topic during the interview (late life suicide).

Specify procedures for preventing or minimizing any risks.

To minimize informational risk:

1. Data will be collected and stored through secure software hosted by Millersville University with the use of firewalls, encryption, and two step authorization. This includes the use of Zoom, Qualtrics, and MU OneDrive. NVivo software will also be used to analyze data, which uses secure storage and encryption to protect data.
2. The researcher is the only one with access to the data, which will be collected on a personal computer that uses facial recognition technology. The data will not be physically stored on the researcher's computer. Digital images of archives will have specific location image blurred out or cropped and will be deleted locally from the researcher's phone.
3. Raw data will be stored separately from informed consents, and data analysis to further protect the identity of participants in the event of a data breach. Interview files will not contain participant names unless they happen to state first name when speaking. Transcriptions of the interview will be altered to remove any identifying information (related to the individuals or specific study site) before being uploaded to NVivo and MU OneDrive.

To minimize psychological risks:

1. Informed consent attachment includes mental health resources for participants to use in the event that they need to process emotions that arise from participating in the study.

Describe any potential non-monetary benefits of the study, both for subjects and in general.

Some participants may experience the benefit of positive feelings from contributing to research, and by contributing to their field. The information of the study could be of potential benefit by helping to inform practices of suicide risk assessment and prevention practices.

Please attach a copy of your informed consent

Please attach a copy of your minor subject assent
(if necessary)

[Informed Consent 8.13.23.pdf](#)

[Letter of Interest Study.pdf](#)

By signing my name, I agree to provide whatever surveillance is necessary to ensure that the rights and welfare of the human subjects are properly protected. I understand that I cannot initiate any research with human subjects before I have received approval/or complied with all contingencies made in connection with the approval. I understand that as the principal investigator I am ultimately responsible for the welfare and protection of human subjects and will carry out the project as approved.

New Signature

Electronically Signed by Elizabeth K Zimmerman-Clayton (ekzimmer@millersville.edu) - September 10, 2023 at 8:14 PM (UTC)

APPENDIX C

[REDACTED]

To: Elizabeth Zimmerman-Clayton
Millersville University, Doctor of Social Work Candidate

From: [REDACTED] MD Program Director
[REDACTED] Family Medicine Residency

Re: Dissertation Study: *How does one primary care practice recognize and respond to late life suicide risk?*

Dear Elizabeth:

I am granting you permission to include the staff of [REDACTED] Family Medicine Residency in your research study entitled, *How does one primary care practice recognize and respond to late life suicide risk?* which will explore:

- Staff impressions of the presence and importance of social context risk factor when working with older adult patients
- Knowledge, skills, and tools used by staff, including those that are tangible and invisible in addressing late life suicide risk
- The role of team collaboration in the decision-making process of how and when an older adult is considered to be at risk of suicide

It is our understanding that you would like to implement a qualitative case study at a single primary care practice where you will conduct audio recorded, individual in-depth interviews with staff, conduct on-site staff and environmental observations, and collect paper or electronic copies of archives (e.g. Organizational documents for staff/patients such as educational or policy materials, and/or blank forms /screening tools). You have also requested to use space within our facility to conduct your research study. We are granting you permission to conduct research at our facility.

I understand that privacy and confidentiality will be maintained for the participants and the organization. The study will not be associated with the organization and the identity of the organization will be kept private and confidential. I also understand that all staff participants will review an informed consent prior to participating.

Sincerely,

[REDACTED]
[REDACTED] MD Program Director
[REDACTED] Family Medicine Residency
[REDACTED]

APPENDIX D

Millersville University

Consent to be Part of a Research Study

Title of the Project: How does one primary care practice recognize and respond to late life suicide risk in primary care settings?

Principal Investigator: Elizabeth Zimmerman-Clayton,
LCSW, MSW, Millersville University Doctor of Social Work
Student

Faculty Advisor: Laura Granruth, Ph. D, Millersville
University Associate Professor and MSW Program
Coordinator, Social Work Department

Invitation to be Part of a Research Study

You are invited to participate in a research study. In order to participate, you must be

- At least 18 years of age
- A staff member in the primary care study site selected by the researcher
- Are willing and able to participate in an in-depth interview on this topic, where audio will be recorded.
- Taking part in this research project voluntarily.

