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Suicide Assessment Training: The Effect on the Knowledge, Skills, and Attitudes of Mental Health Professionals and Trainees

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Suicide Assessment Training: The Effect on the Knowledge, Skills, and Attitudes
of Mental Health Professionals and Trainees

by
Cynthia Song

Presented to the Faculty of the
Graduate School of Clinical Psychology
George Fox University
in partial fulfillment
of the requirements for the degree of
Doctor of Psychology
in Clinical Psychology

Newberg, Oregon

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Collaborative Assessment and Management of Suicidality training: The effect on the knowledge,
skills, and attitudes of mental health professionals and trainees

Cynthia Song, M.A, J.D.

has been approved


by the

Graduate School of Clinical Psychology

George Fox University

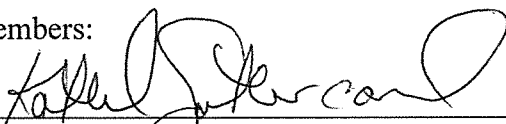
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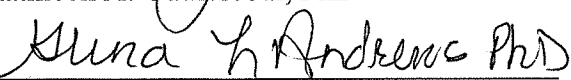


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Suicide Assessment Training: The Effect on the Knowledge, Skills, and Attitudes
of Mental Health Professionals and Trainees

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Abstract

This research will examine the impact of training in the Collaborative Assessment and Management of Suicidality (CAMS), a suicide assessment and intervention protocol, on the knowledge, perceived skills, and confidence for providers at three different levels of training. The trainee groups will include Qualified Mental Health Professionals (County),¹ master's prepared third-year doctoral students on the Behavioral Health Consultation Crisis team (BHCC), and first-year psychology trainees (First-years). The three levels of participants were asked to complete a pre-test prior to and post-test immediately following their respective CAMS training. A 2 X 3 mixed ANOVA was conducted using different participant groups (experience) as the independent variable and knowledge, perceived skills, and confidence pre- and post-training as the second independent variable to examine the within-subjects change in knowledge,

¹ Qualified Mental Health Professionals are defined by the Oregon Administrative Rules (OARs 309-016-0005-59) as licensed medical practitioners that can provide individual, family, and/or group therapy to clients with Medicaid.

perceived skills, and confidence over time and the interaction of the between subjects variable of experience. A follow-up one-way ANOVA and T-TESTS were completed.

For knowledge, all groups improved significantly post-training but the training did not differentially impact the amount of acquired knowledge based on experience. However, for perceived skill, the groups came in with statistically different levels of skills with County more skilled than First-years. There was an overall pre-post improvement for all groups but First-years demonstrated relatively greater improvement in perceived skills. Similar to perceived skills, the three groups came in with different levels of confidence with County higher than First-years. There was a main effect of overall pre-post improvement in confidence with the First-years' confidence increasing significantly more than the other two groups.

Keywords: suicide assessment, training, knowledge, skills, confidence

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Chapter 1

Introduction

Suicide, an Overlooked Epidemic

Suicide is a serious global public health concern. Suicide represents 1.4% of the Global Burden of Disease and accounts for close to half of all violent deaths with almost one million fatalities worldwide each year, which is believed to be an underestimate of the true prevalence (Chehil & Kutcher, 2012). In the U.S., according to the 2015 Center for Disease Control data, suicide is the tenth leading cause of death among Americans, the third leading cause of death for children between the ages 10 and 14, and the second for people between the ages of 15 and 34 years. Every year over a million people attempt suicide in the U.S. and 44,000 completed suicides were recorded in 2015 alone. Each suicide attempt is estimated to intimately affect at least six (Drapeau & McIntosh, 2015) and up to 32 people (Berman, 2011), with conservative estimates leaving a trail of six-million people in its painful aftermath. It is well known that the loss of a loved one to suicide has a long-lasting emotional impact on surviving parents, children, siblings, friends, significant others, and the community at large (Mishara, 1995). Being a survivor of losing a loved one to suicide is an identified risk factor for suicide itself (Centers for Disease Control and Prevention, 2015).

The economic cost of death from suicide in the U.S. was calculated to be \$56.9 billion a year in combined medical and work loss costs with the average suicide costing society \$1,287,534 (Substance Abuse, 2016). These figures do not include the incidental damages

arising from the six million individuals who were profoundly impacted by the suicide. Suicide is a socio-economic train wreck with its repercussions wreaking havoc and inflicting deep pain individually and systemically. Moreover, it is a problem that is growing in its destructive power: unlike the decrease in death rates in 8 of the 10 leading causes of mortality, death from suicide has been on the rise in the U.S. with the rate increasing annually from 1999 through 2014 (National Center for Health Statistics, 2016).

The Challenge with Suicidality

Given the numbers, it is no surprise that suicidal behavior is the most frequently encountered mental health crisis (Bongar & Stolberg, 2009; Kleepsies, 2016). In the U.S., research shows that up to two-thirds of those who die by suicide had contact with a health care professional for various physical and emotional complaints in the month prior to their death (Kutcher & Chelil, 2012). How do these individuals go undetected? Unfortunately, many suicidal patients do not voluntarily report suicidal thoughts to their providers, and providers never asked about suicidality for the majority of those at risk (Kutcher & Chelil, 2012). Considering the severity and prevalence of suicidality, the ability to identify and treat suicidal patients—especially when the opportunity presents itself—is unmistakably wanting. The gap in providing competent care may be explained by the negative attitudes of mental health professionals towards suicidal patients, and the deficiency in knowledge, skills, and confidence in assessing suicide due to the lack of specialized training.

Negative Attitudes of Mental Health Professionals

Undoubtedly, losing a patient to suicide is a personally and professionally agonizing experience for mental health professionals. Patient suicide is an “occupational hazard” for

psychologists with 22% of practicing psychologists reporting losing a patient to suicide during their careers (Chemtob, Bauer, Hamada, Pelowski, & Muraoka, 1989; Rabu, Moltu, Binder, & McLeod, 2015). This translates to nearly one out of four psychologists experiencing patient suicide during his or her career. Losing a patient to suicide is remarkably common among mental health trainees as well. Almost 40% of psychology trainees will have a patient attempt suicide (29.1%) or complete suicide (11.3%) during training (Kleespies, 1993; Kleespies, 2016). It is not a surprise that therapists and psychiatrists endorse client suicide as their greatest fear and most anxiety-provoking scenario and psychotherapists finding suicidal statements the most stressful of all patient communications (Deutsch, 1984; Mangurian, Harre, Reliford, Booty & Cournos, 2009; Pope & Tabachnick, 1993). Similar themes were found in qualitative studies assessing physicians in the emergency department assessing for suicide and psychiatrists in psychiatric emergency services. Participants aired concerns, worries, and fears about their patients' suicide potential and fretted about possibly overlooking a serious risk (Roy et al., 2016). Others noted being anxious about the possible legal ramification or damage to their professional reputation as a consequence of their decisions when conducting and documenting risk assessments (Chunduri et al., 2017). Providers commonly expressed anxiety about patient outcomes resulting from their clinical decisions and spoke of frustration with unrealistic expectations that they should be able to detect and prevent all suicides. (Chunduri et al., 2017)

Considering the above, Mintz appropriately stated, "attitudes toward suicide, held knowingly and unknowingly by the therapist may prevent him from adequately inquiring the suicidal ruminations of his patients" (as cited in Birtchnell, 1983, p. 25; Kleespies, 2016). Fears about patient suicide can run high from ruining one's career to anxiety about being sued,

notwithstanding guilt and shame around personal and professional responsibility and failure. Therapists often respond to suicidal patients with anxiety, avoidance, denial, and passivity, which can taint their attitudes and obstruct their clinical judgment in assessing and treating suicidal patients (Birtchnell, 1983; Kleespies, 2016).

