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Educating Providers About Integrated Treatment For Individuals With Co-Occurring Disorders

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Walden University

College of Nursing

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Ihuarulam Okoroji

has been found to be complete and satisfactory in all respects, and that any and all revisions required by the review committee have been made.

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Walden University 2022

Abstract

Educating Providers About Integrated Treatment for Individuals

With

Co-Occurring Disorders

by

Ihuarulam Chidiebere Okoroji

MS, Walden University, 2015

BS, Alvernia University, 2009

Project Submitted in Partial Fulfillment
of the Requirements for the Degree of
Doctor of Nursing Practice

Walden University

December 2022

Abstract

The problem identified by this staff education project was the providers' lack of knowledge on integrated treatment for individuals with co-occurring disorders (CODs). Integrated treatment is the gold standard for working with individuals with CODs. Providers knowledge gap and barriers were addressed by educating them on integrated treatments. This project used the analysis, design, development, implementation, and evaluation (ADDIE) model in planning, implementation, and evaluation. The participants were 20 providers in residential addiction treatment facility which include one physician, three nurse practitioners, eight counselors, one registered nurse, and seven licensed practical nurses. This project used a pretest to determine the learning needs of the participants and a posttest to assess the outcome of the staff education. This project applied descriptive statistics to organize, summarize, and analyze the pretest and posttest data to find the percentage difference and draw a conclusion. The educational topic was evaluated and met the expectation of the two content experts. After implementing the staff education project, the findings showed an increase in knowledge and understanding of integrated treatment by 28%. The percentage of participants who were likely or very likely to use integrated treatments increased by 40%. The result findings of the literature matrix of twenty current evidence-based literature supported integrated treatment for individuals with CODs. This project aligns with Walden's vision, mission, and social change as it will shape the care given to individuals with CODs. Individuals will learn to move beyond their illness and pursue meaningful lives toward meaningful recovery.

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Acknowledgments

Special thanks to my DNP chairperson, Dr. Lilo Fink, DNP, FNP, RN, who gave me personalized attention and led me through my prospectus stage and my DNP project and went above and beyond to ensure that I stayed on track throughout the process. I want to thank committee member Dr. Patricia Schweickert and University Research Reviewer Dr. Mark A. Wells for their support. I appreciate Walden University for providing a flexible educational platform that allows busy mothers like me to continue to work and take care of family while pursuing their academic coursework at the same time. I am forever grateful for completing both MSN and DNP at Walden University.

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Section 1: Nature of the Project

Introduction

In the United States, about 10 million individuals suffer from a mixture of at least one co-occurring mental health disorder (CODs) and substance use disorder (SUDs) in an average year (Foundations Recovery Network, 2021). Research showed that addressing comorbidities related to SUD through comprehensive and integrated treatment is a high priority (National Institute on Drug Abuse, 2020). SUDs are disproportionately represented among individuals with mental health disorders (Igbal et al., 2019). Addiction providers must have the ability to understand and recognize individuals with SUDs who also have mental health disorders (NAADAC, 2018). Common mental health disorders that co-exist in individuals with SUDs are bipolar disorders, major depression, anxiety disorders, trauma, stress-related disorders, personality disorder, and schizophrenia spectrum disorders (Yule & Kelly, 2019). CODs are prevalent in individuals with SUDs; about 50% to 75% of individuals with SUDs also had mental health disorders at one time in their lives (NAADAC, 2018).

Research has shown that nearly 7.7 million adults suffer from co-occurring mental health and substance use disorders and of the 20.3 million individuals who are struggling with SUD, about 37.9 % of them also have mental illness and among the 42.1 million individuals with mental illness, 18.2 % of them have SUDs (National Institute on Drug Abuse, 2018). These numbers are alarming about 52.5% of these individuals have not received mental health care or substance use treatment only 34.5% have received mental health care; about 9% have received both mental health care and substance use

treatment, and about 3.9% have received only substance use treatment (National Institute on Drug Abuse, 2018). Recovery involves not only refraining from substance use, symptoms control, and/or treatment compliance it should allow individuals to live a meaningful personal life (Substance Abuse and Mental Health Services Administration [SAMSHA], 2020).

Problem Statement

The problem identified in this doctoral project was the lack of knowledge of providers on integrated treatment for individuals with CODs). My project was a staff education project to increase provider knowledge of integrated treatment for individuals with CODs. The providers' knowledge gap and barriers were addressed by adequately equipping them with the knowledge needed to engage and develop therapeutic rapport with individuals with a co-occurring mental health disorder (SAMSHA, 2020). About 52.5% of these individuals with CODs did not receive either mental health care or substance use treatment, and only 34.5 % received mental health care; only about 9% received both mental health care and substance use treatment, and about 3.9% received only substance use treatment (National Institute on Drug Abuse, 2018). Research showed that nearly 7.7 million adults suffer from co-occurring mental health and substance use disorders (National Institute on Drug Abuse, 2018). About 20.3 million individuals are struggling with SUDs, and 37.9 % of them also have a mental illness; among the 42.1 million individuals with mental illness, 18.2 % of them have SUDs. (National Institute on Drug Abuse, 2018). The project site had limited support for training health care4 providers on integrated treatments and lacked a clear framework for establishing the

needs and priorities on integrated treatment for CODs my preceptor and the medical director of my project site. There is no onsite psychiatrist or psychologist to support individuals with CODs. This project site had about 150 patients with SUDs, and 75 of them had CODs. The site did not have an onsite psychiatrist or psychologist to support the mental health needs of the patients. These individuals need both substance use treatment and mental health treatment services. The treatment providers must recognize the existence of CODs and the need for appropriate education and knowledge building by designing an educational program to meet this need (NAADAC, 2018). CODs have been associated with poorer patient outcomes, increased rate of relapse, poor recovery, increased use of psychiatric services, and increased use of emergency services (Yule & Kelly, 2019). A significant reason for decreased use of integrated treatment for individuals with CODs is a lack of identification of CODs by providers through effective routine screening (Yule & Kelly, 2019).

Purpose Statement

This staff education project sought to evaluate the impact of educating the providers in an addiction treatment facility on integrated treatment for individuals with CODs. SAMSHA (2020) has recognized the need to train providers on integrated treatment and has made recommendations for treatment providers to provide quality care to individuals with CODs. When providers incorporate integrated treatment approaches in the care of those with both mental health disorders and SUDs, these individuals will learn to move beyond their illnesses and pursue meaningful life toward meaningful recovery (SAMSHA, 2020). There is an urgent need to change the current treatment and

delivery approach and incorporate healthcare providers, nurses, and counselors in achieving better performance and improve quality patient care by being equipped with adequate knowledge to care for the complex needs of individuals with CODs, thus improving health care outcomes (SAMSHA, 2020).

The guiding practice-focused questions for this doctoral project were the following:

- 1. Will the evidence from the literature supports educating addiction treatment providers on integrated treatment for individuals with CODs?
- 2. Will a staff education program on integrated treatment increase the knowledge of providers at an addiction treatment facility from pre to post-test survey?
- 3. Will the likelihood of the addiction treatment providers to utilize integrated treatment for individuals with CODs increased from pretests to posttests?

To address the gap in practice, the providers were equipped with the knowledge of integrated treatment to recognize the acuity of symptoms, the severity of illness, chronicity of symptoms, co-occurring drug use, physical health, cognitive impairment, and recovery capital (Yule & Kelly, 2019). The purpose of this evidence-based staff education project was to promote recovery, enhance coping, enhance treatment engagement, promote retention, and treatment completion for individuals CODs through increasing the providers' knowledge of integrated treatment. There is a significant gap between the treatment and services for individuals who are struggling with CODs need and the actual treatment and services they receive (SAMSHA, 2020).

According to SAMSHA (2020), to bridge the gap in the access and provision of treatment; providers must properly engage in timely evidence-based screening and

assessment, and establish good provider-patient rapport to enhance treatment outcomes. For better patients outcomes and to close treatment gaps, individuals with CODs must attain long-established recovery by properly educating the providers on the impact of these disorders (SAMSHA, 2020). It is crucial to develop a curriculum for initial and ongoing training and supervision to support substance abuse treatment providers in attaining competencies and rewarding providers for achieving competencies as well (SAMSHA, 2020).

Nature of the Doctoral Project

The purpose of this staff education project was to evaluate the impact of educating providers in an addiction treatment facility on integrated treatments for individuals with CODs. This project used 20 current evidence-based guidelines from government agencies, the Walden University library, media coverage, publicly disseminated reports, public websites, peer-reviewed studies, and other bodies of written knowledge published within 5 years. This project focused on improving the knowledge of the providers at my project site on integrated treatment for individuals struggling with CODs to provide quality care and enhance treatment outcomes. This education project utilized Walden's manual for staff education (Walden University, 2019), and incorporated the development of a staff education program for professional staff in a residential addiction treatment facility. The planning, implementation, and evaluation steps outlined in the Walden University Staff Education Manual (Walden University, 2019) were administered using the analysis, design, development, implementation, and evaluation (ADDIE) model to ensure teaching appropriate materials at the highest

standard. The preceptor and I will present the staff education project to the organizational leadership and the treatment providers. The participants were invited via email. This education project was held in person following COVID-19 precautions, the participants completed anonymous pretest and posttest questionnaires. After the staff education project was presented to the participants, the effectiveness of the education project and the knowledge of the participants was evaluated from pretest to posttest by inputting all data, demographics, and information collected in statistical tools. Studies support the efficacy of integrated treatment for individuals suffering from CODs; following the course of integrated treatment modalities, clinicians noticed significant improvements in symptoms of depression, anxiety, and posttraumatic stress syndrome in individuals with CODs (Trottier et al., 2017).

Significance

Educating providers and identifying basic elements of integrated treatment approaches that address both SUDs and mental health disorders are crucial to positive patient outcomes such as improved retention, treatment engagement, enhanced recovery, and treatment completion (SAMSHA, 2020). When providers incorporate integrated treatment approaches in the care of those with both mental health disorders and SUDs individuals will learn to move beyond their illnesses and pursue meaningful life toward meaningful recovery. The Treatment Improvement Protocol (TIP) re-enforces the mission of SAMSHA by supporting the behavioral health field with the provision of evidence-based treatment guidance (SAMSHA, 2020). TIP was developed based on the most recent evidence-based research and extensive experiences in the substance abuse

treatment field to focus on co-occurring SUDs and mental health disorders (SAMSHA, 2020). Given the significance of CODs, providers must have the ability to identify the presence of CODs and understand the nature, scope, chronicity, and complexity of CODs (Yule & Kelly, 2019). The evidence-based treatment that supports CODs and getting treatment facilities to become dual diagnosis needs staff training due to its complexity (Pierre, 2018). Most individuals with CODs are treated by providers with minimal substance abuse disorder training (Pierre, 2018). This doctoral project aligns with Walden's vision, mission, and commitment to social change as it will embrace innovative approaches that will shape the care given to individuals with CODs (Walden University, 2021).

Summary

This section outlined the prevalence of CODs, as well as the negative impact and significance of mental health disorders in individuals struggling with SUDs. It identified the problem statement, outlined the guiding practice-focused questions, and identified the purpose of this staff education project. It also emphasized the significant need for addiction treatment providers to demonstrate the ability to understand and recognize individuals with CODs by developing a curriculum for initial and ongoing training and supervision for substance abuse treatment providers. Section 2 explored the importance of addiction treatment providers developing the knowledge needed to correctly identify and manage COD symptoms through integrated treatment. Section 2 explored the ADDIE model as the instructional model used in planning, implementation, and evaluation to ensure teaching appropriate materials and addressing the program goals, objectives, and learning needs of the participants.

Section 2: Background and Context

Introduction

The practice problem identified for this staff education project is the providers' lack of knowledge on integrated treatment for individuals with CODs. The project site cannot support and address the complex needs of individuals with CODs. The guiding practice-focused questions for this project were:

- 1. Will the evidence from the literature supports educating addiction treatment providers on integrated treatment for individuals with CODs?
- 2. Will the staff education program on integrated treatment increase the knowledge? of providers at an addiction treatment facility from pretest to posttest survey?
- 3. Will the likelihood of the addiction treatment providers to utilize integrated treatment for individuals with CODs increase from pretest to posttest?

This staff education project will help close the gap in practice by equipping addiction treatment providers with the knowledge needed to adequately care for individuals with CODs. This staff education project for addiction treatment providers will use the ADDIE instructional model to develop evidenced based training on integrated treatments for residential addiction treatment providers that aligns with Healthy People 2030 leading health indicators. My project team, which includes my preceptor, two content experts, and myself as the leader will ensure project usability. For better patient outcomes and to close treatment gaps, individuals with CODs must be supported in attaining long-established recovery through proper education for providers on the impact

of these disorders (SAMSHA, 2020).

Concepts, Models, and Theories

ADDIE Model

Following Walden's manual for staff education (2019), this Doctor of Nursing Practice (DNP) project incorporated the development of a staff education program for professional staff in a residential addiction treatment facility. The planning, implementation, and evaluation steps outlined in the Walden University Staff Education Manual (Walden University, 2019) were administered using the ADDIE model to ensure teaching appropriate materials at the highest standard and provided support and structure for this project. The use of the ADDIE model in planning the doctoral project included researching relevant literature, and teaching material that addressed the program goals and objectives. I analyzed the need and criteria for the staff education program using available information from literature and theoretical support (Walden University, 2019). The ADDIE model is an effective tool used in this staff education project to provide structure and support (Kim et al., 2020). ADDIE model using a systematic process for this staff education project provided a guide to support communication between my project team and myself (CDC, 2018). The five cyclical stages of the ADDIE models (analysis, design, development, implementation, and evaluation) fed into the next stage and provided the opportunity to get feedback from the participants (Centers for Disease Control and Prevention, 2018). ADDIE instructional design provided an ecologically valid and systematic process to help develop evidenced-based learning strategies using a multifaced approach to implement this staff education project for addiction treatment providers (Patel et al., 2018).

Planning

Using the ADDIE model in planning the doctoral project includes researching relevant literature, and teaching material that addresses the program goals and objectives. I analyzed the need and criteria for the staff education program using available information from the literature and theoretical support (Walden University, 2019). I discussed needs and staff education programs with organizational leadership and obtained their support. I drew up specific measurable learning objectives and outcomes. I developed the staff education program, including the content and the delivery strategy, using appropriate instructional methods and theoretical frameworks (Walden University, 2019). This education project will be held via an in-person training session.

