

Analysis of the Effectiveness of Painting Art Healing in Mental Health Problems in Different Populations

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ABSTRACT

This study aims to systematically analyze the application effect of painting therapy in the treatment of mental health problems in different populations, and to explore its universality and specificity in different age groups, genders, cultural backgrounds, and mental health conditions. Through literature review, comparative research methods, and case study methods, the effectiveness of art therapy in elderly, adult, adolescent, and child populations was comprehensively evaluated. The results of the study show that art therapy can significantly promote emotional regulation, improve cognitive function, enhance social interaction, and develop self-identity, especially in alleviating emotional disorders such as anxiety and depression. However, this study also found that there are certain deficiencies in the methodological quality, sample representativeness, and long-term effects research of art therapy. Future research should further focus on the standardization, long-term effectiveness, and cross-cultural applicability of interventions to promote the widespread application of art therapy in the field of mental health.

KEYWORDS

Art Therapy; Painting Therapy; Mental Health; Emotional Regulation; Non-Pharmacological Intervention; Expressive Art Therapy.

1. INTRODUCTION

In the 21st century, mental health issues have become a major global public health issue. The World Health Organization (WHO) reports that approximately 1 billion people worldwide suffer from mental health problems, with adolescents accounting for as much as 14%. Suicides result in more than 700,000 deaths per year, accounting for more than 1% of all deaths globally, and 58% of all suicides occur in people under the age of 50 [1]. This stark reality highlights the urgency of exploring effective treatments. The diversity and complexity of mental health problems call for a diverse range of interventions. In this context, painting art therapy, as a form of Expressive Arts Therapy (EXAT), has been gradually attracting attention from both academia and practice due to its unique therapeutic mechanism and wide applicability. Through the medium of artistic creation, painting art therapy promotes individual emotional expression and psychological integration, forming a comprehensive therapeutic means. In the process of art healing, individuals can realize self-exploration and emotional release through art creation. Art healing has been shown to be effective as a complementary therapy to help patients relieve psychological stress and emotional distress, and to promote individuals' deeper understanding of self and others [2]. Painting art healing offers a gentle and creative therapeutic alternative. As a non-pharmacological intervention, drawing healing has great potential to promote patients' self-expression and emotional regulation and to improve their quality of life [3]. Under the current rapid development of mental health problems and the diversity of psychological problems

faced by different social groups, drawing therapy is able to provide personalized treatment options based on individual differences. Based on this, this study aims to analyze the therapeutic effect of painting art therapy in different groups of people with mental health problems. It explores how painting therapy works on individuals of different ages, genders, cultural backgrounds and mental health conditions, and reveals its generalizability and specificity in mental health improvement.

2. INTRODUCTION TO THE CONCEPT AND ROLE OF PAINTING ART HEALING

2.1. Conceptualization of Painting for Healing

Painting therapy, as a form of Expressive Arts Therapy (EXAT), is an integrative therapeutic approach that combines the visual arts and psychotherapy [4]. This therapeutic approach, through the medium of art making, not only facilitates the expression of an individual's emotions and psychological integration, but also provides a non-verbal means of communication for the individual to explore and express inner experiences [5]. The definition of art healing is widely accepted in the academic community, with the generally accepted definition being the facilitation of an individual's emotional expression and psychological integration through the medium of artistic creation [6]. The historical roots of painting healing can be traced back to ancient civilisations when the potential value of art in the healing process was recognised. However, it was not until the mid-twentieth century, with advances in psychology and art therapy, that art healing began to be recognised as a professional therapeutic practice [4]. Particularly after the Second World War, art therapy pioneers began to implement art therapy in medical and educational institutions and documented their practical experiences, providing an important basis for the professionalisation and systematic development of art therapy [6]. The theoretical basis of painting art therapy includes several psychological and art-therapeutic theories. These include the natural tendency of human beings to create art, the emotional expression and cognitive processing in the process of creating art, and the effect of artworks on the psychological state of individuals [5]. Painting healing theorists believe that creating art activates multiple regions of the brain and promotes emotional and cognitive integration, thereby contributing to the individual's psychological adjustment and healing [6].