Training

Perceived need. Many clinicians report feeling unprepared to manage suicidal patients (Weiner, 2005). A recent survey of mental health professionals showed 86.6 % of the respondents desiring to improve competency in suicide risk assessment (Palmieri et al., 2008). Moreover, despite the frequency in which students in training come into contact with suicidal patients, graduate training in the assessment and management of suicide is generally lacking (Mackelprang, Karle, Reihl, & Cash, 2014). According to composite data, only 40% to 50% of graduate programs in clinical and counseling psychology include formal training in suicide assessment and management (Cramer, Johnson, McLaughlin, Rausch, & Conroy, 2013), which means that a large number of unseasoned clinicians are facing high-risk clients without adequate training or preparation. Research on self-harm, a substantial predictor of future suicide, has shown that a provider's low confidence and lack of psychological knowledge on self-harm may accentuate negative attitudes towards self-harming patients, which may lead to subpar care for such individuals (Egan, Sarma, & O'Neill, 2012). Confidence and knowledge are significant factors for perceived personal effectiveness in health professionals (Egan, Sarma, & O'Neill, 2012), and the perception of competency in turn influences the quality of care provided to patients. Perceived sufficient training has consistently been the most important predictor for influencing attitudes of clinical staff (Ramberg, Di Lucca, & Hadlaczky, 2016). Thus, it is

critical for mental health providers and trainees to feel knowledgeable, skillful, and competent in order to provide the best care possible for the high-risk patients they encounter.

Effectiveness of training. As discussed above, the identification of suicide risk is among the most important, complex, and difficult tasks performed by clinicians (Bongar, 2002). However, it is promising that research has shown that training can have a significant and positive impact on perceived skills and attitudes. In a study that examined primary care providers' (PCP) attitudes toward assessment and treatment of suicidality, PCPs who received training perceived themselves as competent to work with suicidal patients, which made them more likely and willing to evaluate and treat suicidal patients (Graham, Rudd, & Bryan, 2011). Similarly, in a study comparing the effectiveness of two multidisciplinary suicide assessment trainings (full day workshop and a half-day lecture), outcome measures such as the Suicide Response Inventory Form 2, a reliable and valid measure of the ability to intervene with suicidal clients and confidence in clinical management scales, indicated both types training increasing the skills and confidence of trainees, which were sustained at two month follow up (Fenwick, Vassilas, Carter, & Haque, 2004). Concordant findings were replicated in a study assessing the pre-post influences of a four-hour workshop with clinical psychology doctoral students and providers in a college counseling center. The study found that workshop participation yielded increases in the ability to recognize appropriate clinician responses to suicidal client statements, self-perceptions of general capacity to interface with suicidal patients and mastery of core competencies, factual knowledge concerning suicide risk assessment and management, and the self-rated ability to assess and manage a suicidal patient (Cramer, Bryson, Eichorst, Keyes & Ridge, 2016). Research has shown the correlation between training and improved knowledge, confidence, and

professional skills in responding to patients with suicidal ideation (University of Washington School of Nursing, 2013). Thus, finding an effective option for training mental health professionals and trainees to assess and manage suicide risk is a high priority. Unfortunately, relatively few interventions have been specifically developed to prevent suicide, and the degree to ascertaining the efficacy of interventions is inexact because suicidal patients are often excluded from clinical trials (Wenzel, Brown, & Beck, 2009). Among the dearth of interventions, the Collaborative Assessment and Management of Suicidality (CAMS) is an emerging evidence-based approach for assessing and treating suicidality.

The CAMS is a suicide-specific evidenced based intervention, best understood as a therapeutic framework that was created to modify how clinicians identify, assess, conceptualize, treatment plan, and engage with suicidal outpatients, fostering a working alliance between the client and the clinician to understand the functional role of suicidal thoughts and behaviors from the client's vantage point (Jobes, 2012). The CAMS has been supported by six published correlational studies and one randomized clinical trial (RCT) with more RCTs on the way (Jobes, 2012). Nationally, the CAMS has been used with juvenile offenders, inpatient psychiatric hospitals in several states, in the Air force, and there is ongoing collaboration with the United States Department of Veteran Affairs. The CAMS has shown to be beneficial for the patient population, but there remains a gap in the literature regarding the efficacy of the training itself. Consequently, it will be pertinent to examine the professionals that are delivering the CAMS and the impact of training such professionals in the CAMS.

Recently, the CAMS was adopted by several Coordinated Care Organizations (CCO) in Oregon. Providers of mental health services in outpatient, primary care, and emergency room

settings are trained in the CAMS assessment and intervention protocol. Providers with varying levels of education and experience are trained, including qualified mental health professionals working in Yamhill County and master's prepared doctoral students, who provide risk assessments for patients presenting to the county emergency departments. As previously discussed, research has shown that seasoned clinicians experience a lack of confidence in their skill to manage suicidality. If experienced clinicians identify a skill deficit in the management of this complex and acute population, graduate students in training are even less likely to have the skills and confidence to assess suicidality. This deficit is particularly notable given the majority of students in training will work with patients presenting with suicidality. To address this training gap, the graduate department of clinical psychology at George Fox University is using the CAMS training to educate first year students on understanding and assessing suicidality before their first practicum training experience.

The objective of the study is to determine whether CAMS training will increase knowledge, perceived skills, and confidence of qualified mental health professionals (County), master's prepared third-year doctoral students (BHCC), and graduate students in the first year of a doctoral psychology program (First-years) to observe any differential effects based on their respective levels of experience. The results of this study may inform program development regarding suicide assessment training. First, the study may provide insight on critical periods along the developmental trajectory of mental health professionals, where training on a much feared and dreaded topic, suicide, can be optimized. Additionally, the study is designed to provide a basis for future researchers to improve training efficacy of the CAMS as it grows in its usage and influence domestically and internationally. The study design is a 2 x 3 mixed

ANOVA, the first independent variable is experience (as measured by level of training) with three levels, first-year graduate students (First-years) in a clinical psychology doctoral program, masters' prepared graduate students entering their third year of training participating on the Behavioral Health Crisis Consultation (BHCC) team in the doctoral program, and county employed qualified mental health professionals (County) who are masters' prepared providers of mental health services. Time was the second independent variable and participants were assessed prior to the training (T1) and immediately after the training (T2). The original design included a follow-up assessment at eight months post-training; however, logistical barriers (turnover, inaccessibility, job changes) limited data collection. The dependent variables include participants' self-report of knowledge, perceived skill, and confidence in the assessment and treatment of suicide. The following hypotheses describe the expected impact of the training on knowledge, perceived skills, and confidence of participants and that the training would differentially affect the three groups.

Hypothesis 1a: The training would increase knowledge of suicide assessment and intervention for all participant groups as measured by the pre-post outcome measure.

Hypothesis 1b: The first-year graduate students would show significantly greater improvement in knowledge between Time 1 and Time 2 than the other two participant groups.

Hypothesis 2a: The training would significantly increase perceived skill in suicide assessment and intervention for all participant groups.

Hypothesis 2b: The first-year graduate students would show significantly greater improvement in perceived skill between Time 1 and Time 2 than the other two participant groups.

Hypothesis 3a: The training would significantly improve confidence in the assessment and intervention of suicide for all participant groups.

Hypothesis 3b: The first-year graduate students would show significantly improved confidence between Time 1 and Time 2 than the other two participant groups.

Chapter 2

Method

Participants

Three levels of participants—county employed qualified mental health professionals (County), master’s prepared third-year doctoral students (BHCC), and first year doctoral students (First-years) – along the developmental spectrum of training and experience were asked to participate in the study. Participation in the training fall under the purview of general work expectations for all three participant groups. County mental health workers were required to receive the training as part of a risk assessment protocol. The third-year doctoral students received the training before starting their supplemental practicum as Behavioral Health Crisis Consultants (BHCC) conducting risk assessment for two local emergency departments, and the first-year doctoral students received the training prior to their first semester practicum training experience. There were originally 75 participants who completed the training; however, 8 participants were removed from the analysis due to missing significant data, resulting in 67 participants for the pre-post analysis. See Table 1 for participant demographic information.

Instruments

The CAMS Questionnaire (CAMSQ: Oliver, Olsen, Lowen, & Smith, 2014) was administered (see Appendix B) to measure knowledge of suicidality assessment as defined in the CAMS, perceived skills in assessing suicidality, and confidence working with suicidal patients. Additionally, participants will score three case studies to assess pre-and post-skills. The CAMSQ

Table 1

Participant Demographic Information

	County (n = 35)	BHCC (n = 10)	First-Year (n = 22)
Age	44 (12)	26 (3)	27(3.8)
Sex			
Male	3	3	14
Female	32	7	6
Ethnicity			
White (not Hispanic)	23	9	12
Latino	4	1	3
African American	1		1
Asian American	7		3
Other			3
Unknown	7		
Graduate Education	33	10	6

Note. 1 participant did not report age, 1 participant did not report gender, 2 did not report degree

is a 22-item measure targeted at assessing knowledge (items 2-11), perceived skill (items 17-22), and confidence (items 12-16). All items are rated using a 5-point Likert scale, ranging from *strongly disagree* to *strongly agree*.