You **may not** participate in this study if you:

- No longer work for the study site
- Are under 18 years of age

Important Information about the Research Study

Things you should know:

- The purpose of the study is to explore how late life suicide risk is recognized and responded to in primary care settings that use a collaborative care model. If you choose to participate, you will be asked to participate in one interview lasting 20-60 minutes on average. You will also be asked to provide copies of any organizational documents or educational materials that you reference during the interview. Interviews will be scheduled individually with the researcher according to a time that works for both of

you, to be coordinated via the researcher's email (ekzimmer@millersville.edu). This may take place on site at your place of work, or virtually via zoom.

- The audio of the interviews will be recorded, transcribed, and analyzed.
- Risks or discomforts from this research include emotions related to discussing the upsetting topic of late life suicide, and potential risk of using the internet such as data breach and internet security.
- The researcher will also conduct observations in common areas of the study site and collect organizational materials.
- The study will not provide compensation. Subjects may potentially benefit from positive feelings associated with contributing to research and contributing to their profession.
- Taking part in this research project is voluntary. You don't have to participate and you can stop at any time.

Please take time to read this entire form and ask questions before deciding whether to take part in this research project.

This study will be conducted using a qualitative case study of one primary care site that uses collaborative care (which refers to a team that includes a provider and behavioral health staff(s) that collaborate on patient mental health care needs) and also serves at least some older adults as patients. As this is a case study, the aim is to collect rich information about the topic in one setting using multiple forms of information, as detailed below.

Participants of the study will include staff from the primary care site that is recruited. Any staff belonging to the site are invited to participate. The goal is to recruit as many people from the primary care study site as possible. The researcher will also ask you for referrals of other interview participants.

For the purposes of this study, only staff members will be interviewed and involved in the study. The researcher may encounter a patient on site, but they will not be included in data collection. Participants of the study will be asked to reflect on patient cases in a general sense and not speak about refer to identifiable details about patients. If this does happen inadvertently, the researcher will abide by all HIPPA requirements and remove any identifying information from the transcription.

The use of a case study means that multiple forms of data will be collected on site. This will include on-site observations at the study site (primary care practice) in common areas and places that the organization permits such as the parking lot, waiting room lobby, or staff common areas. The researcher will also be collecting archives such as pamphlets, practice policies and procedures, patient education documents, or other posted materials in the practice (such as as flyers, posters, or other materials intended for patients or staff use). The collection of these forms of data will be informed by study participant interviews and recommendations.

What is the study about and why are we doing it?

The purpose of this study is to explore how one primary care practice recognizes and responds to late life suicide risk. The phenomenon will be studied through the use of three questions:

(1) How do teams-based professionals view factors of the social context as being risk factors for late life suicide?

- (2) What knowledge, skills, and tools are used by professionals, including those that are tangible and invisible in addressing the phenomenon?
- (3) What is the role of team collaboration in the decision-making process of how and when an older adult is considered to be at risk of suicide?

What will happen if you take part in this study?

If you agree to take part in this study, you will be asked to participate in a series of semi structured in-depth interviews with pre-written questions to guide the conversation. Interviews will last from 20-60 minutes on average and will be conducted from September- December 2023. Interviews will be scheduled by the researcher via Millersville University email address. The researcher will conduct the interview on site at your place of work in a private space with a door, or via zoom. If the interview should happen via zoom, please be mindful of the location you choose and select a space that is private. Be mindful of images or information that may appear on screen during the interview. It is strongly recommended to use headphones to ensure privacy. In the event that the interview is conducted on zoom, the researcher will be located in a private space with a closed door and use headphones. The audio of the interview will be recorded and later transcribed by the researcher. An example of a question that may be asked is, "What is it like to practice with older adults at [practice site name]?"

The researcher will request copies of any documents referenced in the interview. Some examples might include: patient or staff educational documents, blank screening tools, handbooks, pamphlets displayed on-site, flyers, and materials publicly available online. Archives will be collected in the form of physical documents, photographs of documents, and screenshots of documents available online. Lastly, the researcher will ask you if there are other people from the study site that you believe would be willing to speak about this topic and interested in participating. The researcher will also offer for you to review the transcription of the interview for verification.

How could you benefit from this study?