Implementation

After receiving Institutional Review Board (IRB) approval, I verified the plan for the staff education project with organizational leadership and major stakeholders through iterative review and revised the staff education plan based on the outcome of the review (Walden University, 2019). I presented the revised staff education program to the organizational leadership and major stakeholders and discussed it to confirm its content and ensured usability (Walden University, 2019). I finalized the development of the staff education program with my preceptor and the content experts and reviewed it with organizational leadership and stakeholders (Walden University, 2019). I supported the organization in the recruitment of staff for the education program, and the project site supervised the education program. The project team reviewed all materials developed, (i.e., contents, and curriculum), and will validate the pretest and posttest, the overall plan

and design, and how the project will be delivered.

Evaluation

The participants completed an anonymous pretest and posttest questionnaire that aligned with the project practice-focused questions and directly related to the identified learning objectives (Walden University, 2019). The participants were assigned numbers to refer to them during education and to keep the data organized. The evaluation of the data comprised the curriculum evaluation by the project team, the results of the demographic survey pretest and posttest, participants' evaluation of the educational program, and a summary of the evaluation of myself as the team leader. The effectiveness of the education project and the knowledge of the participants from pretest to posttest were evaluated by inputting all data, demographics, and information collected in a statistical tool. I utilized descriptive statistics to organize, summarize, and analyze the characteristics of the pretest and posttest to find the percentage difference between pretest and post-test, and draw a conclusion. The findings, results, and long-term goals of the education project was communicated to the organizational leadership, and the publication result will be presented through Walden University (Walden University, 2019).

Relevance to Nursing Practice

Given the increased prevalence of CODs and their associated morbidities secondary to the co-existence of SUDs and mental health disorders; it is imperative for addiction treatment providers to incorporate treatment modalities that will address both substance abuse disorders and mental health disorders (Yule & Kelly, 2019). With the

increase in nursing practice demand and the increased complexity of the health care systems, there is an urgent need to re-assess the clinical practice level of education of health care providers, including nurses (American Association of Colleges of Nursing [AACN], 2020). This project is committed to advancing the nursing profession by addressing scientific knowledge for safe nursing practice and improving quality patient care delivery and positive patient outcomes, as outlined in the DNP Essentials (AACN, 2020). This project aligns with Healthy People 2030 in that increasing the number of individuals with CODs who receive treatment for both disorders is one of the leading health indicators and objectives of Healthy People 2030 (U.S Department of Health and Human Services, 2021). Substance abuse treatment providers must continue to be educated to use integrated treatments to improve treatment approaches for individuals with CODs (SAMSHA, 2020). Due to the barriers to establishing and maintaining integrated treatment, less than 4% of individuals with CODs are treated with integrated treatment, and fewer than 20% of addiction treatment programs and 10% of mental health programs in the United States met the criteria for dual-diagnosis treatment programs (Pierre, 2018).

Local Background and Context

The setting for this doctoral project is a residential addiction treatment facility in southeastern Pennsylvania with one physician (MD), four nurse practitioners (NPs) (Including me), 10 substance abuse counselors, one registered nurse (RN), and 10 licensed practical nurses (LPNs). This project site was unable to serve individuals with CODs because of a lack of knowledge and skills needed to care for this population,

leading to significant practice problems as medical providers, counselors, and nurses lack the knowledge to treat patients with CODs and thus, creating a practice-related problem of a high priority. According to the National Survey on Drug Use and Health (NSDUH), only about 3.4% of adults with CODs received both substance abuse treatment and mental health treatment in 2018 (U.S. Department of Health and Human Services, 2021). Giving the providers the knowledge needed to recognize and be able to appropriately care for individuals with CODs will help meet the goal of Healthy People 2030. It is the goal of SAMSHA (2020) to treat CODs and support both those seeking treatment and those who are recovering from addiction. SAMSHA strives to reduce the impact of mental health and substance use disorders in American individuals and communities suffering from CODs. This project site's inability to support individuals with CODs through integrated treatment modalities created a significant gap between the practice at the site and the recommendations of Healthy People 2030 and SAMSHA.

Role of the DNP Student

I am a DNP student and work with individuals who are struggling with different forms of SUD in an addiction treatment inpatient facility with addiction as an NP. I am disturbed by the high prevalence of individuals who present with both SUD and mental health disorders concurrently and the lack of treatment modalities that address both SUD and mental health disorders. I am directly involved with treating patients and mentoring nurses and other NPs regarding patient care, evidence-based practices, innovations, and policy development following federal, local, and state regulations and guidelines.

According to the AACN (2020), the DNP-prepared nurse can develop and evaluate a care

delivery approach to meet the current and future needs of a target patient population, built on scientific evidence-based findings, and organizational, political, and economic science. As a DNP-prepared nurse, I have developed advanced competencies in policy development, the ability to tackle complex clinical issues, and the leadership skills to improve nursing practice and patient outcomes (AACN, 2020).

Role of the Project Team

To put this project into effect, I collaborated with my preceptor, two content experts, and the organizational leadership. My preceptor is an experienced substance abuse physician, and the two content experts content expert 1 is an addiction psychiatrist with expertise in the diagnosis and treatment of substance abuse and mental health conditions and content expert 2 is addiction psychologist who is an expert in the evaluation of behavioral issues including identification and treatment interventions. The content experts and my preceptor reviewed all materials developed, their contents, and the curriculum, validated the pretest and posttest, and reviewed the plan, design, and how the project was delivered. The content experts validated the pretest and posttest questionnaires for relevance and determined that they were very relevant and met the educational objectives. The project team evaluated the educational PowerPoint as very relevant and informative and met the educational goals. The project team reviewed the project outcome findings and shared with me their expertise and contextual insight and ensured project usability. My preceptor and the content experts provided guidance and clear direction every step of the way and were readily available to help me where needed. I met with my project team every month for 3 months after the staff education project to

monitor patient treatment engagement and provider awareness.

Summary

Section 2, identified the providers' lack of knowledge of integrated treatment for individuals with CODs as a significant practice problem in the addiction treatment facility and explored my role as the DNP student and the role of the project team in this staff education project. I explored the relevance of this practice problem to nursing practice and outlined the setting of this doctoral project and the significant need to educate providers in integrated treatment for CODs. This section also addressed how the ADDIE instructional model was used in the planning and implementation of this staff education project. Section 3 addressed the gap in practice, outlined the sources of evidence, and provided a literature review.

Section 3: Collection and Analysis of Evidence

Introduction

The purpose of this staff education project is to evaluate the impact of educating the providers in an addiction treatment facility on integrated treatment for individuals with CODs. This project identified the providers' lack of knowledge of integrated treatment for individuals with CODs. SAMSHA (2020) recommends integrated treatment as the best practice for serving individuals with CODs. According to SAMSHA, it is crucial for a dual diagnosis treatment program to utilize a combination of person-centered comprehensive mental health treatment modalities and substance abuse intervention that is geared toward individual needs. The providers' knowledge gap and barriers were addressed by adequately equipping them with the knowledge needed to engage and develop therapeutic rapport with individuals with a co-occurring mental health disorder (SAMSHA, 2020).

Inadequate screening of individuals with SUDs led to significant issues with cumulative effects (SAMSHA, 2020). The providers' lack of knowledge of integrated treatment signified a lack of proper assessment, which prevents the identification of those with CODs. Substance abuse counselors and other providers can prevent negative patient outcomes through proper screening and thorough assessment to identify and recognize symptoms and diagnose CODs (SAMSHA, 2020). It is critical for organizational leadership to appropriately address workforce challenges such as unmet training needs and lack of knowledge in the management of individuals with co-occurring disorders to

improve treatment availabilities and quality of care (SAMSHA, 2020).

Practice-Focused Question(s)

The gap in practice that this doctoral project address is providers' lack of knowledge of integrated treatment for CODs. This project site did not have the treatment services needed to provide the appropriate level of care to adequately screen for CODs as recommended by SAMSHA. Psychiatrists and psychologists were not on-site to address mental health conditions. SAMSHA recognized the need to train providers on integrated treatment and has made recommendations for treatment providers to provide quality care to individuals with CODs (SAMSHA, 2020). When providers incorporate integrated treatment approaches in the care of those with both mental health disorders and substance abuse disorders, these individuals will learn to move beyond their illnesses and pursue meaningful life toward meaningful recovery (SAMSHA, 2020). There is a need for clinicians to develop the knowledge needed to correctly identify and manage individuals with CODs (SAMSHA, 2020). There is an urgent need to change the current treatment and delivery approach and involve healthcare providers in achieving better performance and improving quality patient care by being equipped with adequate knowledge to care for the complex needs of individuals with CODs, thus improving healthcare outcomes (SAMSHA, 2020). The guiding practice-focused questions for this doctoral project were the following:

- 1. Will the evidence from the literature support educating addiction treatment providers on integrated treatment for individuals with CODs?
- 2. Will a staff education program on integrated treatment increase the

- knowledge of providers at an addiction treatment facility from pretest to posttest survey?
- 3. Will the likelihood of the addiction treatment providers to utilize integrated treatment for individuals with CODs increase from pretests to posttests?

Sources of Evidence

For this doctoral project, I used current evidence-based guidelines from government agencies, the Walden University library, media coverage, publicly disseminated reports, public websites, peer-reviewed studies, and other bodies of written knowledge that supports integrated treatment modalities for individuals with CODs. All literature used for this project was published within 5 years of my anticipated graduation date (i.e., from 2017 to 2022). I used a literature matrix to compile details of my sources and evaluated literature using the Johns Hopkins evidence-based practice appraisal tool. *Keywords and phrases were as follows: integrated treatment, dual diagnosis, substance use disorders, mental health disorders, provider education, training, provider competencies, and co-occurring disorders.*

According to a national survey conducted from 2015 to 2017 on drug use and health data, CODs are common in adults; as such there is an urgent need to increase access to comprehensive care for CODs (Jones & McCance-Katz, 2019).

Literature has shown that integrated treatments based on evidence for individuals with CODs have revealed successful outcomes in individuals struggling with CODs (Avery & Barnhill, 2017). In the United States, about 10 million individuals suffer from a mixture of at least one co-occurring mental health issue and a substance abuse disorder in an

average year (Foundations Recovery Network, 2021). Addiction treatment providers must develop the knowledge needed to correctly identify and manage individuals with CODs (SAMSHA, 2020).

Provider Awareness

The priority of (SAMSHA (2020)) is to enhance the awareness of healthcare providers about mental health disorders and to give guidance on how to manage individuals with CODs. Mental health services and SUD treatment services are advancing in the direction of identifying the fundamental level of integrated competencies and training for all providers (SAMSHA, 2020). In a study conducted by SAMSHA in 2018, about half of the adults with CODs did not receive any treatment, about 30% of adults with serious mental illness and CODs did not receive any treatment, about 3% received only substance abuse treatment, and only 11% received both substance abuse and mental health treatments (SAMSHA, 2020). Studies have shown that there are significant issues with the management and treatment of individuals with CODs and there is a need to advance knowledge about appropriate, specialized methods for screening, assessment, diagnosis, and coordinated care for individuals with both SUDs and mental health disorders (SAMSHA, 2020). Patients and families prefer integrated treatments over fragmented care for individuals with CODs (Ford et al., 2018). Even though there have been several years of integrated treatment awareness, integrated treatments continue to be underutilized (Ford et al., 2018).

Clinicians continue to experience significant challenges and confusion with the recognition, management, and treatment of individuals with CODs (Igbal et al.,

2019). Providers are facing frightening challenges due to the adverse impact of mental health disorders on SUDs and/or vice versa (Igbal et al., 2019). Clinicians continue to experience significant challenges in the recognition, management, and treatment of individuals with CODs (Igbal et al., 2019). Providers are facing frightening challenges due to the adverse impact of mental health disorders on SUDs and/or vice versa (Igbal et al., 2019). Providers must look carefully for substance use in individuals with mental health disorders and look for mental health disorders in individuals with SUDs (Avery & Barnhill, 2018).

Patient Treatment Engagement

According to SAMSHA (2020), to bridge gaps in the access and provision of treatment providers must properly engage in timely and evidence-based screening and assessment, and establish good provider-patient rapport to enhance treatment outcomes. To promote better patient outcomes and close treatment gaps, providers must be properly educated on the impact of these disorders to help individuals with CODs attain long-established recovery (SAMSHA, 2020). It is crucial to develop a curriculum for initial and ongoing training and supervision to support substance abuse treatment providers in attaining competencies, as well as reward them for achieving competencies. (SAMSHA, 2020). Substance abuse treatment providers must continue to be educated to use integrated treatments to improve treatment approaches that address individuals with CODs (SAMSHA, 2020). The goal of the NAADAC, the Association for Addiction Professionals, is to provide substance abuse treatment providers with the resources needed to work with individuals with CODs (NAADAC, 2018). Among other

available treatments for individuals with CODs, integrated treatment is preferred for individuals who are struggling with both mental health disorders and substance abuse disorder symptoms concurrently (NAADAC, 2018). Integrated treatments treat all CODs as one component that causes significant dysfunction. It is crucial for substance abuse providers to understand and recognize mental health disorders in individuals who present for substance abuse treatment (NAADAC, 2018). Individuals with CODs have more negative outcomes than those with either a substance abuse disorder or mental health disorder alone (NAADAC, 2018). Even though continuous efforts are being made to enhance treatment engagements and retention for individuals who struggle with SUDs, research shows a moderate rate of utilization (Marchand et al., 2019). Individuals with CODs are at an increased risk for self-harm, especially if they experienced significant trauma in the past. Identifying factors that influence outcomes of integrated treatment for CODs is very important for maximizing health and treatment outcomes (Flanagan et al., 2017).

The Burden of Co-Occurring Disorders

Evidence has shown that many individuals with CODs have negative outcomes in many aspects of their lives, including illness management, housing stability, psychosocial function, hospitalization, legal system involvement, physical health, and early mortality (Acquilano et al., 2020). Families suffer and struggle as they try to help their family members, communities struggle to provide adequate services in areas such as crime control and homelessness, and society struggles with social and financial problems as a result of these disorders (Acquilano et al., 2020). The effects of CODs have

increased the financial burden on healthcare systems, and evidence has shown that integrated treatments are more effective than non-integrated treatments in addressing the symptoms associated with CODs through the reduction of substance use and are more cost-effective (Karapareddy 2018). In light of the increased co-existence of SUDs and mental health disorders, SUDs are disproportionately represented among individuals with mental health disorders, leading to significant morbidity and mortality, and a significant burden on the entire healthcare system (Igbal et al., 2019).