Procedure

Each participant group was asked to complete a pre-test prior to and a post-test immediately following their respective CAMS training. A certified CAMS trainer, who received her certification through a “train-the trainer” model established by the CAMS’s developer, conducted the training. The training is a two-hour module that includes a didactic component, video demonstration, and role-play. In an effort to reduce variability, the same trainer and

module was used for all participant groups. The County group participated in the CAMS training as part of their annual suicide assessment training in the spring. The third-year students participated in the training as part of the BHCC team, which provides all after-hours risk assessment for patients in the Emergency Departments of the two medical centers in Yamhill County, Oregon. The first-year students participated in the CAMS as a requirement prior to starting their first practicum training experience. Participants were given as much time as needed to complete the test. The tests were completed in a group setting in the room reserved for the training. A 2 x3 mixed ANOVA was conducted using different participant groups as the independent variable and knowledge, perceived skills, and confidence pre- and post-training as the second independent variable. A follow-up one-way ANOVA and T-TESTS were conducted. Missing data were replaced for the variables Years of Experience, Confidence Total Pre, and Skill Pre and Post using linear interpolation (1 data point each).

Chapter 3

Results

Changes in Knowledge, Perceived Skills, Attitudes, and Anxiety over time between Groups

A 2 X 3 mixed ANOVA was conducted using different participant groups as the independent variable and knowledge, perceived skills, and confidence pre-, post-training as the second independent variable to examine hypotheses 1, 2, and 3. Reliability in analysis indicated an acceptable degree of internal consistency among the items comprising the perceived skills subscale ($\alpha = .86$) and confidence subscale ($\alpha = .78$). In examining the normality of data, significant negative skew was found for participants in County group at T2. Likewise, this group was found to have significant kurtosis (leptokurtic). All assumptions for the 2 X 3 mixed ANOVA were met.

Pre-post knowledge by experience. Descriptive data is listed in Table 2. A 2 X 3 mixed ANOVA was conducted to examine the within subjects variable of knowledge about suicide assessment over time and the interaction of the between subjects variable of experience (County, BHCC, First-year). Results from the ANOVA indicated a main effect of time, $F(1, 65) = 83.63, p < .001$. There was no main effect of group, $F(2, 65) = .21, p = .82$, but there was a significant interaction of time and group, $F(2, 65) = 4.53, p = .01$ (see Table 3). A follow-up one-way ANOVA revealed that the three groups did not differ significantly in their Pre-training knowledge of the CAMS, $F(2, 65) = 2.86, p = .07$. Similarly, the three groups did not differ

Table 2

Descriptive Statistics for Knowledge

Group		Mean	SD	N
Total Correct Pre	County	3.92	1.18	36
	BHCC	5.00	1.33	10
	First Year	3.91	1.54	22
	Total	4.07	1.36	68
Total Score Post	County	7.22	1.79	36
	BHCC	6.20	1.55	10
	First Year	6.86	1.52	22
	Total	6.96	1.69	68

Table 3

2 x 3 Mixed ANOVA Results for Pre-Post Knowledge by Experience (Group)

	df	F	p
Main Effect: Time	1,65	83.63	<.001
Main Effect: Group	2,65	.21	.82
Interaction	2,65	4.53	P=0.1

significantly in their Post-training knowledge, $F(2, 65) = 1.51, p = .23$. Interestingly, while the County participants (hedge's $g = 1.63$) and first-year students (Hedge's $g = 1.58$) both showed large improvement in their knowledge scores as a result of training, the BHCC group showed only a moderate-sized improvement in their knowledge, Hedge's $g = .62$. This difference in effect size likely accounts for the interaction (see Figure 1). In sum, all groups improved significantly post-training but the training did not differentially impact the amount of acquired

knowledge based on experience. The results show that Hypothesis 1a was met as the training increased knowledge of suicide assessment and intervention for all participant groups as measured by the pre-post outcome measure. Hypothesis 1b (as stated) was not met because the first-year students did not show significant improvement in knowledge relative to the other two groups. However, surprisingly there was an interaction between variables with both County and first-year groups showing greater improvement than BHCCs.

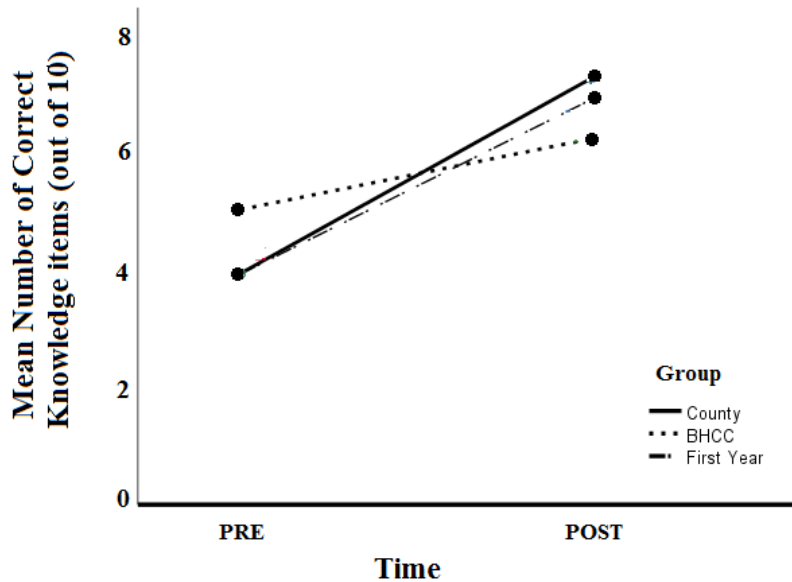


Figure 1. Knowledge over time.

Pre-post perceived skill by experience. Descriptive data are listed in Table 4. A 2 X 3 mixed ANOVA was conducted to examine the within subjects variable of perceived skill about suicide assessment over time and the interaction of the between subjects variable of experience (County, BHCC, First-year). Results from the ANOVA indicated a main effect of time $F(1, 64) =$

78.80, $p < .01$. There was a main effect of group, $F(2, 64) = 4.27, p = .02$, and an interaction of time and group, $F(2, 64) = 3.96, p = .02$ (see Table 5). A follow up one-way ANOVA revealed that the three groups did differ significantly in their Pre-training skills, $F(2, 62) = 6.66, p = .002$, such that the first-year group's perceived skills were significantly lower than the County participants, $t(55) = 3.62, p = .001$. However, the three groups did not differ significantly in their Post-training skills, $F(2, 65) = 1.10, p = .34$. Interestingly, the County group (Hedge's $g = .84$), the BHCC group (Hedge's $g = 1.17$), and first-year students (Hedge's $g = 1.69$) all showed very large improvement in their skills, with the first-year group showing the greatest increase in perceived skill (see Figure 2). The results show that Hypothesis 2a was met as the training increased perceived skill of suicide assessment and intervention for all participant groups as measured by the pre-post outcome measure. Hypothesis 2b (as stated) was also met because the first-year students showed significantly greater improvement in perceived skills relative to the other two groups.

Table 4

Descriptive Statistics for Perceived Skills

Group		Mean	SD	N
Total Correct Pre	County	22.8	3.47	35
	BHCC	21.1	3.10	10
	First Year	19.77	2.29	22
	Total	21.55	3.30	35
Total Score Post	County	25.12	3.30	35
	BHCC	24.30	1.41	10
	First Year	24.18	1.87	22
	Total	24.59	2.69	67

Table 5

2 x 3 Mixed ANOVA Results for Pre-Post Perceived Skills by Experience (Group)

	<i>df</i>	F	<i>p</i>
Main Effect: Time	1,64	78.80	<.01
Main Effect: Group	2,64	4.27	P=.02
Interaction	2,64	3.96	P=0.2

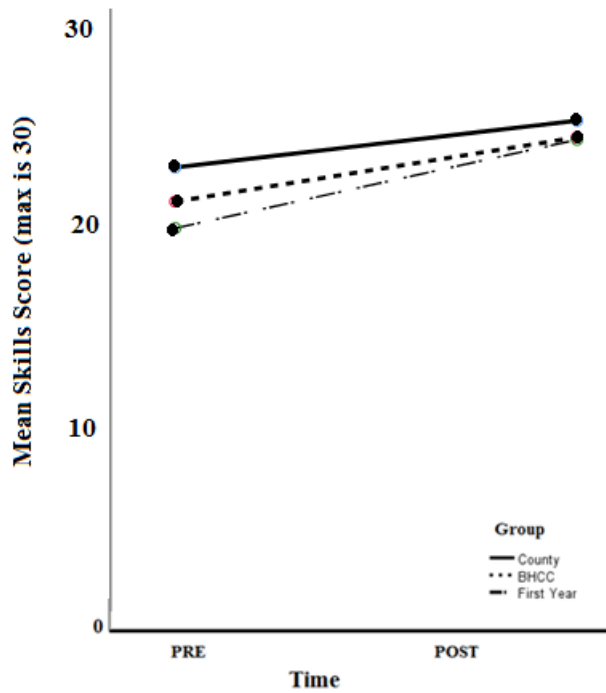


Figure 2. Skills over time.