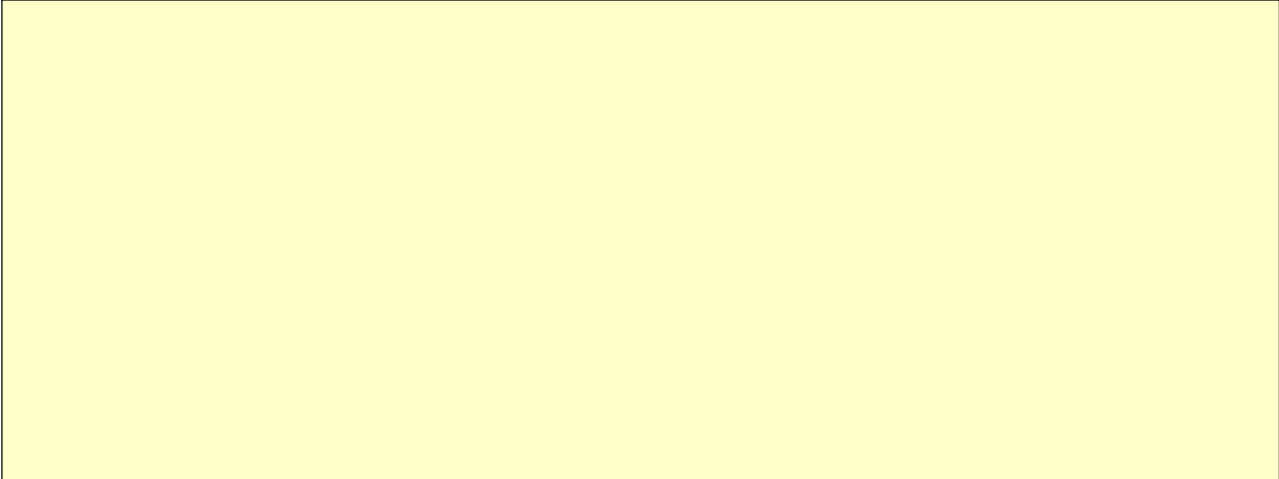
Although you will not directly benefit from being in this study, others might benefit because the information from this study could inform practices of suicide risk assessment and prevention practices. You may also personally benefit from being

in this study if you experience positive feelings from contributing to research.

What risks might result from being in this study?

There are some risks you might experience from being in this study. Primary risks include psychological, or informational risks. Informational risks refer to those involving possible breach of confidentiality. Risk is being minimized through the use of secure software offered through Millersville University (Zoom, OneDrive, and Qualtrics) which require a two step authentication and use encryption and firewalls. Data collected containing identifying information includes informed consent forms, and potentially interviews if you happen to use your first name. This information will be stored separately so that your identify cannot be readily connected to your interview in the event of a breach. Audio-only will be recorded and kept and no video will be recorded and stored to protect your identity.

Psychological risks refer to those associated with discussing a particularly sensitive topic during your interview (late life suicide). This risk will be mitigated by providing subjects with contact information for local counseling resources immediately upon completion of the interview. This information is located in Attachment A, immediately following the signature page.



Data will be collected and stored through secure software hosted by Millersville University with the use of firewalls, encryption, and two step authorization. This includes the use of Zoom, Qualtrics, and MU OneDrive. NVivo software will also be used to analyze data, and is not related to MU, but also uses secure storage and encryption to protect data. The researcher's computer is protected with facial recognition, and the data will not be physically stored on the researcher's computer. There will only be one researcher accessing the data. All photos taken of documents on site using the researcher's smart phone will be uploaded to the MU OneDrive and deleted from the smart phone immediately, and crop out or cover any information that specifically identifies the practice site. Raw data will be stored separately from informed consents, and data analysis to further protect the

identity of participants in the event of a data breach. Information that could directly identify you as a participant will be stored on your informed consent form. Interview files will not contain your name unless you happen to use your first name when speaking. Transcriptions of the interview will be altered to remove any identifying information before being uploaded to NVivo and MU OneDrive.

The results of this study may be published or presented at a scientific meeting. You will receive a separate informed consent in the event that the research would like permission to use the recordings in a presentation or publication.

I will protect the confidentiality of your research records by recording them directly to a secure place (Zoom cloud through Millersville University) storing them in a secure place (Millersville University OneDrive), and using secure software to collect informed consent. Your name and any other information that can directly identify

How will we protect your information?

you will be stored separately from the data collected as part of the project. One limitation to this would be if you happen to use your first and last name in your interview. The audio file will be unaltered, however, identifying information will be removed from the transcription of the interview before uploading to NVivo software for analysis.