Individuals with CODs suffer more negative outcomes than those with either a substance abuse disorder or a mental health disorder alone; individuals with CODs are more likely to leave treatment early and have increased risk of relapse, legal issues, incarceration, unemployment, school issues, work issues, and low satisfaction with treatment (NAADAC, 2018). According to a national survey on drugs and health conducted by SAMSHA in 2018, only 3.4% of adults with CODs received both mental health treatment and substance abuse treatment (U.S Department of Health and Human Services, 2021). Adults with CODs frequently get treated for either mental health disorders or substance abuse disorders. Healthy People 2030 objectives target 8.2% of adults with CODs receiving treatments for both SUDs and mental health disorders (U. S. Department of Health and Human Services, 2021). It is the goal of SAMSHA (2020) to treat CODs and support those seeking treatment and those who are recovering from addiction. SAMSHA strives to reduce the impact of mental health and substance use disorders on Americans suffering from CODs. The co-occurrence of mental health disorders and substance abuse disorders are significant clinical issue. A growing body

of evidence indicates the need for integrated treatments, including psychological and pharmacological approaches to address the symptoms associated with CODs (Avery & Barnhill, 2017).

In 2018, about 20% of adults in the United States had a form of mental health disorder, and 20% of them had SUD; in the same year, about 4 million individuals with SUD had a major depressive episode (Vekaria et al., 2021). Major depression and substance use have a mutual relationship and increases each other's risks, making it very difficult for individuals affected. If not addressed, will lead to poor health outcomes such as severe functional impairment, poorer recovery rates, increased suicidal ideation and attempts, and higher rates of health care utilization (Vekaria et al., 2021). There is a high prevalence of comorbidity that exists between SUD and schizophrenia or first-episode psychosis (Hunt et al., 2020). Evidence has shown that SUDs are difficult to treat in individuals with schizophrenia or first-episode psychosis and there is better prevention, detection, and treatment of SUD with schizophrenia and other comorbid disorders (Hunt et al., 2020). Co-occurring mental health disorders can complicate substance abuse treatment processes and outcomes. Integrated treatment increases the utilization of posttreatment services and reduces substance use readmissions (Ostergaard et al., 2018). Research has shown that addressing comorbidities related to SUD through comprehensive and integrated treatment is a high priority (National Institute on Drug Abuse, 2020). This staff education project will address providers' lack needed to adequate assessment and recognition of mental health disorders in individuals with SUDs.

The Role of Integrated Treatments

Evidence has shown that individuals with CODs need an integrated treatment approach to achieve remarkable improvements in their condition, therefore, providers must use both pharmacological and psychotherapeutic approaches when working with individual CODs (Igbal et al., 2019). Integrated treatments for SUDs and mental health disorders with a collaborative multidisciplinary team approach are better than treating these disorders sequentially (Kikkert et al., 2018). According to a national survey conducted from 2015 to 2017 on drug use and health data, CODs are common in adults; there is an urgent need to increase access to comprehensive care for CODs (Jones & McCance-Katz, 2019). Literature has shown that integrated treatments based on evidence for individuals with CODs have revealed successful outcomes in individuals struggling with CODs (Avery & Barnhill, 2017). Integrated treatment is the best comprehensive treatment modality that addresses both mental health disorders and SUDs; however, only about 25 % of mental health providers incorporate integrated treatments (Ford et al., 2021). In light of the high prevalence and increased morbidity associated with CODs, it is critical for addiction treatment providers to address both disorders at the same time to improve treatment outcomes (Yule & Kelly, 2019). Evidence has shown that incorporating integrated treatments at the beginning of treatment in individuals with CODs can increase motivation, treatment engagement, and treatment completion (Ostergaard et al., 2018). Integrated treatments demonstrate efficacy in simultaneously decreasing symptoms associated with mental health disorders and substance abuse disorders (Saraiya et al., 2022).

The significance of integrated treatment is an important idea of evidence-based dual diagnosis treatment that supports CODs, and getting providers in treatment facilities to perform dual diagnosis requires staff training due to the complexity of this task (Pierre, 2018). With all this being said, integrated treatment services are gold standards for addressing co-occurring mental health disorders and SUDs, and they are not readily available to be used by addiction treatment providers (Chokron et al., 2022). Because the effects of substance abuse disorders and mental health disorders significantly impact individuals' functioning and prognosis, integrated treatment captures and recognizes the diversity associated with individuals suffering from CODs such as acuity of symptoms, the severity of illness, chronicity of symptoms, physical health, recovery capital, and cognitive impairment (Yule & Kelly, 2019). There is evidence that co-occurring mental disorders and SUDs improve with treatments and therapeutic approaches (Avery & Barnhill, 2017). Evidence indicates that integrated treatment models of care are more effective in reducing substance use symptoms than conventional non-integrated treatment models through the reduction of SUD symptoms (Karapareddy, 2019).

Accessibility of Integrated Treatment

Due to barriers associated with establishing and maintaining integrated treatment, less than 4 % of individuals with CODs are provided with integrated treatment, and fewer than 20% of addiction treatment programs and 10% of mental health programs in the United States met the criteria for dual-diagnosis treatment programs (Pierre, 2018). Studies support the efficacy of integrated treatment for individuals suffering from CODs; following the course of integrated treatment modalities, clinicians have noticed

significant improvements in symptoms of depression, anxiety, and post-traumatic stress syndrome in individuals with CODs (Trottier et al., 2017). The combination of SUDs and comorbid mental health disorders are common problem, and integrated treatment is one of the effective methods used to treat CODs (Neven et al., 2018). Most individuals with CODs are treated by providers with minimal substance abuse disorder training (Pierre, 2018). Giving providers the knowledge needed to recognize and be able to appropriately care for individuals with CODs will help in meeting the goal of Healthy People 2030. The lack of accessibility to integrated treatment for individuals who are struggling with both SUDs and mental health disorders is a chronic public health problem (Ford et al., 2018). About 8.2 million adults in the United States suffer from CODs, and despite wellestablished positive outcomes of integrated treatment services. Evidence has shown that access to integrated treatments continues to pose a significant challenge (Assefa et al., 2019). Evidence has that access to integrated treatment for individuals with CODs is a major issue, as only about 7 % of individuals who need integrated treatment can receive it (Ford et al., 2021). There is a significant correlation between SUDs and mental health disorders, leading to increased morbidity as a result of the existence of CODs; both disorders must be addressed through integrated treatment (Yule & Kelly, 2019).

Participants

The participants for this doctoral project are providers in a residential addiction treatment facility that works with individuals with CODs. The providers include one physician (MD), four NPs (including me), ten substance abuse counselors, one RN, and 10 LPNs.

Procedures

This education project utilized both formative (pretest) to determine the learning needs of the providers and summative (posttest) evaluation to assess the outcome of the training and the effectiveness of the staff education project. The staff education module was developed iteratively and ensured that the objectives and learning needs of the providers were effectively met and addressed. All learners completed the formative evaluation (pretest) before the education session and summative (posttest) following the education session and demonstrated 80% or better mastery of knowledge.

Ethical Considerations

This staff education project maintained the guidelines outlined in the Walden University's (2019) DNP manual for a staff education project. To ensure that the goals were met, I obtained approval from the project site administrators and complied with all the organization's policies. I sought ethics approval from the University's Institutional Review Board (IRB). I did not use the name of the organization and general location in all materials and drafts so that the organization was not identifiable and obscured any information that could allow a reader to identify the identity of the organization. I ensured that no proprietary, sensitive, or confidential information was disclosed in this project. I will continue to keep collected data in a locked filing cabinet for 5 years. I abided by the organizational policies on the use of the organization's resources.

Analysis and Synthesis

At the initial stage, invitation emails were sent to the participants requesting them to volunteer and participate in the staff education project which involved the collection of demographic data, pretest, and posttest that aligned with the project practice-focused questions, and identified the learning objectives (Walden University, 2019). The participants were assigned numbers that were referred to during the education project to help keep the data organized. The effectiveness of the education project and the knowledge of the participants from the pretest to the posttest were evaluated by inputting all data, demographics, and information collected into a statistical tool. This project utilized descriptive statistics to summarize, and analyze the characteristics of the pretest and posttest data to determine the mean percentage difference. The project team evaluated the curriculum, the results of the demographic survey, pretest and posttest, participants' evaluation of the educational program, and the summary of myself as the leader. The last step was presenting the findings, results, and long-term goal of the education project to the organizational leadership and presenting the publication results through Walden University (Walden University, 2019).

Summary

This section identified the significant need for substance abuse providers to increase the knowledge of integrated treatment for individuals with CODs to address the gap in practice and address the practice-focused questions. This section also explored the literature review in five categories as follows: provider awareness, patient treatment engagement, the role of integrated treatment, and accessibility of integrated treatment.

This section identified the plans and steps for this staff education project including the initial steps of inviting the participants, pretests, posttests, gathering data, analysis, and synthesis. Section 4 addressed the findings and implications of this staff education project and addressed the recommendation, and contribution of the project team, as well as the strength, and limitations of the project.

Section 4: Findings and Recommendations

Introduction

The gap in practice that this doctoral project address is providers' lack of knowledge of integrated treatment for CODs. This project site did not have the treatment services needed to provide the appropriate level of care to adequately assess individuals with CODs as recommended by SAMSHA. The DNP practice-focused questions guiding this project was as follows:

- 1. Will the evidence from the literature supports educating addiction treatment providers on integrated treatment for individuals with CODs?
- 2. Will a staff education program on integrated treatment increase the knowledge of providers at an addiction treatment facility from pre to post-test survey?
- 3. Will the likelihood of the addiction treatment providers to utilize integrated treatment for individuals with CODs increase from pretests to posttests?

The results findings from the literature review matrix of twenty current evidence-based literature supported educating addiction treatment providers on integrated treatments for individuals with CODs. According to Yule and Kelly (2019) systemic review, integrated treatment is the gold standard of care for individuals with CODs and a systematic review of six studies done by Neven et al. (2018) showed that integrated treatment was recommended and chosen for patients with CODs by providers. According to Acquilano et al. (2021) men with dual diagnosis can achieve clinical and functional recovery when received intensive integrated treatment for at least one year. Overall literature review showed superior standards through a reduction in substance abuse disorder and

improvement in mental health symptoms in individuals with CODs (Karapareddy, 2019). Individuals who participated in integrated treatments had significantly lower mental health symptoms (Flanagan et al.,2017). Randomized control of 37 clinicians who received integrated treatment training showed a reduction in the number of days their patient used alcohol or drugs after the implementation of integrated treatment (Kikkert et al., 2018).

The content experts reviewed the provided plan, educational PowerPoint presentation, sources of evidence, and graded the data collected. The integrated treatment staff education training strengthened the providers' knowledge of integrated treatments for CODs from pretest to posttest. After the presentation of the staff education project, the knowledge, and understanding of the participants on integrated treatments from pretest to posttest increased by 28 %, and the percentage of the participants who were likely or unlikely to use integrated treatments for individuals with CODs increased by 40%.

Findings and Implications

The two content experts, content expert 1 is an addiction psychiatrist with expertise in the diagnosis and treatment of substance abuse and mental health conditions, and content expert 2 is an addiction psychologist who was an expert in the evaluation of behavioral issues and identification and development of different treatment interventions. The two content experts ensured that the educational objectives were met (Table 1) and completed the validity assessment form (Appendix F). The two content experts evaluated the pretest and posttest for relevance and ensured the usability and relevance of the

content to meet the intended goals and objectives of this staff education project (Table 2)

Using the content expert evaluation of staff education project form provided (Appendix

G). The intended goal of this staff education project was to increase the knowledge of the addiction treatment providers on integrated treatment for individuals with CODs in a residential addiction treatment facility.

Table 1

Content Experts' Evaluation of the Curriculum Objectives

Objectives	Content Expert 1	Content Expert 2
The participants will be able to define the term <i>co-occurring</i> disorders (CODs)	Met	Met
The participants will able to identify at least two guiding principles of working with individuals with CODs	Met	Met
The participants will be able to explain integrated treatments	Met	Met
The participants will be able to identify three essential services for working with individuals with CODs	Met	Met
The participants will be able to identify at least two stepwise approaches for treating CODs	Met	Met
The participants will identify pertinent aspects of screening and assessment of individuals with CODs	Met	Met
The participants will be able to identify at least two components of completing full assessment for individuals with CODs	Met	Met
The participants will be able to identify at least three core components of integrated treatments	Met	Met
The participants will be able to identify at least three mental disorders seen in individuals with CODs	Met	Met
The participants will be able to identify at least three socioeconomic and health factors strongly associated with CODs	Met	Met

Integrated Treatment Pretest/Posttest Questionnaire:

Content Experts' Validity Assessment

The content experts evaluated the curriculum objectives (Appendix G); they examined the pretest and posttest questionnaires and their validity to determine whether the presentation met the expectations of the educational goals. In Table 1, the scoring of the content experts' evaluation of the curriculum objectives was determined by met or not met criteria. In Table 2, the scoring of the pretest/posttest questionnaires is presented on a 5-point grading scale as 1 = very irrelevant, 2 = irrelevant, 3 = neither relevant nor irrelevant, 4 = relevant, and $5 \ very relevant$. The results are displayed in Table 2 with the lowest score at 10 and the highest at 50.

Table 2Integrated Treatment Pretest/Posttest Questionnaire Results

Objective statement	Content Expert 1	Content Expert 2
1. What is co-occurring disorder?	5	5
2. What are the guiding principles of working with individuals with CODs?	5	5
3. What is the purpose of integrated treatments?	5	4
4. What are the essential services for working with individuals with CODs?	5	5
5. What are the examples of stepwise approach for treating CODs?	4	5
6. What are pertinent aspects of screening and assessment for individual with CODs?	5	5
7. What are the components of completing screening and assessments?	4	4
8. What are the core components of integrated treatments?	5	5

9. What are the mental health disorders seen in individuals with CODs?	4	5
10. What are the socioeconomic and health factors that are strongly associated with CODs?	5	5
M	4.7	4.8

Note. 1 = very irrelevant, 2 = irrelevant, 3 = neither relevant nor irrelevant, 4 = relevant, and 5 = very relevant.

The education topic of integrated treatment for CODs was evaluated and met the expectation of both content experts. Content Expert 1 gave a score of 47out of 50, and Content Expert 2 gave a score of 48 out of 50 (relevant/very relevant). According to the content experts and the feedback obtained from the participants, the PowerPoint presentation was very informative and met the educational goals and objectives.