Pre-post confidence by experience. Descriptive data are listed in Table 6. A 2 X 3 mixed ANOVA was conducted to examine the within subjects variable of confidence about suicide assessment over time and the interaction of the between subjects variable of experience (County, BHCC, First-year). Results from the ANOVA indicate a main effect of time, $F(1, 63) = 107.66, p < .01$. There was a main effect of group, $F(2, 63) = 3.72, p = .03$, and a significant

interaction of time and group, $F(2, 63) = 4.24, p = .02$ (see Table 7). A follow-up one-way ANOVA revealed that the three groups did differ significantly in their Pre-training confidence, $F(2, 64) = 6.00, p = .004$, such that the first-year group's confidence was significantly lower than the County participants' $t(55) = 3.44, p = .001$. However, the three groups did not differ significantly in their Post-training confidence, $F(2, 64) = 1.17, p = .32$. Interestingly, the County group (hedge's $g = 1.07$), the BHCC group (Hedge's $g = 1.44$), and first-year students (Hedge's $g = 1.90$) all showed large improvement in their confidence. In other words, there was a main effect of overall pre-post improvement in confidence with the First-year group's confidence increasing the most. The results show that Hypothesis 3a was met as the training increased confidence of suicide assessment and intervention for all participant groups as measured by the pre-post outcome measure. Hypothesis 3b (as stated) was also met because the first-year students demonstrated significantly greater improvement in confidence relative to the other two groups.

Table 6

Descriptive Statistics for Confidence

Group		Mean	SD	N
Total Correct Pre	County	15.94	3.96	34
	BHCC	14.60	3.17	10
	First Year	12.90	2.02	22
	Total	14.72	3.55	34
Total Score Post	County	18.68	3.15	34
	BHCC	18.00	2.16	10
	First Year	17.64	1.94	22
	Total	18.22	2.67	66

Table 7

2 x 3 Mixed ANOVA Results for Pre-Post Confidence by Experience (Group)

	df	F	p
Main Effect: Time	1,63	107.66	<.01
Main Effect: Group	2,63	3.72	P=.03
Interaction	2,63	4.24	P=0.2

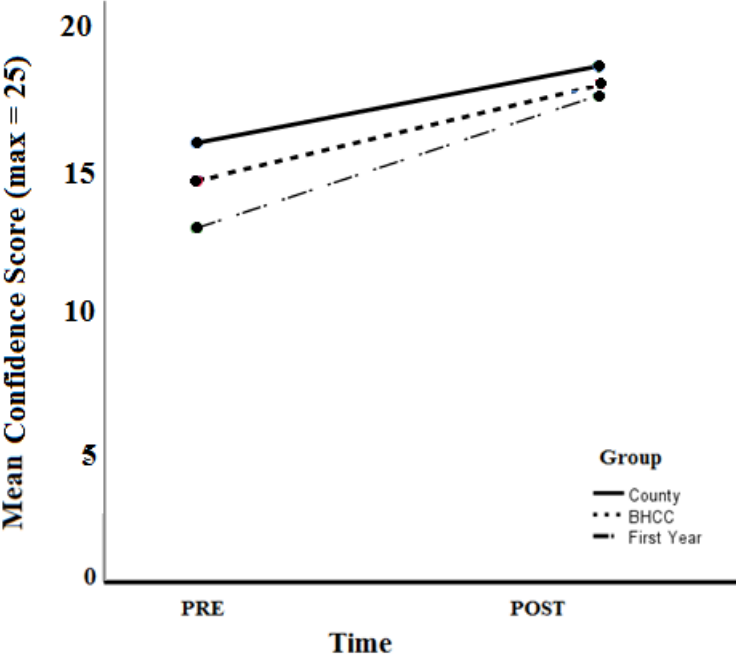


Figure 3. Confidence over time.

Chapter 4

Discussion

The purpose of this study was to examine the impact of training in the Collaborative Assessment and Management of Suicidality (CAMS), an evidence-based suicide assessment and intervention protocol, on the knowledge, perceived skills, and confidence for mental health providers across three developmental levels of training. Overall, results showed training to be successful for all groups with aggregated data showing significant improvement in each area. However, there were some notable differences between groups in their acquisition of knowledge, perceived skills, and confidence. For knowledge, all groups showed significant improvement, but the county and first year students showed a larger improvement than the BHCC group. For perceived skill, although the three groups differed in level of perceived skill at pre-test, with the first years reporting significantly less skill than the county or BHCC groups, all three groups ended with the same level of skill. All groups showed large improvement in perceived skill but the first-year group had the greatest improvement. Similarly, all groups showed significant improvement in confidence following the training, but the first-year group started with significantly lower levels of confidence than the other two groups. All three groups ended with similar level of confidence, indicating that first year students showed greater improvement than participants of the other two groups. In sum, all groups improved in knowledge, perceived skill, and confidence post-training: the first year and county participants showed greater improvement than the BHCC in knowledge, and the first year participants demonstrated significantly greater

improvement in perceived skill and confidence than the remaining two groups. The trend of improvement for all groups post-training supports existing research showing the correlation between training and improved knowledge, attitudes, and professional skills in responding to patients with suicidal ideation (University of Washington School of Nursing, 2013). This study's findings are also in concordance with conclusions of the largest systematic review of suicide prevention interventions, that the training of healthcare professionals in suicide prevention is an effective strategy (Mann et al., 2005).

Another purpose of this study was to explore if there was a developmentally critical period where training may be most effective, which has not been examined in prior literature. This study has shown that although knowledge, perceived skill, and confidence improved across the spectrum of experience, perceived skills and confidence improved the most for the first-year group—the group with the least amount of experience and training. The perception of having sufficient training for working with suicidal patients has been shown to increase significantly after suicide-preventive training. Although the perception of being sufficiently trained is not an objective measure of assessing provider's skill, it nonetheless influences the care provided because it implies a sense of confidence in one's own ability of assessing risk. Fittingly, Ramberg et al. (2016) found that the perception of being sufficiently trained seems to be the most consistent and important predictor for attitudes and perceived knowledge: those who considered themselves to be sufficiently trained seemed to be able to trust their own knowledge and were less affected by unclear routines. Thus, the hypotheses support the least experienced group of first-years reporting significantly lower levels of perceived skill and confidence and the same increasing the most post-intervention. Based on studies that have shown attitudes and

perceived knowledge towards suicide work and prevention may be valid outcome measures when evaluating suicide-preventive training (Ramberg et al., 2016), early intervention in suicide training may have the most efficacy if combined with consistent training throughout graduate school and routinely over one's professional life. The results reiterate the positive benefits of suicide training on knowledge, skills, and confidence, and furthers the argument that a single training is beneficial. Given the gravity of the suicide epidemic and the need for skilled mental health professionals to assess for risk, mandatory suicide training may be beneficial for higher education programs as well as professionals with experience in suicide assessment in the mental health profession.

Implications

Suicide is an emotionally laden pandemic and mental health professionals are at the frontline triaging an increasingly challenging fight. Unfortunately, those in the mental health profession are not immune to the deleterious emotional effects of facing suicidal patients, and concerns about their professional standing, legal ramifications, and personal liability run high. Despite this weighty responsibility, mental health providers across the training spectrum report lack of preparation and education regarding managing suicidality (Mackelprang et al., 2014). This deficit is particularly significant for psychology trainees, who are even less likely to have the necessary knowledge, skills, and confidence to assess suicidality while in reality, the majority of trainees will be faced with suicidal patients. The results of this study suggest that a structured training in an evidenced-based protocol may be a particularly effective strategy for trainees, and even more so early on in their training. In this study, the psychology trainees showed significantly greater improvement in knowledge than the BHCC group who had some clinical

exposure and greater improvement than either the BHCC group or the more experienced County clinicians in the acquisition of perceived skills and confidence post-training.