It is possible that other people may need to see the information we collect about you. These people work for or are doctoral students at Millersville University and are responsible for making sure the research is done safely and properly. Additionally, the researcher will participate in a peer review with colleagues in the program who will review the transcriptions after all identifying information has been removed.

As a mandated reporter, if you tell me something that makes me believe that you or others have been or may be physically harmed, I may report that information to the appropriate agencies.

What will happen to the information we collect about you after the study is over?

I will save your research data to use for future research or other purposes. Your name and other information that can directly identify you will be kept secure and stored separately from the research data collected as part of the project.

I may share your research data with other investigators without asking for your consent again, but it will not contain information that could directly identify you.

Your Participation in this Study is Voluntary

It is totally up to you to decide to be in this research study. Participating in this study is voluntary. Even if you decide to be part of the study now, you may change your mind and stop at any time. You do not have to answer any questions you do not

want to answer. If you decide to withdraw before this study is completed, the data will be deleted. Your participation in the survey may be terminated without your consent in the event that you would no longer work for the study site.

Contact Information for the Study Team and Questions about the Research

If you have questions about this research, you may contact **Elizabeth Zimmerman-Clayton**, ekzimmer@millersville.edu and **Dr. Laura Granruth**, laura.granruth@millersville.edu.

This study has been approved by the Millersville University of Pennsylvania Institutional Review Board. Dr. René Muñoz, Director of Sponsored Projects and Research Administration, can be contacted with any questions at either 717.871.4146, or at rene.munoz@millersville.edu.

Contact Information for Questions about Your Rights as a Research Participant

If you have questions about your rights as a research participant, or wish to obtain information, ask questions, or discuss any concerns about this study with someone other than the researcher(s), please contact the following:

Millersville University
PO Box 1002
Millersville, PA 17551

Dr. René Muñoz
717.871.4457
mu-irb@millersville.edu

Your Consent

Your Consent:

By signing this document, you are agreeing to be in this study. Make sure you understand what the study is about before you sign. Please print a copy of this document for your records. We will keep a copy with the study records. If you have any questions about the study after you sign this document, you can contact the studyteam using the information provided above.

I understand what the study is about and my questions so far have been answered. I agree to take part in this study.

Printed Subject Name

Signature Date

APPENDIX E

Demographics Survey

Start of Block: Default Question Block

Q1 PLEASE READ FIRST:

Primary care is defined by healthcare.gov as “Health services that cover a range of prevention, wellness, and treatment for common illnesses.” It is a healthcare setting that is often the first point of contact for patients and also services a referral to other needed services within the healthcare system.

Collaborative care refers to a model of care that involves behavioral health staff(s) collaborating with medical providers the manage mental health needs of their patients (Collier, 2020).

Older adults for the purposes of this survey, refer to people who are 65 and older.

READ FIRST: Please answer the following questions about your current primary care place of employment. This survey will use the terms “practice setting,” and “study site” interchangeably to refer to the primary care site you work for. The study will also use the word “practice” to refer to your work with patients and other tasks at the primary care setting where you work.

Q2 Please select one answer below that best describes your professional licensure/training at your current primary care position:

- Medical Doctor (1)
 - Nurse Practitioner (2)
 - Physician's Assistant (3)
 - Registered Nurse (4)
 - Licensed Practical Nurse (5)
 - Certified Nursing Assistant (6)
 - Medical Assistant (7)
 - BASW Social Worker (8)
 - MSW Social Worker (9)
 - Licensed Professional Counselor (10)
 - Other (Please write): (11) _____
-

Q3 On the line below, please write your highest degree earned, any certifications and licensure, and healthcare settings you have practiced (For example: primary care, acute care, long-term care, emergency care...etc).

Q4 How many years have you worked in primary care only (primary care is defined at the top of the survey)?

- Less than 1 year (1)
 - 1-4 years (2)
 - 5-9 years (3)
 - 10-14 years (4)
 - 15- 19 years (5)
 - 20 or more years (6)
-

Q5 Number of years working in the healthcare system overall (all settings including primary care):

- Less than 1 year (1)
 - 1-4 years (2)
 - 5-9 years (3)
 - 10-14 years (4)
 - 15- 19 years (5)
 - 20 or more years (6)
-

Q6 Which of the choices below describes your role in your current primary care setting?