Data Questions and Findings From Educational Session Questionaries: Demographics

Figures 1-5 represents the participants' responses to the demographic survey in regards to age, gender, ethnicity, years in practice and education pathway. Figure 1 displays data for age of the participants, indicating that 20% of participants were between 20 and 35 years old, 40% were between 36 and 50 years old, 35% were between 51 and 65 years old, and 5% were over 66 years old. Figure 2 shows the gender of the participants, 55% were male and 45% were female. Figure 3 shows ethnicity, 10% were Black/African American, 25% were Hispanic/Latino, and 65% were Caucasian. Figure 4 shows years in practice 20% had been in practice for 0-5 years, 20% had been in practice for 6-10 years, 25% had been in practice for 11-15 years, 20% years, has been in practice for 16-20 years, and 15% had over 20 years in practice. Figure 5 displays educational

pathway information; 5% indicated physician, 15% indicated NP, 5% indicated RN, 35% indicated LPN and 40% indicated addiction counselors.

Figure 1

Demographics: Age

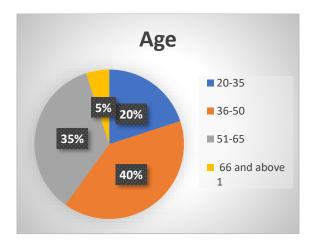


Figure 2

Demographics: Gender

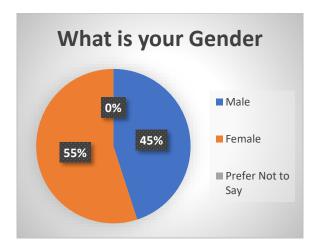


Figure 3

Demographics: Ethnicity

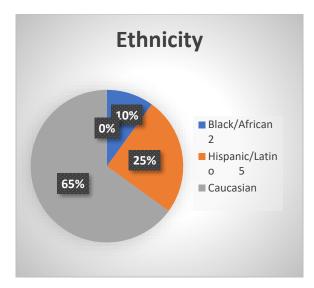


Figure 4

Demographics: Years in Practice

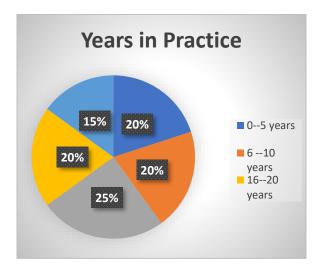
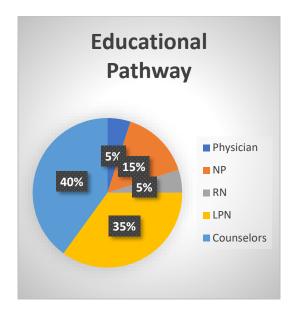


Figure 5

Demographics: Educational Pathway



Integrated Treatment Education Pretest/Posttest Questionnaire

The project outcome findings as displayed in the integrated treatment pretest/posttest questionnaire results (Table 3) showed an increased in knowledge and understanding of integrated treatment for CODs in the participants. In Table 3, before presentation of the education project, the participants scored 68.5%, and scored 96.5% after presentation of the education project, reflecting 28% increase in knowledge and understanding of participants. As mentioned previously, this project involved the application of descriptive statistics to analyze pretest and posttest findings of the educational training session, and the data gathered were sorted and analyzed using statistical software. There were 20 participants who completed the pretest and posttest, the responses showed increased knowledge and understanding of integrated treatment for

CODs. Overall, the providers showed increased knowledge of integrated treatments for individuals with CODs by 28%.

Integrated treatment services are the gold standard for working with individuals with CODs and addressing the complex symptoms seen in co-occurring mental health disorders and substance abuse disorders (Chokron et al., 2022). There is strong evidence that integrated treatment modalities are more effective in reducing symptoms of CODs (Karapareddy, 2019). There is a significant need to address comorbidities related to SUDs through comprehensive integrated treatment modalities (National Institute on Drug Abuse, 2020). CODs can make SUDs more difficult to treat, integrated treatments increase utilization of post-treatments services and decreases re-admissions (Ostergard et al., 2018).

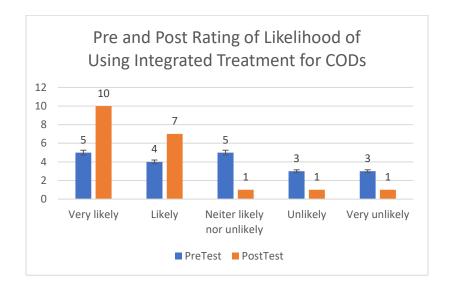
Table 3Integrated Treatment Pretest/Posttest Questionnaire Results

Item number	Pre N	%	Post N	%	% change
1	17	85	19	95	10.0
2	16	80	20	100	20.0
3	13	65	19	95	30.0
4	16	80	20	100	20.0
5	15	75	19	95	20.0
6	14	70	20	100	30.0
7	9	45	19	95	50.0
8	9	45	19	95	50.0
9	11	55	18	90	35.0
10	17	85	20	100	15.0
M		68.5		96.5	28

Figure 6

Pre and Post Rating of Likelihood of Using Integrated Treatment for Co-Occurring

Disorders



Likelihood of Using Integrated Treatment for CODs

Before the presentation of the education project, the participants reported the likelihood of using an integrated treatment approach for individuals with CODs as very likely (25%), likely (20%), neither likely nor unlikely (25%), unlikely (15%), and very unlikely (15%). After the presentation of the education session, the participants reported very likely (50%), likely (35%), neither likely nor unlikely (5%), unlikely (5%), and very unlikely (5%). The percentage of participants who were very likely or likely to utilize integrated treatments for individuals with CODs were 45% before the presentation and 85% after the presentation of the education session, showing a 40% increase, which reflects a positive change in the perception of the participants regarding integrated treatments for CODs.

Implications

Frequency assessments were conducted with demographic variables before the start of the presentation. 25 participants were invited via email and 20 participants responded and volunteered for the education session and completed both pretest and posttest questionnaires and surveys. The participants' demographics include age, gender, ethnicity, years in practice, and educational pathway. Anonymous demographics, pretest, and posttest data were collected and analyzed separately by inputting them into statistical software for comparison and protection of the privacy of the participants. Due to the small sample size of 20 participants, the findings may not be able to extrapolate to other populations or settings and may influence the ability to detect clinically relevant differences.

Recommendations

After the presentation of integrated treatment education for co-occurring disorders to the addiction treatment providers, the participants increased their knowledge of integrated treatment approaches that addressed both substance use disorder and mental illness concurrently. This increased knowledge of integrated treatments will improve patients' outcomes. The project site plan to utilize this staff education training for new hires as a refresher course as the majority of the patients' population they serve have at least one SUD and one mental health disorder. This staff education project will bring forth positive social change as individuals with co-occurring disorders when adequately treated with integrated treatment will learn to move beyond their illness and pursue meaningful recovery. The implementation of integrated treatment modalities for

individuals with co-occurring disorders will require ongoing provider training and awareness that would influence their behavior and intervention and enable them to routinely screen and assess individuals for the presence of co-occurring disorders, mental disorders, SUD-related medical, and social problems critical for implementing treatment planning (SAMSHA, 2020).

Contribution of the Doctoral Project Team

My preceptor and my content experts played a significant role in the planning, implementation, and evaluation of this doctoral project by providing guidance and support every step of the way. Their knowledge and expertise in the field of addiction and mental health enabled them to provide great support and guidance throughout the entire project. My preceptor is an experienced substance abuse treatment physician, and the two content experts, content expert 1 is an addiction psychiatrist with expertise in the diagnosis and treatment of substance abuse and mental health conditions, and content expert 2 is an addiction psychologist who is an expert in the evaluation of behavioral issues and identification and development of different treatment interventions. The content experts and my preceptor reviewed all materials developed, their contents, the curriculum, pretest, and posttest, and reviewed the plan, design, and how the project was delivered. The content experts and my preceptor shared their expertise and contextual insight and ensured project usability.

Strengths and Limitations of the Project

The main limitation of this project is a small sample size of 20 participants making it difficult to determine whether or not the research findings will be relevant in other settings or be extrapolated. The sustainability of integrated treatments for individuals with CODs will require ongoing training and awareness that will influence the behavior and intervention of the providers. Strategies to retain staff should be in place so that staff trained on integrated treatments are readily available to promptly identify the presence of CODs, mental disorders, SUDs, and related medical and social issues that are critical for implementing treatment planning (SAMSHA, 2021). Using integrated treatment modalities for individuals with CODs will guide clinicians to engage in trusting relationships, assist clients to meet their needs, and provide the support that will improve patients' treatment outcomes (SAMSHA, 2021).

In the future, utilizing multiple residential addiction treatment facilities concurrently and a larger sample size will provide more diverse variables and a significant result, and allow for generalization of results findings. To ensure sustainability, providers require to continuously screen and assess individuals in other to detect the presence of co-occurring disorders.

Summary

The resulting outcome findings of this staff education project showed an increase in knowledge and understanding of integrated treatments for co-occurring disorders from the pretest to the posttest by 28%. The evidence from the literature review matrix supported educating addiction treatment providers on using integrated treatments

for individuals with CODs. After the presentation of this staff education project, the percentage of the participants who were very likely or likely to utilize integrated treatment increased by 40%. This staff education project on integrated treatments for co-occurring disorders is aimed at assisting the residential substance treatment providers in developing strategic treatment plans that are customized and tailored to the population served in the organization, geared towards the reduction of health disparities, improves health equity, and promotes positive patient outcomes. Educating addiction treatment providers on integrated treatment for co-occurring disorders will help increase providers' knowledge and skills on how to utilize initiatives to improve quality care to eliminate racial and ethnic disparities in health care while successfully addressing barriers to achieving health equality (Betancourt et al., 2017). Section 5 explored my self-analysis and the dissemination plan for integrated treatment for CODs in the residential treatment facility.

Section 5: Dissemination Plan

The central task for this staff education project was to unravel the complex term CODs and to explore the correlation between SUDs and mental health disorders and how integrated treatments is the gold standard of care for individuals struggling with both disorders concurrently. The medical team, the counseling team, and the organizational leadership at this project site have gained huge interest in this staff education curriculum for initial and ongoing training, education, and supervision of the counselors, nurses NP, and physicians across the organizational continuum of care. Balancing the medical needs of this population with CODs has been very challenging because the majority of this population presents with unmet medical needs, therefore, additional support that would be beneficial is a way of understanding the causes of disparities, focusing on increased cost and high-risk areas such as enhancing both the physical and the mental health of individuals with CODs. Moving forward, I would like to disseminate the findings of this staff education project at nursing conferences and through publications that are publicly available. I also plan to continue to pass these research findings to other mental health systems providers, policymakers, and administrators with the hope of transforming the mental health system, as well as improving provider education and the delivery of care to those struggling with CODs.

Analysis of Self

As a certified registered NP for about 5 years and an RN for over two decades, I have found that the training, skills, education, and experience that I have gained in various healthcare various settings and all walks of life have ignited my passion for

providing evidenced-based patient-centered care. I have dedicated the past 3 years to working with individuals with SUD and mental health disorders and I find passion in working with individuals who are struggling with CODs. This concept of educating providers on integrated treatments for individuals with CODs has provided opportunities for me to share my knowledge with other providers. At the initial stage of this project, it was crucial to gather evidence-based scholarly information as a significant part of my learning process. After receiving approval from the university, I collaborated with my preceptor, two content experts, and the facility administrator to schedule a date that was conducive for the organization to conduct education sessions. Invitations were sent via email 1 week before the scheduled date, and a reminder email was sent out a day before the scheduled training date. On the scheduled project presentation day, I arrived 1 hour before the set time to prepare for the presentation and ensured that everything worked as planned. I received a response, information, and data from the participants that reflected positive responses concerning the need to educate providers on integrated treatments for individuals with CODs.

I am very proud to be a Walden University graduate and this DNP journey enhanced my knowledge, strength, relationships, and confidence among my professional colleagues. I am now able to speak concisely and with clarity, and able to understand complex issues. Completing this doctoral project has been very engaging, rewarding, and fulfilling yet challenging. I have gained insight and expanded my knowledge on how to improve healthcare quality, achieve value, address health disparities, build diversity, and achieve health equity in a diverse population (Betancourt et al., 2017). The experience

gained throughout my DNP journey has allowed me to be able to develop and plan for structural changes in the organization, and gained the ability to compete between priorities, raise leadership and organizational awareness of disparities, able to build a case for my proposed change and increase organizational understanding of the proposed change (Betancourt et al., 2017).

Summary

This doctoral project supports Walden's vision, mission, and social change innovation, and will positively change the approach of care given to individuals with CODs. I have dedicated the last three years of my profession as a nurse practitioner to taking care of individuals who are struggling with substance use disorders and mental health disorders. I have aimed at developing ideas, strategies, and actions that will promote dignity and create a positive outcome in individuals with substance use disorders. This doctoral project adequately addressed the knowledge needed for addiction treatment providers to engage and develop therapeutic rapport with individuals with co-occurring disorders. Utilizing integrated treatment modalities will promote recovery, enhance coping, increase treatment engagement, promote retention, increase medical compliance, and prevent relapse.

References

- Acquilano, S. C., Drake, R.E., Gamache, J., Hendrick, D. C., & Noel, V. A. (2021).

 Outcomes of a residential and community-based co-occurring disorders treatment program. *International Journal of Mental Health & Addiction*, 19(5), 1615–1624.

 https://doi.org/10.1007/s11469-020-00251-x
- Addiction Center. (2021). *Dual diagnosis*.

 https://www.addictioncenter.com/addiction/dual-diagnosis/
- American Association of Colleges of Nursing. (2020). *DNP essentials*. https://www.aacnnursing.org/DNP/DNP-Essentials
- Assefa, M. T., Campbell, K., Ford, J. H., II, Jo, B., King, A., McGovern, M. P., McIlvaine, A., & Osborne, E. (2019). Implementing integrated services in routine behavioral health care: Primary outcomes from a cluster randomized controlled trial. *BMC Health Services Research*, 19(1), Article 749.

 https://doi.org/10.1186/s12913-019-4624-x
- Avery, J. D., & Barnhill, J. W. (Eds.). (2017). Co-occurring mental illness and substance use disorders: A guide to diagnosis and treatment. American Psychiatric Association Publishing.
- Betancourt, J. R., Kenst, K. S., Lopez., N., Phan., T. H., & Tan-McGrory, A.T. (2017).