Overall, this study's findings are in concordance with the conclusions of the largest systematic review of suicide prevention interventions, that the training of healthcare professionals in suicide prevention is an effective strategy (Mann et al., 2005). Thus, as shown in the study, even experienced clinicians can benefit from training. Moreover, this study extends the literature by implicating a developmentally critical period where training may have the greatest impact—early on in graduate training. If experienced clinicians identify skill deficits and heightened anxiety in treating suicidal patients, graduate students in training with less experience and skills are likely to be more vulnerable to the aforementioned stressors. Providing training during this vulnerable period may provide accumulative and lasting positive effects throughout a trainee's career, which may translate to providing better patient care in assessing and treating suicidality.

Limitations

Some limitations of the study include the lack of follow up to see the long-term effects of the training due to the drop out of the County group at eight-month follow up. A follow up study across all groups and a larger sample size across different groups at varied levels of training would support a more robust differential impact of the training and potential critical periods of learning and maintenance effects. Also, procedurally, the participants did not demonstrate objective skills but answered a questionnaire, limiting knowledge of how participants may actually perform in a real-life scenario.

Suggestions for future research

This study supports the growing evidence of the positive relationship between suicide training on the ability to recognize appropriate clinician responses to suicidal client statements, self-perceptions of general capacity to interface with suicidal patients and mastery of core competencies, factual knowledge concerning suicide risk assessment and management, and the self-rated ability to assess and manage a suicidal patient (Cramer et al., 2016). This study suggests that early intervention in graduate training may have a significant impact on perceived skills and confidence, which may have positive implications throughout an individual's career. Future research may focus on defining effective curriculums for graduate training and establishing a causal influence of number, length, duration, and frequency of suicide assessment training. Finally, given the small sample size of the BHCC group and drop out of County at follow up, a larger sample and follow up study would increase the power of the findings and strengthen the potential differential impact of the training based on level of training.

References

- Berman, A. (2011). Estimating the population of survivors of suicide: Seeking an evidence base. *Suicide and Life-Threatening Behavior, 41*(1), 110-116. <http://dx.doi.org/10.1111/j.1943-278x.2010.00009.x>
- Birtchnell, J. (1983). Psychotherapeutic considerations in the management of the suicidal patient. *American Journal of Psychotherapy, 37*(1), 24-36.
- Bongar, B. M. (2002). The knowledge base. In the suicidal patient: Clinical and legal standards of care (2nd ed., pp. 3-38). Washington, DC: American Psychological Association.
- Bongar, B., & Stolberg, R. (2009, Fall). Risk management with the suicidal patient. *The Register Report, 9-16*.
- Centers for Disease Control and Prevention, National Center for Injury Prevention and Control. (2015). Web-based Injury Statistics Query and Reporting System (WISQARS). Retrieved from <http://www.cdc.gov/injury/wisqars/index.html>
- Chehil, S., & Kutcher, S. (2012). *Suicide risk management* (2nd ed.). Chichester, West Sussex: Wiley-Blackwell.
- Chemtob, C. M., Bauer, G. B., Hamada, R. S., Pelowski, S. R., & Muraoka, M. Y. (1989). Patient suicide: Occupational hazard for psychologists and psychiatrists. *Professional Psychology: Research and Practice, 20*, 294-300.
- Chunduri, S., Browne, S., Pollio, D., Hong, B., Roy, W., & Roaten, K. (2017). Suicide risk assessment and management in the psychiatry emergency service: Psychiatric provider experience and perceptions. *Archives of Suicide Research, 1-14*. doi: 10.1080/13811118.2017.1414648

- Cramer, R., Johnson, S., McLaughlin, J., Rausch, E., & Conroy, M. (2013). Suicide risk assessment training for psychology doctoral programs: Core competencies and a framework for training. *Training and Education in Professional Psychology, 7*(1), 1-11.
<http://dx.doi.org/10.1037/a0031836>
- Cramer, R., Bryson, C., Eichorst, M., Keyes, L., & Ridge, B. (2016). Conceptualization and pilot testing of a core competency-based training workshop in suicide risk assessment and management: Notes from the field. *Journal of Clinical Psychology, 73*(3), 233-238.
<http://dx.doi.org/10.1002/jclp.22329>
- Deutsch, C. J. (1984). Self-report sources of stress among psychotherapists. *Professional Psychology: Research and Practice, 15*, 833-845.
- Drapeau, C. W., & McIntosh, J. L. (2015, January 22). American Association of Suicidology U.S.A. suicide 2013: Official final data. Retrieved from <http://www.suicidology.org>
- Egan, R., Sarma, K. M., & O'Neill, M. (2012). Factors influencing perceived effectiveness in dealing with self-harming patients in a sample of emergency department staff. *Journal of Emergency Medicine (0736-4679), 43*(6), 1084-1090.
[doi:10.1016/j.jemermed.2012.01.049](https://doi.org/10.1016/j.jemermed.2012.01.049)
- Fenwick, C. D., Vassilas, C. A., Carter, H., & Haque, M. S. (2004) Training health professionals in the recognition, assessment, and management of suicide risk. *International Journal of Psychiatry in Clinical Practice, 8*, 117-121.
- Graham, R. D., Rudd, M. D., & Bryan, C. J. (2011). Primary care providers' views regarding assessing and treating suicidal patients. *Suicide & Life-Threatening Behavior, 41*(6), 614-623. [doi:10.1111/j.1943-278X.2011.00058.x](https://doi.org/10.1111/j.1943-278X.2011.00058.x)

- Jobes, D. A. (2012). The Collaborative Assessment and Management of Suicidality (CAMS): An evolving evidence-based clinical approach to suicidal risk. *Suicide and Life-Threatening Behavior, 42*(6), 640-653. doi:10.1111/j.1943-278X.2012.00119.x
- Kleespies, P. M. (1993). The stress of patient suicidal behavior: Implications for interns and training programs in psychology. *Professional Psychology-Research and Practice, 24*, 293-303. doi:10.1037/0735-7028.24.4.477
- Kleespies, P. M. (2016). *The Oxford Handbook of Behavioral Emergencies and Crises*. Retrieved from <http://www.oxfordhandbooks.com/view/10.1093/oxfordhb/9780199352722.001.0001/oxfordhb-9780199352722>
- Kochanek, K., Murhpy, S., Xu, J., & Arias, E. (2017). *Mortality in the United States, 2016* [Ebook]. National Center for Health Statistics. Retrieved from <https://www.cdc.gov/nchs/data/databriefs/db293.pdf>
- Mackelprang, J., Karle, J., Reihl, K., & Cash, R. (2014). Suicide intervention skills: Graduate training and exposure to suicide among psychology trainees. *Training And Education In Professional Psychology, 8*(2), 136-142. doi: 10.1037/tep0000050
- Mangurian, C., Harre, E., Reliford, A., Booty, A., & Cournos, F. (2009). Improving support of residents after a patient suicide: A residency case study. *Academic Psychiatry, 33*(4), 278-281. <http://dx.doi.org/10.1176/appi.ap.33.4.278>
- Mann, J., Apter, A., Bertolote, J., Beautrais, A., Currier, D., & Haas, A. (2005). Suicide Prevention Strategies. *JAMA, 294*(16), 2064. doi: 10.1001/jama.294.16.2064
- Mishara, B. L. (1995). *The impact of suicide*. New York, NY: Springer.

National Survey on Drug Use and Health. Population Data / NSDUH | SAMHSA. (2016).

Retrieved from <https://www.samhsa.gov/data/population-data-nsduh>

Oliver, Olsen, Lowen, & Smith. (2014). A Training Evaluation of County Mental Health Workers Participating in a CAMS Training

Palmieri, G., Forghieri, M., Ferrari, S., Pingani, L., Coppola, P., Colombini, N., & Neimeyer, R.

A. (2008). Suicide intervention skills in health professionals: A multidisciplinary comparison. *Archives of Suicide Research, 12*, 232-237.

doi:10.1080/13811110802101047

Pope, K. S., & Tabachnick, B. G. (1993). Therapists' anger, hate, fear, and sexual feelings:

National survey of therapist responses, client characteristics, critical events, formal complaints, and training. *Professional Psychology: Research and Practice, 24*(2), 142-152.