- Full time (As defined by your organization) (1)
 - Part time (As defined by your organization) (2)
 - Casual/per diem (3)
 - Other (Please write): (4) _____
-

Q7 Which of the following best describes the setting that most of the patients reside?

- Rural (2)
 - Urban (3)
 - Suburban (4)
 - None of these: (Explain) (5)

-

Q8 Which of the following best describes the size of your current primary care practice?

- Solo (Practice independently without other clinicians) (1)
 - Small 2-10 providers (2)
 - Medium 11-20 providers (3)
 - Large 51 or more providers (4)
-

Q9 What type of insurance does the majority of your agency's patient population have?

- Primarily (>70%) or exclusively public (Medicare/Medicaid) (2)
 - Primarily (>70%) or exclusively private/commercial (3)
 - A combination of both public and private/commercial (4)
 - I'm not sure (5)
 - Other (Please write): (6) _____
-

Q10 The primary care practice I work in serves patients who are (check all that apply):

- Infants through adolescence (0-17) (1)
 - Young adults (18-39) (2)
 - Middle aged adults (40-64) (3)
 - Older Adults (65 and older) (4)
-

Q11 Which of the following best describes the age group for most of your patients?

- Infants through adolescence (0-17) (1)
 - Young adults (18-39) (2)
 - Middle aged adults (40-64) (3)
 - Older Adults (65 and older) (4)
-

Q12 How often does your practice screen patients for suicide risk?

- Most/Often- Universal screening (1)
 - Case finding- screen with those suspected of suicide risk (2)
 - Rarely screen for suicide (3)
 - I don't know (4)
 - N/A, my role does not screen for suicide at this practice (5)
-

Q13 Who is responsible for completing a suicide risk assessment in your practice setting?

- Nursing (RN, LPN, CNA) (1)
 - Provider (MD, CRNP, PA) (2)
 - Behavioral Health Staff or Social Worker (3)
 - Medical assistant (4)
 - Administrator or Management (5)
 - This task is shared by multiple roles (6)
 - This task is completed with an electronic device (7)
 - There is no specific role that is responsible to complete suicide risk assessment (8)
 - I'm not sure (12)
 - Other: (Please write in): (9)
-

Q14 Part of this study will involve collection of archives (E.g. educational documents for patients, blank screening tools, organizational policy and protocol, educational flyers) and conducting on-site non-patient observations (E.g. common areas like the waiting room, or the parking lot of the practice).

Please share your recommendations for the following:

- Specific archives (and where/how they can be obtained)
- Observation opportunities that you would recommend pertaining to the study topic, or to gaining a better understanding of the practice setting itself:

End of Block: Default Question Block

APPENDIX F

Interview Protocol

Researcher: Thank you so much for being willing to offer your time today. First I am going to review the informed consent that you received and then I will begin recording the interview. (*Review informed consent and ask if there are questions*)

Before we get started, I would like to introduce myself as both a student in the Doctor of Social Work program with Millersville University. I am also a licensed clinical social worker with a background in healthcare, working with older adults. I am sharing this so you know my base knowledge and experience so you can feel free to focus on sharing your experiences rather than defining and explaining common terms.

There are no right or wrong answers in the interview, and my goal is to capture your personal insights and experiences with the topic. You are the expert of your own experience and insight, and that is what I hope to learn more about. I have a set of questions reflecting the information I hope to cover, but if I need some clarification or details on something you mention, I may ask at that point in time. Similarly, please feel free to address anything else that seems important to mention, even if it is not addressed in my questions. Throughout the interview, I will also repeat what I think I am hearing from you to make sure I am understanding you clearly. I will also be taking notes on my computer as we talk. My questions pertain to your work in the primary care setting you currently work in, specifically with older adults. When I reference older adults, I am referring to people aged 65 and older. I also hope to learn more about what it is like to manage mental health needs in a collaborative care model, or team-based practice setting.

This interview will last between 20-60 minutes on average depending on how much you have to share. Since we have limited time, I may prompt you to continue on to the next question so I can gather as much information as possible.

Do you have any other questions before we begin?

The purpose of this study is to explore how one primary care practice recognizes and responds to late life suicide risk. As a person who works at the study site where I am conducting my case study, you are participating in three in-depth interviews to reflect on your experiences with late life suicide risk. For your consideration, these are some specific questions that are guiding the study.