2.2. Mechanisms of Painting Healing

The mechanism of action of art healing can be understood from several perspectives. First, as a non-verbal form of communication, art-making provides a safe and free way for individuals to explore and express their inner experiences [5]. Secondly, the aesthetic experience of creating art triggers physiological, emotional and cognitive responses that are closely related to an individual's mental health [4]. In addition, art-making activities can activate multiple regions of the brain, including brain networks related to sensorimotor, emotional appraisal, and knowledge-meaning systems, which can help improve an individual's attention, memory, and decision-making abilities [5]. Painting as a healing art has been used in a range of settings including mental health, education, healthcare and community services [7]. In mental health, drawing therapy has been used to help individuals cope with mood disorders, post-traumatic stress disorder, anxiety and depression [2]. In education, drawing therapy has been used as a tool to promote creativity and self-expression in students [3]. In the medical field, drawing therapy has been used as an adjunct to traditional therapies to improve the quality of life of patients [4]. In the community, painting therapy has been used to promote social engagement and community cohesion [7]. Currently, research into drawing healing is gaining momentum. Researchers have used empirical studies to investigate the effects of painting healing in different populations and have attempted to elucidate its mechanisms of action [5]. However, the methodological quality of the studies varies, and issues of sample representativeness and the impact of cultural differences may limit the generalisability of the findings [2]. In addition, the long-term

effects and sustainability of art therapy require further research [4]. Painting therapy as a psychotherapeutic tool has unique advantages and a wide range of potential applications. Its concept, history, theoretical basis, mechanism of action, field of application and current state of research all indicate that painting art healing is a field worthy of further research and development [7]. Future research needs to pay more attention to methodological rigour, sample representativeness, and cross-cultural studies to promote the application of painting art healing in a wider range of fields [3].

3. ANALYSIS OF THE EFFECTS OF ARTISTIC HEALING THROUGH PAINTING ON MENTAL HEALTH ISSUES IN DIFFERENT POPULATIONS

3.1. Elderly Population

Mental health problems in older people are usually associated with emotions such as cognitive decline, loneliness and fear of death. These emotional problems are closely linked to brain atrophy and degenerative changes in nerve cells, particularly in specific areas of the brain, as seen in older people with depression and dementia [8]. Social isolation, especially loneliness and social isolation problems due to life events such as widowhood and retirement, is a major contributor to mental health problems in older people [9]. Painting therapy not only promotes cognitive function, but also alleviates loneliness and social isolation in older adults by providing a creative means of expression [10]. The aesthetic experience and emotional expression of artistic creation helps older adults find a sense of belonging and self-worth in social interactions, thus improving their mental health [11].

Despite the positive effects of art therapy on the older population, there are some limitations. First, older adults may have difficulty engaging in certain art-making activities due to possible limitations in physical dexterity and cognitive abilities [12]. Second, older adults may be sceptical of art therapy, viewing it as 'child's play' rather than an effective therapeutic tool [9]. In addition, the long-term effects and sustainability of art therapy in the older adult population have not been adequately studied, limiting its widespread use in geriatric mental health interventions.

3.2. Adults

Mental health problems in adults are often closely linked to life stages such as career development, family responsibilities and mid-life crises. These problems can manifest as work stress, family tensions and challenges in the pursuit of self-actualisation. At a neurological level, mood disorders such as depression and anxiety have been linked to abnormalities in the connectivity of emotion-processing regions of the brain, such as the amygdala, and cognitive-control regions, such as the prefrontal cortex. In addition, abnormal levels of neurotransmitters such as dopamine, GABA and glutamate have been linked to schizophrenia and other major mental illnesses [13]. Major causes of mental health problems in adults include life stressors such as work pressure, financial problems and family responsibilities, as well as chronic physical illnesses, all of which can increase the risk of mental health problems [14].

Painting for healing provides adults with a non-verbal means of expression that allows them to explore and express their inner feelings on a deeper level and achieve emotional release and regulation [15]. Multimodal information processing during art-making promotes brain plasticity, which has a positive impact on cognitive function [16]. Limitations faced by the adult population in engaging in painting for healing include time constraints and conflicting work responsibilities. Many adults may struggle to find the time and energy to engage in art healing activities due to work and family responsibilities [17]. In addition, the social stigma of mental health problems may contribute to adults' reluctance to seek non-traditional treatments such as art therapy [18]. The short-term effects of art

healing may not be sufficient to motivate sustained participation, and the assessment of long-term effects has not been adequately researched in youth populations [19].