Rabu, M., Moltu, C., Binder, P., & McLeod, J. (2015). How does practicing psychotherapy affect the personal life of the therapist? A qualitative inquiry of senior therapists' experiences.

Psychotherapy Research, 26(6), 737-749.

<http://dx.doi.org/10.1080/10503307.2015.1065354>

Ramberg, I., Di Lucca, M., & Hadlaczky, G. (2016). The impact of knowledge of suicide prevention and work experience among clinical staff on attitudes towards working with

suicidal patients and suicide prevention. *International Journal of Environmental*

Research and Public Health, 13(2), 195. <http://dx.doi.org/10.3390/ijerph13020195>

- Roy, W., Roaten, K., Downs, D., Khan, F., Pollio, D., & North, C. (2016). Suicide Risk Assessment and Management: Real-World Experience and Perceptions of Emergency Medicine Physicians. *Archives of Suicide Research, 21*(3), 365-378. doi: 10.1080/13811118.2016.1199987
- Substance Abuse and Mental Health Services Administration Center for Behavioral Health Statistics and Quality. (2016).
- University of Washington School of Nursing. (2013). Washington State Department of Health Suicide Education Study. Washington State Department of Health. National Center for Health Statistics. (2016). *Data Brief No. 241*.
- Weiner, K. (2005). Therapeutic and legal issues for therapists who have survived a client suicide: Breaking the silence. Binghamton, NY: Haworth Press.
- Wenzel, A., Brown, G. K., & Beck, A. T. (2009). *Challenges in treating suicidal patients*. In, *Cognitive therapy for suicidal patients: Scientific and clinical applications* (pp. 215-231). Washington, DC: American Psychological Association. doi:10.1037/11862-010
- Xu, J. Q., Kochnanek, K. D., Murphy, S. L., & Arias, E. (2014). Mortality in the United States, 2012 (*Data Brief no. 168*). National Center for Health Statistics. Hyattsville, MD

Appendix A

Informed Consent and Demographic Questionnaire

Informed Consent

CONSENT TO ALLOW USE OF DE-IDENTIFIED INFORMATION

You are invited to participate in a research study, designed to assess the impact of the Collaborative Assessment and Management of Suicidality (CAMS) training on participants’ knowledge, skills, and attitudes toward the assessment of individuals with suicidality.

INFORMATION

If you agree to participate, your responses and demographic information will be de-identified and aggregated to assess the effectiveness of the CAMS training. If you would like additional information, please contact Cynthia Song, MA (csong13@georgefox.edu) or Mary Peterson, PhD (mpeterso@georgefox.edu)

BENEFITS

While there may or may not be direct benefits to you, we hope that the information we learn will improve future trainings.

RISKS

There are no physical or emotional risks associated with this consent. Every effort will be made to keep your information confidential; however, this cannot be guaranteed. You are free to decline consent and will not experience any consequences.

CONFIDENTIALITY

Individual participants will not be identified. Please do not write your name or any other identifiable information anywhere on the surveys. We will not use your personal information in any reports about this study, such as journal articles or presentations.

STATEMENT OF CONSENT

Your signature below provides consent for your responses to be included in the data analysis.

Signature of Participant

Date_____

Demographic Questionnaire

Age:

Gender: (circle) Female, Male, Other (please specify): _____

Ethnicity: (circle)

African American

American Indian/Alaskan Native

Asian/Asian American

Hawaiian/Pacific Islander

Hispanic/Latino

White (not Hispanic) 3

Other (please specify): _____

Highest degree attained: (circle) BA, BS, MA, MS, Psy.D., Ph.D., Ed.D., Other: _____

Degree: _____

Job Title: _____

Years of experience assessing suicide: _____

Approximate number of suicide risk assessments you have completed: _____

Appendix B
CAMS Questionnaire

CAMSQ Pre-Test

Four digit numerical code that is unique to you (you will need to remember this for the post-test):

1. Rate your comfort level with CAMS:

1 2 3 4 5
Not comfortable at all Very comfortable

2. CAMS does not treat suicidality as a symptom of depression.

True or False

3. In CAMS, the clinician is the expert of suicidality.

True or False

4. CAMS is a CBT approach to assessing suicidality.

True or False

5. Most suicidal people tell others that they are contemplating suicide.

True or False

6. CAMS refers to profound psychological pain as “heartache.”

True or False

7. CAMS refers to stress as “press.”

True or False

8. CAMS states that commitment to living is the cornerstone to success in clinical treatment.

True or False

9. CAMS asks the patient to identify two things that would make them no longer desire to commit suicide.

True or False

10. CAMS treatment protocol includes the creation of a safety contract.

True or False

11. CAMS is a therapeutic framework, used until suicidal risk resolves.

True or False

12. I have anxiety about working with suicidal patients.

1 2 3 4 5
Strongly disagree Strongly agree

13. I am confident in my ability to successfully assess suicidal patients.

1 2 3 4 5
Strongly disagree Strongly agree

14. I am confident in my ability to determine suicidal risk level in patients.

1 2 3 4 5
Strongly disagree Strongly agree

15. I am confident in my ability to form a strong therapeutic alliance with a suicidal patient.

1 2 3 4 5
Strongly disagree Strongly agree

16. I am confident that I can help motivate a patient to live.

1 2 3 4 5
Strongly disagree Strongly agree

17. I can develop an adequate safety/coping plan with patients who are at-risk for suicide.

1 2 3 4 5
Strongly disagree Strongly agree

18. I am not hesitant to ask a patient if s/he is suicidal.

1 2 3 4 5
Strongly disagree Strongly agree

19. I don't believe that hospitalization is always the best response for suicidal patients.

1 2 3 4 5
Strongly disagree Strongly agree

20. I believe that suicidal patients should take an active role in all aspects of their own treatment.

1 2 3 4 5
Strongly disagree Strongly agree

21. I believe my current practices are sufficient to protect me from liability in the event one of my patients should complete suicide.

1 2 3 4 5
Strongly disagree Strongly agree

22. I am motivated to use what are considered the "best practices" in suicide prevention even if it requires me to do something different in my clinical practice.

1 2 3 4 5
Strongly disagree Strongly agree

Case Vignettes: Rate on a scale of from low risk (1) to high risk (7)

25-year-old white male referred from the emergency room following a suicide attempt with gas and strangulation. Patient turned on the gas and tied a towel around his neck until he turned blue and passed out. His roommate was present while he turned on the gas. Emergency room classifies this medically as a high lethality suicide attempt. At Community Integrated Care, patient maintains that he will still hang himself, given the opportunity. Precipitant seems to be the patient finding out one week ago that his girlfriend was dating his friend. Other stressors include a recent move, financial problems, and being on probation at work for absenteeism. History reveals an overdose at age 15, which led to psychiatric hospitalization. Diagnostic Impression: Adjustment disorder with depression, plus questionable alcohol abuse.

1 2 3 4 5 6 7
Low risk High risk
17-year-old Native American female referred from a detoxification center for an evaluation of suicide risk. Patient lacerated her wrist with a piece of glass while intoxicated, now regrets the attempt and denies being suicidal. Has been depressed for approximately one month but there are

no vegetative signs of depression. Self-esteem is impaired, however, patient recently lost boyfriend and has difficulties coping with it; did not finish school and is unable to provide for herself. There was one previous suicide attempt exactly one year ago (cut wrist); this attempt also occurred following the loss of a boyfriend. patient is dependent on alcohol and marijuana and has had chemical dependency treatment in the past. She also received one month of counseling following the previous suicide attempt. Diagnostic impression: Atypical depression.

1 2 3 4 5 6 7
Low risk High risk

23-year-old white male self referred. patient bought a gun two months ago to kill himself and claims to have the gun and four shells in his car (police found the gun but no shells). Patient reports having planned time and place for suicide several times in the past. States that he cannot live anymore with his “emotional pain” since his wife left him three years ago. The pain has increased during the last week, but the patient cannot pinpoint any precipitant. Patient has a history of chemical dependency, but has been sober for 20 months and currently goes to AA. There is one previous psychiatric admission. During the marriage, the patient beat his wife severely several times a week. She is currently in another relationship, and there is little likelihood of her returning to the patient. In the interview, patient appears depressed and irritable. Is angry, hostile, and threatening (“you b***h, I hate women”). Reports no sleep or appetite disturbance.