- 1) How do teams-based professionals view factors of the social context as being risk factors for late life suicide?
- 2) What knowledge, skills, and tools are used by professionals, including those that are tangible and invisible in addressing the phenomenon?
- 3) What is the role of team collaboration in the decision-making process of how and when an older adult is considered to be at risk of suicide?

I will use the terms practice setting to describe where you work, and practice to describe the direct work you do on the job with older adults (assessing, treating, monitoring, etc.).

I am going to start the interview now.

Press record!!!!!!!!!!!!!!!!!!!!!!

- Question 1: What is it like to be a [profession name] at [site name]?
 - Prompts: Population served, typical work day, work environment, emotional process, time management, work culture
- Question 2: What is it like to practice with older adult patients at this site?

Prompts: Common issues addressed, follow up, enjoyment

- Question 3: Please describe the process of determining a patient's degree of suicide risk (Begin with how you determine suicide risk and end with outcomes)
 - Prompts: Specific tools/scales/screening/assessments, insight, knowledge, impressions, follow up, emotional process
- Question 4: What is it like to address suicidality with older adult patients?
 - Compared to other age groups, unique aspect, unique issues
- Question 5: How would you describe the issue of late life suicide risk?
- Question 6: When it comes to late life suicide prevention, what factors are most important for primary care professionals to recognize?
- Question 7: What role does teamwork play in managing this issue at your practice setting?
- Question 8: What role does your organization as a whole play in managing late life suicide risk?
 - Leadership, Policies, trainings, clarity, workflows, handbooks
- Question 8: This next question requires some visualization and reflection on past experiences with older adult patients. Imagine that you are seeing an older adult patient, and they have just shared some aspects of their life circumstance that makes you worry they are or will be at risk of suicide. What are some things they could have said that caused your concern?
 - Prompts: Nonverbals (posture, voice, eye contact)
- Question 9: What skills are needed to adequately recognize late life suicide risk?
 - Scales, tools, Interpersonal, communication
- Question 10: Is there anything else about this topic that we missed?
- Closing Reminders:

- You mentioned the following documents throughout the interview. Can you provide me with a copy of these?
- Can you provide the name and email of other people at [site name] that I should speak to about this if they're interested in participating in the study?

Unfortunately it looks like we are almost out of time. Before we end, what other thoughts, if any, do you have on this topic? Do you have any other remaining questions or concerns about the study?

Thank you so much for being part of the interview process. I really appreciate your time. If anything else comes up for you that you need to discuss, please get in touch.

APPENDIX E

Nvivo Codebook

Codes\\Round 2

Name	Description
CONCERNS	This described what professionals at Daisy Clinic said about their experiences working with older adults, including what they listed as warning signs, common issues, and suicide risk factors.
Burden Disease	
Change in baseline	
Mental Health Dx	
Older men	
Positive attributes	
Social Structures	
Spectrum of concern	
Apathetic and resigned	
Existential not suicidal	
In active pain	
CONTACT	CONTACT: The degree to which staff establish reciprocal engagement with patients and colleagues, and are able to practice with equanimity; Crevice's opposite
CLASSIFY	CLASSIFY: Ability to screen, assess, and triage both the patient's current mental health needs, severity, and degree of imminent danger
Protective Barriers	
AUDIT	
DASH	
GAD7	
MSE	
PHQ9	
SAFE-T	
Screening tools	
SODH	
COLLABORATE	Collaborate means: individuals work together in a team, but they also work toward the same goal of patient care. Patient care is a shared job of multiple disciplines or varying skills and experiences. They also collaborate with the patients as part of the team.
CONNECT	CONNECT: Staff ability to recognize the right resource needed for patient care. Involves connection to other on-site disciplines and off-site services.

CONTINUITY	CONTINUITY: Established relationships pave the way for continuity of care; ability to pick up where you left off, monitor, pick up on differences easily
CONTEXT	This describes any contextual data about the study site, immediate region, or macro-level systems. Data about the patient demographics and site numbers are included as well as any basic information about what kind of care the site provides.
INTEG BEH HEALTH	
ON-SITE BHS	
PRIN FAM MED	
Setting	
STAKEHOLDERS	
TEACHING CLINIC	
Precepting	
TEAM BASED NEW	
TEAM COMPONENTS	
Formal Roles	
Skills and Experience	
CREVICE	CREVICE: Anything staff described as blocking contact, collaboration, connection, classification, and continuity; Contact's opposite