3.3. Adolescents

The particular nature of mental health problems during adolescence is characterised by rapid physical and mental development, self-identity formation and coping with academic and social pressures. During this time, they may face particular challenges such as academic anxiety, social anxiety, self-acceptance issues and adolescent body image problems. Changes in brain function and structure, particularly in the development of the prefrontal cortex, an area closely associated with decision-making and emotion regulation, and whose abnormal activity is often associated with mental health problems such as depression and anxiety [20]. Neurotransmitter imbalances, such as depression, which is often associated with abnormal levels of serotonin in the brain, are also an important biological factor in adolescent mental health problems [21]. Social stressors, including academic pressure, relationship problems and identity confusion, as well as changes in hormone levels, are important in influencing adolescents' moods and behaviours, which can lead to mental health problems [22].

Art therapy as a complementary therapy helps to address learning anxiety, self-efficacy and social anxiety in adolescents [23]. Art-making activities activate brain networks associated with sensorimotor, emotional appraisal and knowledge-meaning systems, which help to improve adolescents' attention, memory and decision-making skills [24]. Studies need to use more rigorous research designs, such as randomised controlled trials, to improve the quality of studies and increase sample size and diversity to improve the generalisability of findings [25]. Long-term follow-up studies are needed to assess the sustained effectiveness and impact of interventions and to provide follow-up support to help young people maintain and consolidate the effects of interventions [26]. In addition, school, family and community resources should be combined to support adolescents' mental health, and parent education and training should be provided to improve parental support [27].

3.4. Children

Childhood is a critical period of growth and development in which children learn basic social and academic skills, and mental health problems during this period are strongly linked to neurodevelopmental abnormalities. Research in developmental neurobiology has shown that neurodevelopmental disorders such as attention deficit hyperactivity disorder (ADHD) are associated with abnormalities in the activity of specific brain regions such as the prefrontal cortex [28]. The interaction of genes and environmental factors also affects children's behavioural and emotional development, for example, children who carry certain gene variants are more likely to have behavioural problems in poor home environments [29]. Environmental factors such as poor home environment, abuse and neglect can have a negative impact on children's mental health. Genetic factors also play a key role in certain mental health problems, such as autism spectrum disorder (ASD), which has a significant genetic predisposition [30]. Art therapy can provide a safe and free way for children to explore and express their inner experiences [31]. Art-making, as a form of self-expression, can help children to construct and reshape their self-narratives, thereby promoting the development of self-identity [32]. Individualised intervention programmes need to be provided according to children's age, gender and individual differences, and child-friendly methods such as games and stories need to be used to increase the appeal and effectiveness of interventions [33]. The involvement of parents and teachers is also crucial, with their supportive capacity enhanced through training and guidance, and the establishment of home-school collaborative mechanisms to support children's mental health development [34]. In addition, multidisciplinary knowledge and approaches from psychology, education and social work should be combined to provide integrated interventions and comprehensive support and services through multidisciplinary teamwork [32].

4. SUMMARY AND OUTLOOK

This study systematically investigated the effects of art therapy in different populations with mental health problems. A comprehensive analysis showed that painting art healing had significant positive effects on emotion regulation, cognitive function, quality of life and social interaction. The acceptability of art therapy and patient participation are also issues of concern in the trial. Some patients may refuse to participate or drop out early due to disinterest in art, lack of confidence, or illness complications. In addition, there are difficulties in evaluating the effectiveness of art therapy; traditional quantitative evaluation methods may not be appropriate for measuring the effectiveness of art therapy, and more qualitative studies and innovative evaluation tools are needed. Finally, effective art therapy requires the guidance of professional art therapists, but these professionals may be relatively scarce in certain regions or institutions, limiting the popularisation and application of art therapy. Therefore, in order to improve the quality of research and the effectiveness of practice of art therapy, improvements and optimisations are needed in theoretical underpinnings, standardisation of interventions, sample representativeness, randomisation methods, long-term effect tracking, effect assessment mechanisms, and professional guidance. In conclusion, painting art therapy has a wide range of potential applications for mental health problems in diverse populations, but also faces many challenges. Future studies should aim to optimise the intervention protocol, improve the quality of the study, increase the representativeness of the sample, and explore the long-term effects in depth, in order to promote the wider application of art therapy in the field of mental health.

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