1 2 3 4 5 6 7
Low risk High risk

What are your greatest concerns about assessing a person who presents with suicidality?

CAMSQ
Post-Test

Four digit numerical code that you used on pre-test: _____

1. Rate your comfort level with CAMS:

1 2 3 4 5
Not comfortable at all Very comfortable

2. CAMS does not treat suicidality as a symptom of depression.

True or False

3. In CAMS, the clinician is the expert of suicidality.

True or False

4. CAMS is a CBT approach to assessing suicidality.

True or False

5. Most suicidal people tell others that they are contemplating suicide.

True or False

6. CAMS refers to profound psychological pain as “heartache.”

True or False

7. CAMS refers to stress as “press.”

True or False

8. CAMS states that commitment to living is the cornerstone to success in clinical treatment.

True or False

9. CAMS asks the patient to identify two things that would make them no longer desire to commit suicide.

True or False

10. CAMS treatment protocol includes the creation of a safety contract.

True or False

11. CAMS is a therapeutic framework, used until suicidal risk resolves.

True or False

12. I have anxiety about working with suicidal patients.

1	2	3	4	5
Strongly disagree				Strongly agree

13. I am confident in my ability to successfully assess suicidal patients.

1	2	3	4	5
Strongly disagree				Strongly agree

14. I am confident in my ability to determine suicidal risk level in patients.

1	2	3	4	5
Strongly disagree				Strongly agree

15. I am confident in my ability to form a strong therapeutic alliance with a suicidal patient.

1	2	3	4	5
Strongly disagree				Strongly agree

16. I am confident that I can help motivate a patient to live.

1	2	3	4	5
Strongly disagree				Strongly agree

17. I can develop an adequate safety/coping plan with patients who are at-risk for suicide.

1	2	3	4	5
Strongly disagree				Strongly agree

18. I am not hesitant to ask a patient if s/he is suicidal.

1	2	3	4	5
Strongly disagree				Strongly agree

19. I don't believe that hospitalization is always the best response for suicidal patients.

1 2 3 4 5
Strongly disagree Strongly agree

20. I believe that suicidal patients should take an active role in all aspects of their own treatment.

1 2 3 4 5
Strongly disagree Strongly agree

21. I believe my current practices are sufficient to protect me from liability in the event one of my patients should complete suicide.

1 2 3 4 5
Strongly disagree Strongly agree

22. I am motivated to use what are considered the "best practices" in suicide prevention even if it requires me to do something different in my clinical practice.

1 2 3 4 5
Strongly disagree Strongly agree

23. The training met my expectations.

1 2 3 4 5
Strongly disagree Strongly agree

24. I will be able to apply the knowledge learned.

1 2 3 4 5
Strongly disagree Strongly agree

25. The content was organized and easy to follow.

1 2 3 4 5
Strongly disagree Strongly agree

26. The materials distributed were pertinent and useful.

1 2 3 4 5
Strongly disagree Strongly agree

16-year-old Native American female, self-referred following an overdose of 12 Aspirins. Precipitant: could not tolerate rumors at school that she and another girl are sharing a boyfriend. Denies being suicidal at this time (“I won’t do it again; I learned my lesson”). Reports that she has always had difficulties expressing her feelings. In the interview, is quiet, guarded, and initially quite reluctant to talk. Diagnostic impression: Adjustment disorder.

1 2 3 4 5 6 7

Low risk High risk

Have your concerns about assessing a person who presents with suicidality changed? If so, How?

Appendix C

Curriculum Vitae

CYNTHIA J. SONG

200 W 85th St # 4A • New York, NY 10024 • 734.474.4144
 cjs9010@nyp.org

EDUCATION

PsyD Clinical Psychology (Present)
 George Fox University, Newberg, OR
 APA accredited
 Anticipated Graduation May 2018

MA Clinical Psychology (2015)
 George Fox University, Newberg, OR

JD Juris Doctor (2008)
 Ave Maria School of Law, Ann Arbor, MI

LLB Bachelor of Laws (2005)
 Sungkyunkwan University, College of Law, Seoul, S. Korea

CLINICAL
 TRAINING

Psychology Intern Present
Columbia University Medical Center, New York, New York

- Population: Low SES, racially/culturally diverse adult outpatient and inpatient
- Provide psychoanalytic individual, couples, and group psychotherapy for patients diagnosed with moderate to severe and persistent mental illness in a community mental health hospital
- Administer comprehensive neuropsychological assessments and provide consultation for treatment team at the New York Psychiatric Institute
- Conduct comprehensive clinical evaluations for new patients and present cases with recommendations for disposition at weekly hospital-wide multidisciplinary staff meeting
- Clinical rotation at Barnard College conducting intakes, triaging emergency walk-ins, and providing psychotherapy from a short-term psychodynamic treatment model
- Clinical rotation at 9 Garden North Inpatient Unit providing individual psychotherapy 5 days/week and group therapy for patients suffering from complex affective, personality, and psychotic disorders as part of a multidisciplinary team

- Supervisors: Adam Kaplan, PhD, Mark Kuras, PhD, Ivan Bresgi, PhD, Susan Sussman, PhD, Lauryn Schmerl, PhD, Mary Commerford, PhD

Doctoral Student Therapist 2016 – 2017

Concordia University Counseling and Testing Center, Portland, OR

- Population: Ethnically/racially diverse undergraduate and graduate students, non-traditional students, first-generation college students
- Provide individual therapy for students struggling with trauma, anxiety, depression, acculturation difficulties, and suicidality from Time-Limited Dynamic therapy and psychodynamic perspectives
- Administer comprehensive LD/ADHD/Personality assessments including projective tests such as the Rorschach, TAT, Rotter Incomplete Sentences, and House Tree Person
- Provide suicide assessment training for master's level therapists
- Outreach activities including sexual assault training and psychoeducation for resident assistants and area directors
- Supervisors: Jaklin Peak, MA, LPC, Joel Gregor, PsyD

Doctoral Student Therapist 2015 – Present

- Provide long-term psychodynamic psychotherapy twice a week for one adult client
- Case conceptualization, treatment planning, diagnosis, and session notes from a psychodynamic orientation
- Supervisor: Ryan Kuehlthau, PsyD

Behavioral Health Crisis Consultant 2015 – Present

Providence Newberg Medical Center, Newberg, OR

Willamette Valley Medical Center, McMinnville, OR

- Population: Individuals of all ages and diverse backgrounds presenting to the emergency department for suicidal/homicidal ideation, alcohol/drug intoxication, psychosis, substance induced psychiatric diagnoses, cognitive decline, and inability to care for self
- Crisis consultation, neurocognitive screening, and other risk assessment for two major medical centers, law enforcement, and mental health agencies in Yamhill County
- Collaborate with physicians and multidisciplinary team to provide patient stabilization and discharge plan
- Document evaluations in electronic medical charts and coordinate resources with county mental health employees
- Supervisors: Mary Peterson, PhD, Joel Gregor, PsyD, William Buhrow PsyD, Luann Foster, PsyD

Behavioral Intern 2015

Physicians Medical Center, McMinnville, OR

- Population: Residents of rural community, across the lifespan, patients of primary care home

- Lead weekly chronic pain management group
- Conduct assessments to evaluate risk factors associated with chronic opiate use and create individualized treatment plan with multidisciplinary team
- Behavioral health consultation and screening for pediatric, family medicine, and internal medicine patients concerning ADHD, bipolar, depression, anxiety, suicidality, diabetes management, obesity, hypertension, chronic pain, sleep difficulties, and alcohol abuse
- Supervisor: Kristie Schmidkofer, PsyD

Practicum Therapist

2014

George Fox Behavioral Health Clinic, Newberg, OR

- Population: Low SES, uninsured, rural community, diverse in age/sexual orientation/religion, court mandated patients
- Provide long-term and short-term solution-focused psychotherapy, cognitive behavioral therapy, and emotion focused therapy
- Services include intake interviews, individual/couples'/family psychotherapy
- Conduct comprehensive personality and cognitive assessments
- Supervisors: Joel Gregor, PsyD, Tina Kang, MA, Kevin Lee, MA

Pre-practicum Therapist

2013

George Fox University Grad. Dept. of Clinical Psychology, Newberg, OR

- Population: Undergraduate students
- Provided individual therapy for two students from a client-centered orientation
- All sessions video recorded and reviewed by supervisors
- Supervisors: Carlos Taloyo, Phd, Chloe Ackerman, MA