 Organizational change management for health equity: Perspectives from the

 Disparities Leadership Program.

https://www.healthaffairs.org/doi/full/10.1377/hlthaff.2017.0022

Centers for Disease Control and Prevention. (2018). ADDIE model

- https://www.cdc.gov/training/development/addie-model.html
- Chokron Garneau, H., Assefa, M. T., Jo, B., Ford, J. H., II Saldana, L., & McGovern, M. P. (2022). Sustainment of Integrated Care in Addiction Treatment Settings: primary outcomes from a cluster-randomized controlled trial. *Psychiatric services* 73(3), 280–286. https://doi.org/10.1176/appi.ps.202000293
- Flanagan, J. C., Back, S. E., Badour, C. L., Fischer, M. S., Killeen, T. K. & Ornan, G., (2017). The Role of Relationship Adjustment in an Integrated Individual

 Treatment for PTSD and Substance Use Disorders Among Veterans: An

 Exploratory Study. *Journal of Dual Diagnosis*, 13(3), 213–218.

 https://doi.org/10.1080/15504263.2017.1312039
- Ford, J. H., II, Bolt, D. M., Garneau, H. C., Gilson, A., Kaur, A., McGovern, M. P., Rao,
 D., & Saldana, L. (2021). Improving Medication Access within Integrated
 Treatment for Individuals with Co-Occurring Disorders in Substance Use
 Treatment Agencies. -Implementation research and practice, -2 https://doi.org/10.1177/26334895211033659
- Ford, J. H., II, Assefa, M. T., Campbell, K., King, A. M., McGovern, M. P., McIlvaine,
 A. M. & Osborne, E. L. (2018). Using NIATx strategies to implement integrated
 services in routine care: A study protocol. *BMC Health Services Research*, 18(1),
 431. https://doi.org/10.1186/s12913-018-3241-4
- Foundations Recovery Network. (2021). Section 1: Background.

 https://dualdiagnosis.org/resource/national-dialogue-on-co-occurring-mental-health-and-substance-abuse-disorders/background/

- Gainsbury, S. M. (2017). Cultural competence in the treatment of addictions: Theory, practice and evidence. *Clinical Psychology & Psychotherapy*, 24(4), 987–1001.
- Hunt, G. E., Cleary, M., Lai, H. M. X., & Malhi, G. S. (2020). Prevalence of comorbid substance use in major depressive disorder in community and clinical settings, 1990–2019: Systematic review and meta-analysis. *Journal of Affective Disorders*, 266, 288–304. https://doi.org/10.1016/j.jad.2020.01.141
- Igbal, M. N., Levin, C. J., & Levin., F. R. (2019). Treatment for substance use disorder with co-occurring mental illness. https://focus.psychiatryonline.org/doi/full/10.1176/appi.focus.20180042
- Institute of Medicine. (2006). *Improving the quality of mental health care for mental and substance-use conditions*. The National Academies Press
- Jones, C. M., & McCane-Katz, E. F. (2019). Co-occurring substance use and mental disorders among adults with opioid use disorder. *Drug and Alcohol Dependence*, 197, 78–82. https://doi.org/10.1016/j.drugalcdep.2018.12.030
- Karapareddy, V. (2019). A review of integrated care for concurrent disorders: cost effectiveness and clinical outcomes. *Journal of Dual Diagnosis*, *15*(1), 56–66. https://doi.org/10.1080/15504263.2018.1518553
- Kikkert, M., Dekker, J., De Waal, M., Goudriaan, A., & Peen, J. (2018). Effectiveness of Integrated Dual Diagnosis Treatment (IDDT) in severe mental illness outpatients with a co-occurring substance use disorder. *Journal of Substance Abuse**Treatment, 95, 35–42. https://doi.org/10.1016/j.jsat.2018.09.005
- Kim, S., Choi, S., Seo, M., Kim, D. R., & Lee, K. (2020). Designing a Clinical Ethics

- Education Program for Nurses Based on the ADDIE Model. *Research and theory for nursing practice*, *34*(3), 205–222. https://doi.org/10.1891/RTNP-D-19-00135
- Lewandowski, R. A., Ekman, I.., Lewandowski, J. B., Rogers, H. L., Swedberg, K., & Törnell, J. (2021). Implementation of Person-Centered Care: A Feasibility Study Using the WE-CARE Roadmap. *Int. J. Environ. Res. Public Health* **2021**, *18*, 2205. https://doi.org/10.3390/ijerph18052205
- Marchand, K., Beaumont, S., Harrison, S., MacDonald, S., Marsh, D.C., Oviedo-Joekes.,
 & Schechter. M.T. & Westfall, J., (2019). Conceptualizing patient-centered care for substance use disorder treatment: findings from a systematic scoping review. Substance Abuse Treatment, Prevention, and Policy 14 (1), 37.
 https://doi.org/10.1186/s13011-019-0227-0
- NAADAC, The Association of Addiction Professionals (2018). Integrating treatment for Co-occurring disorders: An introduction to what every counselor needs to know.

 https://www.naadac.org/assets/2416/co-occurring_disorders

 manual_2018_sneakpeek.pdf
- National Institute on Drug Abuse (2020). The Connection Between Substance Use

 Disorders and Mental Illness. https://www.drugabuse.gov/publications/research-reports/common-comorbidities-substance-use-disorders/part-1-connection-between-substance-use-disorders-mental-illness
- National Institute on Drug Abuse (2018). Comorbidity substance use and other mental disorders. https://www.drugabuse.gov/drugtopics/trendsstatistics /infographics/comorbidity-substance-use-other-mental-disorders

- Neven, A., Bonebakker., A. E., Kool, N. & Mulder, C. L. (2018). Geïntegreerd behandelen van patiënten met dubbele diagnose met integrated dual diagnosis treatment (IDDT): systematische literatuurstudie [Efficacy of integrated dual disorder treatment for dual disorder patients: a systematic literature review]. *Tijdschrift voor psychiatrie*, 60(4), 231–240.
- Novak, P., Ali, M. M., & Chen, J. & Feder, K. A. (2019). Behavioral health treatment utilization among individuals with co-occurring opioid use disorder and mental illness: Evidence from a national survey. *Journal of substance abuse treatment*, 98, 47–52. https://doi.org/10.1016/j.jsat.2018.12.006
- Ostergaard, M., Höcker, W., Jatzkowski, L., Lübke, N., Odenwald, M. Seitz, R., Speidel, S., & Weber, T. (2018). Integrated Treatment at the First Stage: Increasing Motivation for Alcohol Patients with Comorbid Disorders during Inpatient Detoxification. *Alcohol and alcoholism (Oxford, Oxfordshire)*, 53(6), 719–727. https://doi.org/10.1093/alcalc/agy066
- Patel S. R, Covell N. H, Dixon L. B., Lipscomb C, & Margolies P.J. (2018). Using Instructional Design, Analyze, Design, Develop, Implement, and Evaluate, to Develop e-Learning Modules to Disseminate Supported Employment for Community Behavioral Health Treatment Programs in New York State. *Front Public Health*. 2018;6:113. https://doi.org/10.3389/fpubh.2018.00113
- Pierre, J. M. (2018). Real-world challenges in managing 'dual diagnosis' patients:

 Diligent assessment and judicious prescribing can help optimize outcomes.

 Current Psychiatry, 17(9),25+

- https://link.gale.com/apps/doc/A555230617/AONE?u=anon~2943551c&sid=googleScholar&xid=92f08e91
- Saraiya, T. C., Back, S.E., Badour, C. L., Brown, D.G., Flanagan, J. C., Jones, A. C., Jarnecke, A. M., & Killeen, T. K. (2022). The role of posttraumatic guilt and anger in integrated treatment for PTSD and co-occurring substance use disorders among primarily male veterans. *Psychological Trauma: Theory, Research, Practice and Policy*. https://doi.org/10.1037/tra0001204
- Substance Abuse and Mental Health Service Administration (2020). Tip 42: Substance use treatment for persons with co-occurring disorders.

 https://store.samhsa.gov/product/tip-42-substance-use-treatment-persons-co-occurring-disorders/PEP20-02-01-004
- Substance Abuse and Mental Health Service Administration (2020). Mental health and substance use disorders. http://www.samsha.gov/findhelp/disorders

Substance Abuse and Mental Health Administration (2021). substance use disorder

- treatment for people with co-occurring disorder.

 https://store.samhsa.gov/sites/default/files/SAMHSA_Digital_Download/PEP20-0604006.pdf#:~:text=This%20Advisory%20is%20based%20on%20the%20SAM

 HSA%E2%80%99s%20Treatment,the%20treatment%20of%20individuals%
- Trottier, K., Monson, C. M., Olmsted, M. P.& Wonderlich, S. A. (2017). Initial findings from project recover: Overcoming co-occurring eating disorders and posttraumatic stress disorder through integrated treatment. *Journal of Traumatic Stress*, 30(2), 173-177.

- U.S. Department of Health and Human Services (2021). Healthy people 2030.

 <a href="https://health.gov/healthypeople/objectives-and-data/browse-objectivesmental-health-and-mental-disorders/increase-proportion-people-substance-use-and-data/browse-objectives-and-
- Vekaria, V., Bose, B., Murphy, S. M., Avery, J., Alexopoulos, G., & Pathak, J. (2021).

 Association of co-occurring opioid or other substance use disorders with increased health care utilization in patients with depression. *Translational psychiatry*, 11(1), 265. https://doi.org/10.1038/s41398-021-01372-0
- Walden University (2021). Social change. https://waldenu-edu/why-walden/social-change#greatergood
- Walden University (2020). DNP Practicum manual.

 https://academicguides.walden.edu/id.php?/Id.php?content_Id=5239790
- Walden University (2019). Manual for staff education: Doctor of nursing practice (DNP scholarly project. https://academicguides.waldenu.edu/research-center/program-documents/dnp
- Yule, A. M., & Kelly, J. F. (2019). Integrating Treatment for Co-Occurring Mental Health Conditions. *Alcohol research: current reviews*, 40(1), arcr. v40.1.07. https://doi.org/10.35946/arcr.v40.1.07

Appendix A: Literature Review Matrix

Author/ Date	Theoretical/ Conceptual Framework	Research Hypotheses	Methodolog y	Analysis /Result	Conclusion	Implication for future Research	Implication for Practice
Acquilan o et al., 2021	Clinical functional recovery for men with serious mental illness.	Will participants improve in all domain for at least one year of treatment?	Examined transcripts from quality improvemen t interviews on recovery in key five domains-housing, education/ employment, family relationships, mental health and substance use.	Those who remained in treatment for at least a year improved in recovery in each domain	Men with long term dual diagnosis can achieve clinical and functional recovery when they receive integrated evidence-based intervention for at least one year	Develop strategies for retention of participants.	Staff retention is critical
Assefa et al., 2019	Routine behavioral health care	Is Network for the improveme nt of addiction treatment (NIATx) implementa tion strategy effective in increasing integrated services capacity among organizations treating persons with CODs	Cluster randomize waitlist control trial design of forty-nine addiction treatment organization -active (NIATx strategy) group and control group.	There is moderately but statically difference in improvement between NIATx strategy group and the control group.	Overall organization with full adherence to NIATx protocol has significantly greater improvemen t in the primary outcome measure of integrated services capacity for persons with CODs	Because of the convenience sampling used in this study, the external validity will depend on future studies in different population – using a different setting is imperative to verify internal validity.	Determining co-occurring capacity at baseline, guiding and measuring initiatives will improve patient outcome.
Chokron et al., 2018	Sustainment of integrated care	Will implementi ng NIATx strategies sustain integrated treatments in addiction treatment setting?	Cluster randomized waitlist control group design	Both cohorts sustained their capability to provide integrated treatment services.	The delivery of integrated treatment services was sustained for 2 years after receipt of active implementat ion support.	Consider how contextual factors may predict and moderate sustainment outcomes.	Staff retention is critical to implement and sustain research.
Flanagan et al., 2017	Relationshi p adjustment	Does individual integrated treatment for co- occurring PTSD and	Randomized controlled trial examining the efficacy of integrated treatments	Baseline dyadic adjustment was associated with sessions 12 PTSD symptom severity, participants with high dyadic	While the primary determinant of treatment outcome in this sample, dyadic	Continues research is needed to determine ways to improve	Systemic challenges exists to providing integrate treatment in all settings.

Author/ Date	Theoretical/ Conceptual Framework	Research Hypotheses	Methodolog y	Analysis /Result	Conclusion	Implication for future Research	Implication for Practice
		substance use disorder (SUD) maximize veterans' health?	for co- occurring PTSD and SUD	adjustments has significantly lower symptoms	adjustment may play a role in patients treatment outcome	access to treatment.	
Ford et al., 2021	Improve medication access	Is improving access to addiction and psychotropi c medication s the best approach to providing comprehen sive care for individuals with CODs.	Cluster randomized waitlist control group design to evaluate the effectiveness of NIATx implementati on strategies to improve access to addiction and psychotropic medications	The per protocol analysis showed increased access to both psychotropic medications and addiction medications from pretest -to posttest intervention for agencies in both cohorts. However, differences in change between high and low implementation agencies were not significant.	Access to integrated services for people with CODs is a long- standing problem	Future research should consider less restrictive methodology	Implement adherence strategies to improve medication access
Ford et al., 2018	Objective measure across three framework- determinant s, evaluation and process. Conceptual unified research model.	Is receiving integrated treatment services more effective and preferred by patients and families versus parallel of fragmented care?	Cluster randomized controlled trail design to determine NIATx strategies are effective in implementin g integrated services for persons with CODs and mental health disorders	Addresses qualitative assessment of the use of NIATx strategy to spread beyond efforts to improve access and retention for more complex patients	This study unified the objective measures across three frameworks to address a long-standing gap in the quality of care for persons with CODs. It explored the relationships between the use of NIATx strategies and patients level outcomes.	Smaller sample size and streamline eligibility criteria.	Economic cost required to support participants during implementati on.
Hunt et al., 2020	Prevalence of comorbid substance use in major depression	Will research identify high prevalence /comorbidit y between substance use disorders and major depression	Literature review, comprehensi ve literature search 1990- 2019 aimed to estimate the prevalence of substance use disorder (SUD) in subjects diagnosed with major depressive	Review of 48 articles with total sample size of 348, 550 found prevalence of any SUD in individuals with MDD, with maximum prevalence being Alcohol Use Disorder (AUD)	Meta- analysis revealed that SUD in MDD are highly prevalence and rates have not changed overtime	Future research should consider less rigorous methodology	This persistent high prevalence, suggests an urgent need for more studies to develop better prevention and treatment options to reduce SUDs in

Author/ Date	Theoretical/ Conceptual Framework	Research Hypotheses	Methodolog y	Analysis /Result	Conclusion	Implication for future Research	Implication for Practice
			disorder (MDD) in community, inpatient and outpatient settings.				persons with major depressions and co- morbid disorders
Igbal et al., 2019	Epidemiolo gy and treatment of CODs	Does substance use make diagnosis of the underlying psychiatric condition difficult?	Literature review of efficacy studies of medication used to treat CODs.	There are newer treatments such as topiramate, ketamine, noninvasive brain stimulation, and deep brain stimulation.	Summarized treatment recommend ation and psychosocia I intervention	A systematic review is necessary accurately collect and analyze data, and answer focused clinical questions and eliminate bias.	Management of CODs posses significant challenge to providers, a period of abstinence may be needed to accurately diagnose CODs
Karapare ddy, 2019	Integrated care for CODs	Are existing service models effective in treating CODs?	Metanalysis of various databases to systematicall y review models to treat CODs	Revealed that integrated models of care are more effective than non-integrated models. Integrated models showed superior standard model through reduction in substance use disorders and improvement of mental health in those diagnosed with CODs	limited number of studies in relation to service delivery for CODs. It is too early to make strong evidence; however available evidence suggests that integrated care models for CODs are the most effective models for patient care.	Future research is needed around translation of research finding to policy development and vice versa, around the translation from the policy level to the patient level.	Weighing cost effective versus clinical outcome
Jones et al., 2019	Morbidity and mortality	Does co- occurring substance use among people with opioid use disorder (OUD) increase risk for morbidity and mortality	National survey on drugs use and health, prevalence of co-occurring substance use and mental health, receipt of mental health and substance use disorder treatment services for adults 18-64 years	Among adults with OUD, prevalence of specific co-occurring SUD ranged for 26.4% for alcohol to 10.6% for methamphetamines. 24.5% of adult with OUD received both mental health and SUD treatment	Co- occurring substance use and mental disorders are common among adults with OUD.	Future research should focus of developing comprehensi ve treatment models for this population.	Urgent need to expand access to comprehensi ve service delivery models that addresses co- morbidities in this population
Kikkert et al., 2018	Motivationa 1 Interview	Is integrating	Randomized controlled	37 clinicians in 6 treatment teams	Reduction in the	Should be simplified to	Strategies for staff

Author/ Date	Theoretical/ Conceptual Framework	Research Hypotheses	Methodolog y	Analysis /Result	Conclusion	Implication for future Research	Implication for Practice
		SUD treatment with psychiatric treatment more favorable than treating these conditions parallel or sequential	stepped- wedge cluster trial	received three days of Integrated Dual Diagnosis Training (IDDT) with primary outcome of days of substance use at follow up, 12 months after IDDT implementation. !54 patients were assessed	number of days patients used alcohol or drugs	make disseminatin g IDDT more usable	retention should be in place.
NIDA, 2020	Connection between SUD and mental illness	Does mental illness contribute to drug use and vice versa?	Multiple national population surveys.	Data shows high rates of comorbid SUD and anxiety disorders, and SUD also co-occur at high prevalence with mental disorders.	Individuals with mental, personality and SUD were at risk for nonmedical use of prescription opioids.	Strategies to expand SUD and mental health treatments in primary care	The diagnosis and treatment of CODs are complex due to difficulty untangling the overlapping symptoms.
Neven et al., 2018	Effectivene ss of IDDT in dual diagnosis patient	Is IDDT effective in treating dual diagnosis patients?	A systematic literature review of six studies	Six studies were reviewed, two non- randomized control studies, one randomized controlled study and three uncontrolled pre/post studies	In clinical practice IDDT is recommend ed and chosen frequently as the treatment of choice for patients with dual diagnosis.	Should utilize large number of studies and explore more on full IDDT programs	It is striking how limited and vague the research is pertaining the effects of full IDDT program on dual diagnosis
Novak et al., 2019	Behavioral health utilization	Does co- occurring opioid use disorder and mental illness impact treatment utilization and access to care?	Using 2002- 2014 national survey on drug and drug use.	Study examined utilization of SUD and mental health treatment among individual with OUD and different degree of mental health illness severity. Study also measure types of treatments, perceived unmet needs for treatments, and barriers to care.	A high proportion of individuals with OUD and CODs are not receiving the care they need.	Explore care coordination across continuum of care for individuals with CODs	Need to better facilitate access to care across the continuum of care.
Ostergaar d et al., 2018	Increasing motivation through pyscho- educational group	Does co- occurring mental disorders complicate the detoxificati on treatment process and outcome?	Quasi random allocated groups of total of 784 participants	Self-reported participation was measure pre and post intervention. Increased utilization of treatments after inpatient detoxification, decrease= readmission after	An integrated intervention for CODs at the start of treatment can increase motivation for continued treatment	Self-report participation are subject to biases and limitation, subjects may not provide honest response. Future research	Retention of participants are critical

Author/ Date	Theoretical/ Conceptual Framework	Research Hypotheses	Methodolog y	Analysis /Result	Conclusion	Implication for future Research	Implication for Practice
				six months after discharge		should target using more objective data.	
Pierre, 2018	Psychothera pies for addiction, including motivationa l interviewin g, cognitive behavioral therapy, relapse prevention, contingency managemen t	Does implementa tion of evidenced based practice treatments improve the clinical outcome of dual diagnosis patient?	Outcome based research	Implementing evidenced based best practices treatment is a significant challenge due to real world challenged	Ideal treatment of patients with dual diagnosis consists of simultaneou s, integrated intervention deliveries by multidisciplinary team	Explore recognition of dual diagnosis and available resources to support this population.	In real world, there are limited resources, diagnostic challenges, both over and underutilizat ion of pharmacothe rapy impact optimal treatment.
Saraiya et al., 2022	Concurrent treatment of PTSD and SUD using prolonged exposure (COPE)	Is integrated exposure-based treatment effective in reducing PTSD and SUD symptoms, post traumatic emotions and prevent relapse?	Randomized clinical trial of 54 veteran diagnosed with PTSD and SUD to examine whether guilt and anger decreased with COPE	Guilt and anger were assessed at 10 time point during treatment. Guilt was significantly low among the veterans who received COPE PTSD symptoms and anger improved.	Among veterans integrated trauma focused treatments may be directly associated with guilt and anger reductions due to processing trauma	A larger Sample size are needed to provide more accurate values.	Strategies to retain participant are needed.
Trottier et al., 2017	Integrated cognitive behavioral therapy (CBT)	Will sessions of CBT treatments show significant improveme nts in PTSD symptoms	Pilot study of 10 individuals with co- occurring eating disorders and PTSD who received 16 sessions of CBT	There was statistically significant improvement in clinician-rated PTSD symptoms, depression, and anxiety.	Findings from this study provide preliminary support for the efficacy of an integrated CBT for ED-PTSD.	Larger sample will identify outliners that may skew the result.	More education is needed to support CBT Treatments
Vekaria et al.,2021	Utilization pattern	Does co- occurring opioid or other substance use disorder increase health care utilization in patient with depression?	Analysis of electronic records derived from multiple health systems across New York.	Among patients with MDD, both OUD and non-OUD SUDs were associated with increased rated of using substance use related services in all settings.	Preliminary evidence suggests co- occurring OUD to be more strongly associated with larger increases in total encounters in all settings.	Future research is needed to assess the efficacy of propose policy recommenda tions for better managing CODs.	Prioritize screening and initiation of OUD treatments as well as improved coordination of care across all settings.

Author/	Theoretical/	Research	Methodolog	Analysis	Conclusion	Implication	Implication
Date	Conceptual	Hypotheses	у	/Result		for future	for Practice
	Framework					Research	
Yule &	Innovative	Will	Systemic	Overall literature	Integrated	More	Providers
Kelly,	models for	evidence	literature	on	treatment is	research is	need to
2019	CODs	from	review on	pharmacotherapy	considered	needed on	receive
		literature	pharmacothe	for co-occurring	the standard	integrated	training in
		support	rapy for	alcohol use disorder	of care for	treatment	both SUD
		integrated	CODs	(AUD) and MHCs	individuals	settings that	and mental
		treatment		suggest medication	with co-	are best for	health
		innovation		without other	occurring	this	disorders
		models for		treatments may not	AUD and	population.	
		CODs		be adequate to	mental		
				stabilize both	health		
				conditions.	disorders.		

Appendix B: Demographics

1.	Age: What is your Age?
	a. 20-35 years
	b. 36-50 years
	c. 51-65 years
	d. Over 66 years
2.	Gender: What is your Gender?
	a. Male
	b. Female
	c. Prefer not to say
3.	Ethnicity: What is your ethnicity?
	a. Black/African
	b. Hispanic/Latino
	c. Caucasian
	d. Asian
	e. Other-Specify-
4.	Years in Practice: How many years have you been in practice?
	a. 0-5years
	b. 6-10 years
	c. 11-15 years

- d. 16-20 years
- e. Over 20 years
- 5. Educational Pathway: What is your educational pathway?
 - a. Physician
 - b. Nurse Practitioner
 - c. Registered Nurse
 - d. Licensed Practical Nurse
 - e. Addiction Counsellors

Appendix C: Integrated Treatments Pretest/Posttest Questionnaire With Answer Key

Multiple choice -choose the best answer

- 1. The term co-occurring disorders (CODs) refers to
 - A. Condition of having two substance abuse disorders
 - B. Conditions of having at least one mental disorder and one substance abuse disorder
 - C. Condition of having at least one medical disorder and one substance abuse disorder
 - D. Conditions of having at least one medical disorder and one mental health disorder
 - E. None of the above

Answer: B

- 2. What are the guiding principles of working with individuals with CODs?
 - A. Use a recovery perspective
 - B. Adopt multi-problem view point
 - C. Use support system to maintain /extend treatment effectiveness
 - D. Plan to address the clients cognitive/functional concern
 - E. All of the above

Answer: E

- 3. The following are true about integrated treatments:
 - A. Treatment strategies that only addresses substance abuse disorders
 - B. Treatment strategies and interventions that combines both SUD and mental health disorder treatment
 - C. Offering integrated treatments will engage individuals in a trusting relationship, assist them in meeting their needs and assist them to provide support.
 - D. B and C
 - E. None of the above

Answer: D

- 4. The essential services for working with individuals with CODs include:
 - A. Person Centered Care
 - B. Trauma Informed Care
 - C. Comprehensive Care
 - D. Culturally Sensitive Care
 - E. All of the Above

Answer: E

- 6. The following are examples of step-wise approach for treating CODs:
 - A. Relapse prevention
 - B. Treatment engagement
 - C. Insurance eligibility
 - D. A and B
 - E. None of the above

Answer: D

- 7. The following are true about screening and assessment for individuals with CODs:
 - A. The assessment must include three pertinent factors: biological, psychological and social.
 - B. Assessment process is a multi-factorial approach to determine which symptoms and diagnoses might be present
 - C. Assessment process allows the provider to tailor decisions about treatment and follow-up care.
 - D. Screening and assessment are central to identifying and treating clients with CODs promptly.
 - E. All of the above

Answer: E

- 8. The following are true about screening and assessments of individuals with CODs:
 - A. Helps in diagnosing the type and severity of SUDs and mental disorders
 - B. Helps to appraise the clients' need for social and community support and resources
 - C. Not matching the client with initial services
 - D. A and B
 - E. A and C

Answer: D

- 8. The core components of integrated treatments include the following:
 - A. Routine access to treatment of individuals who are not in crisis and emergency access for those in crisis
 - B. Outreach to individuals with significant needs
 - C. Access that is involuntary or mandated by the criminal justice system, employers and child welfare system.
 - D. All of the above
 - E. None of the above

Answer: D

- 9. The following groups are mental health disorders seen in individuals with CODs:
 - A. Personality Disorder, Hypertension, Panic Disorder
 - B. Generalized Anxiety Disorder, Diabetes, PTSD
 - C. Generalized Anxiety Disorder, Major Depressive Disorder, PTSD
 - D. Personality Disorder, Persistent Depressive Disorder, Panic Disorder
 - E. C and D

Answer: E

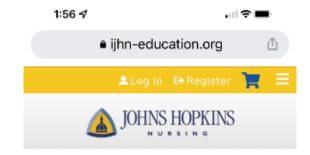
10. CODs are strongly associated with the following socioeconomic and health factors

Except:

- A. Unemployment
- B. Homelessness
- C. Gainful employment
- D. Suicide
- E. Criminal justice system

Answer: C

Appendix D: Johns Hopkins Permission Request



JOHNS HOPKINS EBP MODEL AND TOOLS-PERMISSION

Thank you for your interest in using the Johns Hopkins Evidence-Based Practice Model and Tools.

In order to be granted permission to use the model and tools, please complete and submit this form consenting to the noted legal conditions.



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TOOLS-PERMISSION



Thank you for your submission.