RESEARCH
EXPERIENCE

Doctoral Dissertation

Prelim Passed, July 2015. Collaborative Assessment and Management of Suicidality training: The effect on the knowledge, skills, and attitudes of mental health professionals and trainees
Dissertation chair: Mary Peterson, PhD, ABPP

Research Vertical Team Member

Collaborate and design various research projects with team members
Formal presentations of research projects and results
Supervisor: Mary Peterson, Phd, ABPP

PUBLICATIONS &
PRESENTATIONS

Papers

Song, C. and Pace, A. (2016). *Yield to the art: The symbolic self, art, and contemporary society*. Paper submission under review for the American

Psychological Association Psychoanalysis Division 39 Annual Conference, New York, NY, April 2017

Posters

Song, C., Dunbar, K., Reed, G. (2016). *Suicidality: What now? Risk assessment training's effect on mental health professionals and trainees*. Poster accepted for presentation at the American Psychological Association Annual Convention, Denver, Colorado, August 2016

Pace, A., Song, C., Haskell, N., & Bufford, R. (2016). *Film, psychoanalysis, & learning psychodynamic thought: An investigation of learning psychodynamic theory*. Poster accepted for presentation at the American Psychological Association Division 39 Annual Conference, Atlanta, GA, April 2016

Kang, T., Song, C., Goldberg, E. (2015). *This is not your stop: Increasing the time between non-emergent emergency department visits*. Poster accepted for presentation at the American Psychological Association Annual Convention, Toronto, CA, August 2015

Davis, S., Song, C., Uchison, J. (2014) *Pediatricians' perceptions of benefits and barriers of integrated Behavioral Health Services*. Poster accepted for presentation at the Oregon Psychological Association Annual Convention, Portland, OR, May 2014

TEACHING &
ACADEMIC
EXPERIENCE

Teaching Assistant 2016

Graduate level course: Clinical Foundations I & II
George Fox University Graduate Dept. of Clinical Psychology, Newberg, OR

Professor: Glenna Andrews, PhD

Graduate Assistant of Director of Diversity 2014 – Present

George Fox University Graduate Dept. of Clinical Psychology, Newberg, OR

Professor: Winston Seegobin, PsyD

Teaching Assistant 2015

Graduate level course: Contemporary Psychodynamics
George Fox University Graduate Dept. of Clinical Psychology, Newberg, OR

Professor: Nancy Thurston, PhD, ABPP

Teaching Assistant 2014

Undergraduate level course: Culture and Psychology
George Fox University Undergraduate Dept. of Psychology, Newberg, OR

Professor: Winston Seegobin, PsyD

AWARDS

Outstanding Service Award, Oregon Psychological Association
Outstanding Student Poster Award, American Psychological Association Psychoanalysis Division 39
Diversity Scholarship, George Fox University Graduate Department of Clinical Psychology
Recognition of Service Award, Ministry of Government Legislature, S. Korea

LEADERSHIP
EXPERIENCES &
PROFESSIONAL/
ACADEMIC
AFFILIATIONS

Board Member, Student Representative, Oregon Psychological Association
Leader, George Fox University Psychoanalytic Reading Group
Student Liaison, Oregon Psychoanalytic Institute Reading Group
Student Member, Division 39 Psychoanalysis, American Psychological Association
Student Member, Society for Exploration of Psychoanalytic Therapies & Theology
Student Affiliate, American Psychological Association
Administrator, Multicultural Committee, George Fox University
Member, Ubuntu Diversity Leadership Initiative, George Fox University

OTHER WORK
EXPERIENCE

Attorney 2011
 Central City Concern, Portland, OR
 • Drafted lease and trespassing policy in compliance with federal regulations
 • Researched federal and state fair housing and landlord-tenant laws
 • Recommended policy based on organization's legal positioning

Attorney 2010
E.I. Du Pont de Nemours Co., Troy, MI
 • Supervised 15 first-level document review administrators
 • Analyzed and prioritized 50,000+ documents during discovery phase
 • Created deposition files of key witnesses for in-house counsel

Attorney 2008
Legal Services of South Central Michigan, Ann Arbor, MI
 • Represented clients in eviction and Social Security proceedings
 • Drafted legal memorandum, motions, and briefs
 • Focused on state and federal benefits, housing, consumer, and family law cases
 • Resolved client filing discrepancies with inter-agency partners

Legal Intern 2008
Law Offices of Choi & Kim, Seoul, Korea
 • Authored briefs in maritime, securities fraud, insurance, and international trade law
 • Drafted correspondences with opposing counsel, settlement offers, notice of pre-judgment attachment, and ship arrest orders

CAMS TRAINING OUTCOME

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- Legal Intern** 2007
Ministry of Government Legislation, Seoul Korea
 - Reported comparative study of Korean and U.S. business law
 - Authored “Introduction to U.S. Corporate Law” for World Laws Center
- Legal Intern** 2007
Ave Maria Immigrant Rights and Asylum Clinic, Ann Arbor, MI
 - Represented individuals in Asylum/Withholding of Removal proceedings
 - Assisted clients in preparing various Department of Homeland Security forms

BAR ADMISSION Admitted to the State Bar of Oregon in May 2011
 Admitted to the State Bar of Michigan in January 2009

- SELECTED PROFESSIONAL TRAINING
- Clinical Team** 2013 – Present
 Consultation group that meets weekly to present and discuss cases from various clinical perspectives
 Consultants: Nancy Thurston, PsyD, ABPP, Paul Stoltzfus, PsyD, Erica Tan, PsyD, Kristie KnowsHisGun, PsyD
 - The International Society for Psychological and Social Approaches to Psychosis Annual Meeting: From Reductionism to Humanism Moving Forward from Psychosis and Extreme States 2016
 - Transference/Countertransference Paradigms in Clinical Work with Sexual Abuse Survivors 2016
 Mary Gail Frawley-O’Dea, PhD
 - Race, Class, Culture in Psychotherapy 2016
 Neil Altman, PhD
 - Exploring the Clinical Moment: Listening Psychoanalytically 2016
 Debra Carriere, PhD, Ralph Beaumont, MD
 - Summer Intensive Rorschach Training Workshop 2016
 Nancy Thurston, PsyD, ABPP, Certified Analyst
 - Relational Psychoanalysis and Christian Faith: A Heuristic Dialogue 2015
 Marie Hoffman, PhD
 - Spiritual Formation and Psychotherapy 2015
 Barrett McRay, PsyD
 - “Facetime” in an Age of Technological Attachment 2014
 Doreen Dodgen-Magee, PsyD
 - Understanding and Treating ADHA & Learning Disabilities DSM5 2014
 Erika Doty, PsyD, Tabitha Becker, PsyD

CAMS TRAINING OUTCOME

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Collaborative Assessment and Management of Suicidality 2014
Luann Foster, PsyD

Annual Northwest Psychological Assessment Conference 2014
WISC-V: Overview and Demonstration of the Upcoming Revision, Patrick Moran, PhD
Woodcock-Johnson-IV: A New Era of Assessment & Interpretation, Stephanie Rodriguez, EdS
Assessing Therapeutic Outcome: Improving Your Effectiveness and Satisfaction in Clinical Practice, Carlos Taloyo, PhD

Evidenced Based Treatment for PTSD in Veteran Populations: Clinical and Integrative Perspectives 2013
David Beil-Adaskin, PsyD

Integrated Primary Care 2013
Brian Sandoval, PsyD, Juliette Cutts, PsyD

COMMUNITY SERVICE

Goose Hollow Family Shelter
Neighborhood House Food Pantry

ADDITIONAL

Passed PGRE requirement for George Fox PsyD program (97th percentile)
Fluent in Korean
Rock climbing enthusiast
Solo globe trotter
Avid fan of culinary arts: consuming and creating in community

REFERENCES

Mary Peterson, PhD, ABPP, Licensed Psychologist
Department Chair, George Fox University Graduate Department of Clinical Psychology
Phone: 503.442.3237 Email: mpeterso@georgefox.edu

Susan Sussman, PhD, License Psychologist
Director, Psychology Education and Training Columbia University Medical Center
Phone: 212.305.6180 Email: sms11@cumc.columbia.edu

Mary Commerford, PhD, Licensed Psychologist
Director, Furman Counseling Center, Barnard College
Phone: 212.854.2092 Email: mcommerford@barnard.edu