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Appendix E: Johns Hopkins Evidence-Based Appraisal Tool

Article Summary Information Article Title: Enter text Author(s): Enter text Population, size, and setting: Enter text Complete after appraisal: Evidence level and quality rating: Enter text Study findings that help answer the EBP question: Enter text	Number: Enter text Publication date: Enter text
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Study findings that help answer the EBP question: $\operatorname{Enter} \operatorname{text}$	
Article Apprais	al Workflow
Is this evidence: This is	
ក្នុ This is	
☐ A clinical practice guideline or a Level IV	Louidanes de te Costian I
	v evidence, go to Section I:
quality	v Appreiser to determine
☐ A literature review or integrative review? Level V	evidence, go to Section II, A:
quality	/ Appraisal to determine
· · · ·	
quality	/ Appraisal to determine evidence, go to Section II, B: / Appraisal to determine
quality A literature review or integrative review? Level V	_

	☐ Case report? Level V evidence, Level V Apprais quality		_	-	
	☐ An organizational experience (including quality improvement, financial or program evaluations)?	Level V evidence, Level V Apprais quality	_		
	☐ Community standard, clinician experience, or consumer preference?	Level V evidence, Level V Apprais quality	_		
Sect	tion I: Level IV Appraisal				
Select	the type of Level IV evidence				
recogr Cor resear organi	nical practice guidelines (systematically developed nized experts based on research evidence or expe nsensus or position statement (systematically dev och and nationally recognized expert opinion, that zation in decision-making for an issue of concern	rt consensus panel) eloped recommend guide members of	dations, ba	ased on	
After selecting the type of Level IV evidence, determine the quality of using the considerations below:				lence	
Are the types of evidence included identified?				□ No	
	Were appropriate stakeholders involved in the recommendations?	☐ Yes	□ No		
	Are groups to which recommendations apply clearly defined?	Are groups to which recommendations apply and do not apply clearly defined?			
	Does each recommendation have an identified evidence stated?	☐ Yes	□ No		
	Are recommendations clear?		☐ Yes	□ No	
	Select the appropriate quality rating below:				

	☐ A High quality: Material officially sponsored by a professional, public, or private organization or a government agency; documentation of a systematic literature search strategy; consistent results with sufficient numbers of well-designed studies; criteria-based evaluation of overall scientific strength and quality of included studies and definitive conclusions; national expertise clearly evident; developed or revised within the past five years.				
	☐ B Good quality: Material officially sponsored by a professional, public, or private organization or a government agency; reasonably thorough and appropriate systematic literature search strategy; reasonably consistent results, sufficient numbers of well-designed studies; evaluation of strengths and limitations of included studies with fairly definitive conclusions; national expertise clearly evident; developed or revised within the past five years.				
	☐ C Low quality: Material not sponsored by an official organization or agency; undefined, poorly defined, or limited literature search strategy; no evaluation of strengths and limitations of included studies; insufficient evidence with inconsistent results; conclusions cannot be drawn; not revised within the past five years.				
Record findings that help answer the EBP question on page 1					

Se	ction II: Level V Quality Appraisal					
Α	Select the type of article:					
non	iterature review (summary of selected published literature incluscientific, such as reports of organizational experience and opinintegrative review (summary of research evidence and theoretical pares themes, notes gaps in the selected literature)	ions of experts)				
Quality	After selecting the type of Level V evidence, determine the quaconsiderations below:	ality of evidenc	e using the			
	Is subject matter to be reviewed clearly stated?	☐ Yes	□ No			
	Is literature relevant and up-to-date (most sources are within the past five years or classic)?	☐ Yes	□ No			
	Of the literature reviewed, is there a meaningful analysis of the conclusions across the articles included in the review?	☐ Yes	□ No			
	Are gaps in the literature identified?	☐ Yes	□ No			
	Are recommendations made for future practice or study?	☐ Yes	□ No			
	Select the appropriate quality rating below:					
	☐ A High quality: Expertise is clearly evident, draws definitive conclusions, and provides scientific rationale; thought leader in the field.					
	\Box B Good quality: Expertise appears to be credible, draws fairly definitive conclusions, and provides logical argument for opinions.					
	\Box C Low quality: Expertise is not discernable or is dubious; conclusions cannot be drawn.					
Reco	Record findings that help answer the EBP question on page 1					
Se	ction II: Level V Quality Appraisal (conti	inued)				
В	Select the type of article:					
□ E	☐ Expert opinion (opinion of one or more individuals based on clinical expertise)					

Quality	After selecting the type of Level V evidence, determine the quality of evidence considerations below:	dence u	sing the			
	Does the author have relevant education and training? Yes					
	Do they have relevant professional and academic affiliations?	Yes	□ No			
	Have they previously published in the area of interest? Have they been recognized by state, regional, national, or international groups for their expertise?					
	Are their publications well cited by others?					
	A web search can provide information about expertise					
	Select the appropriate quality rating below:					
	☐ A High quality: Expertise is clearly evident, draws definitive conclusions, and provides scientific rationale; thought leader in the field.					
	 □ B Good quality: Expertise appears to be credible, draws fairly definitive conclusions, and provides logical argument for opinions. □ C Low quality: Expertise is not discernable or is dubious; conclusions cannot be drawn. 					
Reco	ord findings that help answer the EBP question on page 1					

Se	ction II: Level V Quality Appraisal (continued	Section II: Level V Quality Appraisal (continued)				
C	C Select the type of article: Case report (an in-depth look at a person or group or another social unit)					
Quality						
	Is the purpose of the case report clearly stated?	☐ Yes	□ No			
	Is the case report clearly presented?	☐ Yes	□ No			
	Are the findings of the case report supported by relevant theory or research?	☐ Yes	□ No			
Are the recommendations clearly stated and linked to the findings?						
	Select the appropriate quality rating below:					
	☐ A High quality: Expertise is clearly evident, draws definitive conclusions, and provides scientific rationale; thought leader in the field.					
	\square B Good quality: Expertise appears to be credible, draws fairly definitive conclusions, and provides logical argument for opinions.					
	\square C Low quality: Expertise is not discernable or is dubious; conclusions	cannot be	e drawn.			
Rec	ord findings that help answer the EBP question on page 1					

Section II: Level V Quality Appraisal (continued) Select the type of article. ☐ Quality improvement (cyclical method to examine workflows, processes, or systems within a specific organization) ☐ Financial evaluation (economic evaluation that applies analytic techniques to identify, measure, and compare the cost and outcomes of two or more alternative programs or interventions) ☐ Program evaluation (systematic assessment of the processes and/or outcomes of a program; can involve both quantitative and qualitative methods) Quality After selecting the type of Level V evidence, determine the quality of evidence using the considerations below: Was the aim of the project clearly stated? \square Yes ☐ No \square N/A Was a formal QI method used for conducting or ☐ Yes ☐ No \square N/A reporting the project (e.g., PDSA, SQUIRE 2.0)? Was the method fully described? ☐ Yes ☐ No \square N/A Were process or outcome measures identified? \square Yes □ No \square N/A Were results fully described? \square No ☐ Yes \square N/A Was interpretation clear and appropriate? \square No \square N/A \square Yes Are components of cost/benefit or cost effectiveness ☐ Yes □ No \square N/A data described? Select the appropriate quality rating below: ☐ A High quality: Clear aims and objectives; consistent results across multiple settings; formal quality improvement or financial evaluation methods used; definitive conclusions; consistent recommendations with thorough reference to scientific evidence. ☐ B Good quality: Clear aims and objectives; formal quality improvement or financial evaluation methods used; consistent results in a single setting; reasonably consistent recommendations with some reference to scientific evidence.

☐ C Low quality: Unclear or missing aims and objectives; inconsistent results; poorly defined quality improvement/financial analysis method; recommendations cannot be made.	
Record findings that help answer the EBP question on page 1	

Section II: Level V Quality Appraisal (continued) Select the type of article: ☐ Community standard (current practice for comparable settings in the community) ☐ Clinician experience (knowledge gained through practice experience from the clinician perspective) ☐ Consumer preference (knowledge gained through life experience from the patient perspective) Record the sources of information and the number of sources: After selecting the type of Level V evidence, determine the quality of evidence using the considerations below: Source of information has credible experience ☐ Yes \square No N/A Opinions are clearly stated ☐ Yes □ No N/A Evidence obtained is consistent ☐ Yes ☐ No N/A Select the appropriate quality rating below: ☐ A High quality: Expertise is clearly evident, draws definitive conclusions, and provides scientific rationale; thought leader in the field. ☐ B Good quality: Expertise appears to be credible, draws fairly definitive conclusions, and provides logical argument for opinions. ☐ C Low quality: Expertise is not discernable or is dubious; conclusions cannot be drawn. Record findings that help answer the EBP question on page 1

Appendix F: Evaluation of the Integrated Treatment PowerPoint by Content Experts

Presenter: Ihuarulam C Okoroji, AGPCNP-BC, MSN

Walden University

Objective Statement:	Were the objectives	Comments:
	met? Not met? Please	
	circle	
The participants will be able to define the		
term co-occurring disorders (CODs)	Yes No	
The participants will able to identify at least	Please circle.	
two guiding principles of working with	Yes No	
individuals with CODs.		
The participants will be able to explain	Please circle.	
integrated treatments.	Yes No	
The participants will be able to identify	Please circle.	
three essential services for working with	Yes No	
individuals with CODs.		
The participants will be able to identify at	Please circle.	
least two stepwise approaches for treating	Yes No	
CODs.		
The participants will identify pertinent	Please circle.	
aspects of screening and assessment of	Yes No	
individuals with CODs		
The participants will be able to identify at	Please circle.	
least two components of completing full	Yes No	
assessment for individuals with CODs		

The participants will be able to identify at	Please c	ircle.	
least three core components of integrated	Yes	No	
treatments			
The participants will be able to identify at			
least three mental disorders seen in	Yes	No	
individuals with CODs			
The participants will be able to identify at			
least three socioeconomic and health	Yes	No	
factors			
strongly associated with CODs			
Test process			
Additional comments			

Appendix G: Summary Evaluation Results of the Staff Education Project by Content Experts

INSTRUCTIONS: Please check each item to see if the question presents the course objective and the correct answer is reflected in the course content.

Pre/post Test Item #

1.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant _	_Very relevant
	Comments:					
2.	Very irrelevant	Irrelevant	Neither im	relevant nor relevant	Relevant _	_Very relevant
Co	mments:					
3.	Very irrelevant	Irrelevant	Neither in	relevant nor relevant	Relevant _	_Very relevant
Co	mments:					
4.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant	Very relevant
Co	mments:					
5.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant	Very relevant
Co	mments:					
6.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant	Very relevant
Co	mments:					
7.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant	Very relevant
Co	mments:					
8.	Very irrelevant	Irrelevant	Neither in	elevant nor relevant	Relevant _	_Very relevant
Co	mments:					
9.	Very irrelevant	Irrelevant	Neither in	relevant nor relevant	Relevant _	_Very relevant
Co	mments:					
10.	Very irrelevant_	_Irrelevant	Neither in	relevant nor relevant	Relevant	Very relevant
Co	mments:					

	Evaluator 1	Evaluator 2
How	do you feel about the role y	you played as a content expert?
	Evaluator 1	Evaluator 2
	L	I
hat will y	you change?	
	Evaluator 1	Evaluator 2
Pre/	post-test	
	post-test the pre-test/post-test releva	nt to the content?
	the pre-test/post-test releva	
		nt to the content? Evaluator 2
	the pre-test/post-test releva	
Was	the pre-test/post-test releva Evaluator 1	Evaluator 2
Was	the pre-test/post-test releva Evaluator 1 can you change this projec	Evaluator 2 t?
Was	the pre-test/post-test releva Evaluator 1	Evaluator 2
Was	the pre-test/post-test releva Evaluator 1 can you change this projec	Evaluator 2 t?
Was	the pre-test/post-test releva Evaluator 1 can you change this projec	Evaluator 2 t?
Was	the pre-test/post-test releva Evaluator 1 can you change this projec	Evaluator 2 t? Evaluator 2
Was How	Evaluator 1 can you change this projec Evaluator 1 role of the student as the tea	Evaluator 2 t? Evaluator 2
Was How	Evaluator 1 can you change this projec Evaluator 1 role of the student as the tea	Evaluator 2 t? Evaluator 2 m leader.

I.

How do you feel about this project?

IV. Any Suggestions?

Evaluator 1	Evaluator 2

June/2022

Appendix H: Integrated Treatments Education Outline

- I. Integrated Treatments for Co-Occurring Disorders (CODs)
 - a. Educational PowerPoint
 - b. Introduction
- II. Introduction
 - a. Definition of Co-Occurring Disorders (CODs)
 - b. The connection between SUD and mental health disorders
- III. Prevalence of CODs
 - a. General problem
 - b. Significance of CODs
- IV. Integrated Treatments/Care
 - a. Explain Integrated Treatments
 - b. The significance of integrated treatments
- V. Core components of Integrated treatments
 - a. Providing access
 - b. Completing full assessment
 - c. Diagnosing the type/severity
- VI. Achieving integrated treatment
 - a. Motivational technique
 - b. Addiction counselling
 - c. Offering multiple treatments
 - d. Ensuring continuity of care

- e. Pharmacotherapy
- VII. Providing comprehensive services
 - a. Substance Use Disorder (SUD) treatments
 - b. Mental health treatment
 - c. Other additional services
- VIII. Providing appropriate level of care
 - a. Align the severity of patients' symptoms with appropriate SUD and mental health treatment
 - b. Level of care utilization
- IX. Principles of integrated treatments
 - a. Stepwise approach
 - b. Readiness for treatment
- X. Guiding principles of working with CODs
 - a. Appropriate support system
 - b. Providing essential services
- XI. Screening and assessment for CODs
 - a. Steps in the assessment process
 - b. Identification of mental health disorders seen in people with CODs

Appendix I: Frequency Tables

What is your current age?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	20-35 years of age	4	20	20	20
	36-50 years of age	8	40	40	60
	51-65 years of age	7	35	35	95
	66 years of age or older	1	5	5	100
	Total		100.0	100.0	

What is your gender?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Male	9	45	45	45
	Female	11	55	55	100
	Total	20	100.0	100.0	

What is your ethnicity?

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Black/African	2	10	10	10
	Hispanic/Latino	5	25	25	35
	Caucasian	13	65	65	100.00
	Asian	0	0	0	100.0
	Total	20	100.0	100.0	

How many years have you been in practice?

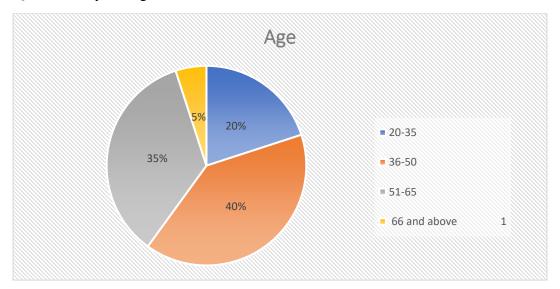
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	0-5 years	4	20	20	20
	6-10 years	4	20	20	40
	11-15 years	5	25	25	65
	16-20 years	4	20	20	85
	Over 20 years	3	15	15	100.0
	Total	20	100.0	100.0	

What is your educational pathway?

					Cumulative
		Frequency	Percent	Valid Percent	Percent
Valid	Physician	1	5	5	5
	Nurse Practitioner (NP)	3	15	15	20
	Registered Nurse (RN)	1	5	5	25
	Licensed Practical Nurse (LPN)	7	35	35	60
	Addiction Counselor	8	40	40	100.0
	Total	20	100.0	100.0	

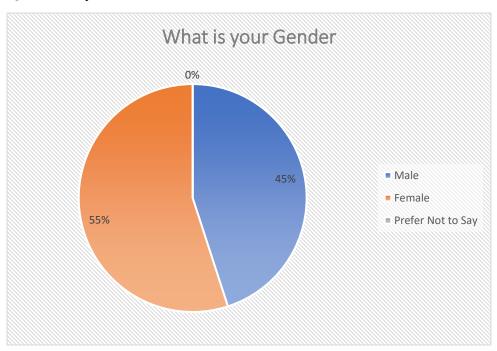
Appendix J: Data Questions and Questionnaire Findings

Q1- What is your Age?



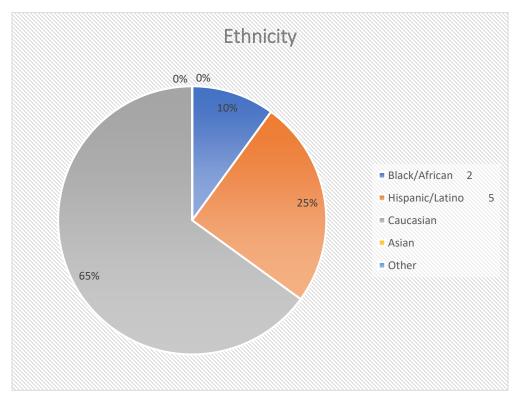
Answer Choices	Responses	Number
20-35 years	20%	4
36-50 years	35%	8
51-65	40%	7
66 and above	5%	1

Q2-What is your Gender?



Answer Choices	Responses	Number
Male	45%	9
Female	55%	11
Prefer not to say	0%	0

Q3-What is your Ethnicity?



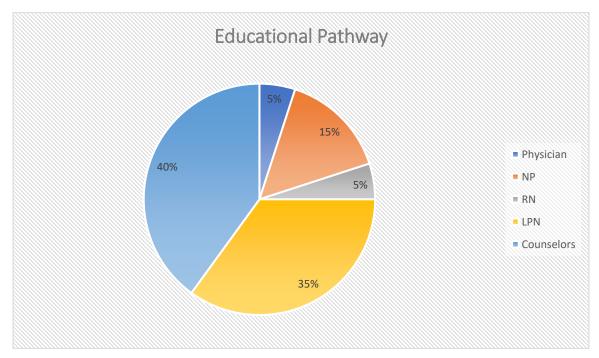
Answer Choices	Responses	Number
Black /African	10%	2
Hispanic/Latino	25%	5
Caucasian	65%	13
Asian	0%	0
Other	0%	0

Q4-How many years have you been in practice?



Answer Choices	Responses	Number
0-5 years	20%	4
6-10 years	20%	4
11-15 years	25%	5
16-20 years	20%	4
Over 20 years	15%	3

Q5- What is your educational pathway?



Answer Choices	Responses	Number
Physician	5%	1
Nurse Practitioner (NP)	15%	3
Registered Nurse (RN)	5%	1
Licensed Practical Nurse	35%	7
(LPN)		
Counselors	40%	8

Integrated Treatment for Co-Occurring Disorders (CODs)

PRESENTED BY

IHUARULAM CHIDIEBERE OKOROJI, MSN, RN, MSN, AGPCNP-BC

Pretest

 Please complete pretest prior to the presentation.

Curriculum Objectives

- The participants will be able to define the term co-occurring disorders (CODs)
- > The participants will able to identify at least two guiding principles of working with individuals with CODs
- The participants will be able to explain integrated treatments
- The participants will be able to identify three essential services for working with individuals with CODs
- The participants will be able to identify at least two stepwise approaches for treating CODs

Curriculum Objectives

- The participants willidentify pertinent aspects of screening and assessment of individuals with CODs
- The participants will be able to identify at least two components of completing full assessment for individuals with CODs
- The participants will be able to identify at least three core components of integrated treatments
- The participants will be able to identify at least three mental disorders seen in individuals with CODs
- The participants will be able to identify at least three socioeconomic and health factors strongly associated with CODs

Co-Occurring Disorders (CODS) Introduction:

- Co-Occurring Disorder (COD) refers to the condition of having at least one mental disorder and at least one substance abuse disorder.
- CODs are strongly associated with socioeconomic and health factors that can challenge recovery, such as unemployment, homelessness, criminal justice system involvement and suicide.
- Individuals with (Substance Use Disorders) SUDs are more likely than those without to have co-occurring mental disorders.
- Individuals with CODs are at a greater risk for self-harm, especially if they have history of trauma.

PREVALENCE OF CODS

GENERAL PROBLEM

- About 20.3 million individuals are struggling with substance use disorder, and 37.9 % of them also had mental illness and among the 42.1 million individuals with mental illness, 18.2 % of them had substance use disorder (National Institute on Drug Abuse, 2018).
- CODs have been associated with poorer patient outcomes, increased rate of relapse, poor recovery, increased use of psychiatric services, and increased use of emergency services (Yule & Kelly, 2019).
- All individuals with COD do not get the treatment they need. About 52.5% of individuals with COD did not receive either MH treatment or SUD treatments, 34.5% received MH treatments only, about 3.9% received SUD treatments only, and only 9.1% received both MH treatments and SUD treatments.

KEY MESSAGES

- Given the prevalence of CODs in the U.S, the providers and administrators should focus on treating the complexity of this vulnerable population.
- The providers should work with clients to create a comprehensive, individualized plan to treat both substance abuse disorder and mental health disorder.
- Mental disorders are likely to co-occur with addiction include depressive disorders, bipolar, PTSD, schizophrenia and eating disorder.
- > There is no "wrong door" by which people with CODs arrive at treatment.

KEY MESSAGES

- Serious gaps exists between the treatment and service needs of people with CODs and the actual care they receive.
- Failure to routinely screen clients for mental disorders and SUDs creates a problematic domino effects. Lack of a lack of treatment.
- CODs are treatable conditions. Providers can implement a range of treatment modalities across the continuum of care to address the complex needs of this population.

KEY MESSAGES-Stepwise Approach

CODs are treated with step-wise approach tailored to client's stage of readiness for treatment:

- > Treatment Engagement
- > Persuasion
- > Active Treatment
- > Relapse Prevention.

INTEGRATED TREATMENTS/CARE

- Integrated treatment involves specific treatment strategies or techniques in which interventions for both the SUD and mental disorder are combines in a single session or a series of sessions.
- > This is considered the best practice for individuals with CODs.
- Offering Integrated treatment will engage individuals in a trusting relationship, assist them in meeting their needs and assist them to provide support the use of community services.
- > To engage in accurate treatment planning and offer comprehensive, effective and responsive services, clinicians must be able to recognize the mental disorders most likely to co-occur.

Core components of Integrated treatments for nurses, counselors and providers

PROVIDING ACCESS

- Routine access to treatment for individuals who are not in crisis and emergency access for those in crisis.
- Outreach to individuals with significant needs
- Access that is involuntary or mandated by the criminal justice system, employers or child welfare system

Core components of integrated treatment for nurses, counselors and providers

COMPLETING A FULL ASSESSMENT

- Screening to detect the presence of CODs
- Evaluating background factors, mental disorders, SUDs, and related medical and social problems critical for treatment planning.
- Diagnosing the type and severity of SUDs and mental disorders.
- > Matching the client to initial services
- > Appraising the client's need for social and community support services
- > Conducting continuous evaluation

Core components of integrated treatments for nurses counselors and providers

ACHIEVING INTEGRATED TREATMENT

- > Integrated treatments are preferred model of treatment for individuals with CODs
- > SUDs and mental disorders are treated concurrently to meet the full range of clients symptoms.
- > Motivational techniques (motivational interviewing, motivational counselling) are integrated into care to help clients reach their goals.
- Addiction counseling is used to help clients develop
- Clients are offered multiple treatment formats, including individual, group, family, and peer support, as they move through stages of treatment.

Core components of integrated treatments for nurses, counselors and providers

ACHIEVING INTEGRATED TREATMENT

- > Pharmacology Interventions are safe and effective for many individuals with CODs.
- Pharmacotherapy should be offered to clients when appropriate and monitored for safety (e.g interactions with other medications), adherence and response and clients monitored for safety.
- Although prescribing is outside the scope of addiction counselor, licensed social workers and most psychologists, all providers should be familiar with common psychotropic medications, their side effects, and their potential risks.
- > Ensuring continuity of care, consistency between services, seamless as clients move across the continuum of care and all levels of care.

Core components of integrated treatments for nurses, counselors and providers

PROVIDING COMPREHENSIVE SERVICES-

Along with treatment for SUD and mental disorders, individuals with CODs often need additional services such as:

- > Life skills development
- > English as second language
- > Parenting
- > Nutrition
- Vocational assistance

Core components of integrated treatments for nurses, counselors and providers

PROVIDING AN APPROPRIATE LEVEL OF CARE

- Whenever possible place client in appropriate level of care to meet their complex functional needs, challenges, severity of symptoms, and recovery environment that aligned with both SUD and mental health disorders.
- The Level of Care Utilization System (LOCUS) by the American Association of Community Psychiatry is a model describing six levels of care that increases in intensity based on clients assessment across six dimension.
- Locus is a standardized tool that ensures scarce healthcare resources are consistently utilized in the most effective and efficient manner.

Practice principles of integrated treatment

- SUDs and mental disorders are treated concurrently to address their symptoms
- ➤ CODs are treated with a stepwise approach tailored to the client's stage of readiness for treatment
- Stages of Readiness for treatment: Engagement, Persuasion.

 Active treatment and Relapse prevention

Guiding principles of working with individuals with CODs

- Use a recovery perspective
- Adopt a multi-problem viewpoint
- Develop a phase approach to treatment
- Plan to address the client's cognitive/functional concerns
- Use support systems to maintain and extend treatment effectiveness.

Essential Services for Individuals with CODs

- > Person Centered care
- >Trauma informed care
- ➤ Culturally sensitive care
- > Recovery-oriented care
- ➤ Comprehensive care

Screening And Assessment for CODs

- Screening is a formal process of testing to determine a client whether a client warrants further assessment for a COD.
- The screening process for CODs seeks to answer a yes or no questions.
- Screening and assessment are central to identifying and treating clients with CODs promptly.
- Assessment process is a multifactorial approach to determine which symptoms and diagnoses might be present, and how to tailor decisions about treatment and follow-up care based on result.

Screening and Assessment for CODs

- Understanding why, who and when to screen and which validated tools to use is the key to success.
- > The assessment process is a multifactorial approach to determine which symptoms and diagnoses might be present, and how to tailor decisions about treatment and follow-up care based on the outcome of the assessment.
- The assessment must include a review of three pertinent factors:
- Biological: such as family history and underlying medical conditions'
- Psychological: such as previous mental health diagnosis, coping skills and stressors.
- Social: such as relationships, social support, access to health care, housing, and employment.

Steps in the assessment process

- Engage the client
- Identify and contact family, friend or other providers to gather additional information
- > Screen for and detect CODs
- Determine quadrant and locus of responsibility
- > Determine diagnosis

- Determine disability and functional impairment
- Identify strength and supportsIdentify cultural and
- linguistic needs and support
- > Identify problem domain
- Determine stage of change
- > Plan treatment

Disorders Seen in People with CODs.

- Major Depressive Disorders (MDD)-Individuals exhibits 5 or more of the following symptoms for the same two week period (depressed mood, loss of pressure, significant weight loss of gain, insomnia or hypersomnia, psychomotor agitation, feeling of worthlessness, current worth of death of suicidal thoughts, fatigue or loss of energy, feeling of worthlessness, excessive guilt (at least one of symptoms is depressed mood or loss of pleasure).
- Persistent Depressive Disorder(PDD)- Individual experiences a depressed mood that lasts most of the day, for at least two years and presents with two or more of the following symptoms-fatigue or low energy, poor concentration, poor appetite or overeating, poor concentration or difficulty making decision, feeling of hopelessness.

Disorders Seen in People with CODs

- Bipolar 1 Disorder-Individual experience at least one manic episode, a distinct period of at least a week in which symptoms include inflated self esteem or grandiosity, decreased need for sleep, pressured speech or more talkative than usual, flight of ideas or racing thoughts, distractibility, increase in goal directed activity. Beside at least one manic episode, an individual with bipolar 1 disorder also experience depressive episodes with symptoms consistent with MDD.
- Post Traumatic Stress Disorder (PTSD)-Experience exposure to actual or threatened
 death, serious injury or sexual violence and symptoms post-exposure. Exposure can be
 related to trauma, witnessing trauma, learning that close friends or family experienced
 trauma, or repeated exposure to traumatic events; symptoms include night terrors,
 mood or cognition changes, impulse control

Disorders Seen in People with CODs

- Personality Disorder (PD)-Lifelong difficult forming healthy, functional relationships with others and difficulty developing an adaptive sense of self and affects cognition, affectivity, interpersonal functioning ad impulse control.
- Generalized Anxiety Disorder (GAD)-Experience excessive anxiety and worry, apprehensive. The anxiety is intense, frequent, chronic and disproportionate to the real threat posed by the subject of worry.
- Panic Disorder (PD). Individual experiences repeated panic attacks that are distressing and disabling.

References

Substance Abuse and Mental Health Administration (2021), substance use disorder treatment for people with co-occurring disorder. Retrieved from https://store.samhsa.gov/sites/default/files/SAMHSA_Digital_Download/PEP20-06-04-006.pdf#:~:text=This%20Advisory%20is%20based%20on%20the%20SAMHSA%E2%80%99s%20Treatment,the%20treatment%20of%20individuals%

 $National \ Institute \ on \ Drug\ Abuse\ (2018). \ Comorbidity\ substance\ use\ and\ other\ mental\ disorders.\ Retrieved\ from \ https://www.drugabuse.gov/drug-topics/trends\ statistics/infographics/comorbidity-substance-use-other-mental-disorders$

National Institute on Drug Abuse (2020). The Connection Between Substance Use
Disorders and Mental Illness. Retrieved from https://www.drugabuse.gov/publications/research-reports/common-comorbidities
substance-use-disorders/part-1-connection-between-substance-use-disorders-mental-illness on 2021, March 8

Substance Abuse and Mental Health Service Administration (2020). Tip 42: Substance use treatment for persons with cooccurring disorders. Retrieved fromhttps://store.samhsa.gov/product/tip-42-substance-use-treatment-persons-co-occurringdisorders/PEP20-02-01-004

Questions



Posttest Please complete posttest.