

**„ION CREANGĂ” STATE PEDAGOGICAL UNIVERSITY IN CHIȘINĂU
DOCTORAL SCHOOL OF PSYCHOLOGY**

Manuscript title

C.Z.U. 343.914:159.9(043.2)=111

CHIȚOI ANCA-DANIELA

**PERSONALITY PROFILE OF INCARCERATED FEMALE
CRIMINALS**

**511.02 DEVELOPMENTAL PSYCHOLOGY AND EDUCATIONAL
PSYCHOLOGY**

Summary of the Doctoral Dissertation in Psychology

Chișinău, 2025

The dissertation was developed within the Doctoral School of Psychology at the „Ion Creangă” State Pedagogical University

Composition of the Doctoral Dissertation Public Defense Committee:

Chairperson: GLAVAN Aurelia, University Professor, doctor habilitated „Ion Creangă” State Pedagogical University of Chisinau (UPSC)

Doctoral Supervisor:

GROZA Angela, Associate Professor, PhD in Psychology, „Ion Creangă” State Pedagogical University of Chisinau (UPSC)

Official Reviewers:

1. **GONȚA Victoria**, Associate Professor, PhD in Psychology, „Ion Creangă” State Pedagogical University of Chisinau (UPSC)
2. **RUSNAC Svetlana**, Associate Professor, PhD in Psychology, Free International University of Moldova (ULIM)
3. **CERLAT Raisa**, Associate Professor, PhD in Psychology, State University of Moldova (USM)

The defense will take place on 01.12. 2025, at 10.00, during the meeting of the Doctoral Committee within the Doctoral School of Psychology at „Ion Creangă” UPSC, located at 1 I. Creangă Street, MD-2069, Building 2, Room 30.

The doctoral dissertation and its summary can be consulted at the Scientific Library of the „Ion Creangă” State Pedagogical University and on the ANACEC website <https://anacec.md/>
The summary was sent on

Chairperson of The Doctoral Committee **GLAVAN Aurelia**, Univ. Prof., Dr. Hab.

Doctoral Supervisor
Author

GROZA Angela, Associate Prof., PhD
CHIȚOI Anca-Daniela

TABLE OF CONTENTS

Conceptual Framework of the research	4
Content of the Dissertation	8
General Conclusions and Recommendations	23
Bibliography	24
List of Author's Publications.....	26
Annotation (Romanian, English).....	27

CONCEPTUAL FRAMEWORK OF THE RESEARCH

Relevance and Importance of the Addressed Issue. Criminality, particularly violent crime, represents a serious social issue with profound impacts on individuals and communities. Traditionally, it has been viewed from an androcentric perspective, considered a predominantly male phenomenon. Numerous theorists have formulated explanations of criminal behavior while ignoring the significance of gender differences, extending conclusions drawn from male behavior to women without adequate empirical support [11]. This one-dimensional approach has contributed to an incomplete understanding of the female criminality and has created gaps in the development of effective therapeutic intervention strategies for incarcerated women.

The relevance of this topic lies in its contribution to overcoming these theoretical limitations by offering a comprehensive analysis of female criminality, incorporating psychological, contextual, and social factors specific to women.

The importance of the topic is underscored by recent data on female criminality in Romania. Between 2021 and 2024, there was a 13.62% increase in the number of women arrested for various offenses [3]. Among these, the proportion of women convicted for homicide rose from 20.48% in 2021 to 22.72% in 2024, indicating a concerning trend and highlighting the need for specialized interventions tailored to the psychological specifics of women. This dynamic is not an isolated phenomenon but reflects a global trend. Internationally, studies show a dramatic increase in the incarceration rate of women, with over a 457% rise in 2020 compared to 1980, as noted by M. Pitaro [34].

In this context, a reevaluation of existing paradigms and a deeper exploration of the psychological dimensions of female criminality are necessary, particularly regarding personality traits that may serve as both risk factors and points of intervention. Personality development is influenced by a complex interplay between genetic factors and early life experiences. Abuse, neglect, punitive parenting styles, or the absence of emotional support can contribute to the formation of dysfunctional behavioral patterns and the internalization of aggression. These experiences can have profound and lasting consequences on an individual, leading to low self-esteem, negative self-perception, trust issues, difficulties in building and maintaining relationships, dependency or isolation, and challenges in managing stress and conflicts. In the context of female criminality, a negative self-image and lack of confidence in their ability to handle life's challenges contribute to the manifestation of criminal behaviors [11].

In the case of women, abuses are not limited to childhood but often continue into adulthood, influencing their decisions and behaviors. Sometimes, homicides committed by women represent extreme responses to prolonged abuse, with the crime being a last resort to escape an unbearable situation or to seek justice [36].

In light of these realities, the relevance of the topic is further emphasized by new perspectives in personality psychology, which propose a more optimistic view regarding the potential for personality change and development throughout life. Contrary to the traditional notion that personality traits are fixed and immutable, recent research, such as that conducted by B. W. Roberts and W. F. DelVecchio (2000), B. W. Roberts *et al.* (2006) [30, 6], M. Allemand *et al.* (2008), R. E. Lucas and M. B. Donnellan (2008, 2011), R. Lehmann *et al.* (2013), J. Wortman *et al.* (2012), C. Kandler *et al.* (2015), or W. J. Chopik and S. Kitayama (2018), demonstrates that these traits can undergo significant changes even in adulthood, influenced by life circumstances or well-targeted psychotherapeutic interventions. This new perspective on personality traits provides a solid scientific foundation for developing psychological intervention strategies focused on optimization, transformation, adaptation, and social reintegration. It supports the idea that women incarcerated for homicide can benefit from programs that facilitate real and lasting changes in their personality and behavior.

Description of the Research Field and Identification of the Research Problem. Analysis of the specialized literature shows that female criminality is underrepresented and shaped by a masculine perspective, both theoretically and practically. Theoretically, criticism has been directed at theories regarding the causes of criminal behavior, which have been described as “weak and invalid” and “distorted by an almost constant focus on male criminality” [8, p. 221], as they were more based on the erroneous premise that “delinquency is committed in the vast majority of cases by male individuals” [32, p. 41]. Although interest in female criminality has significantly increased in recent decades, and international literature is rich in studies on crime, research specifically dedicated to women remains limited, particularly regarding personality traits. Available studies often treat incarcerated women as a homogeneous group, ignoring the diversity of offender typologies. This leads to an underestimation of the variety of female offender types, neglecting the particularities and complexity of women’s situations.

In practical terms, psychological interventions tailored for female offenders remain insufficiently developed, and the intervention programs currently implemented in prisons are designed for the general prison population without considering women’s specific needs. Female offenders face double stigmatization – for breaking the law and violating gender norms – and frequently exhibit personality disorders and a history marked by abuse. However, current intervention programs do not adequately address these vulnerabilities, limiting their effectiveness and the risk of recidivism. The lack of gender-sensitive therapeutic models represents a significant gap in both the specialized literature and prison practice.

Thus, the described context generates the research problem, which can be solved by answering the following questions: what personality traits and disorders distinguish women who have committed murder from those who have committed non-violent crimes, and what is the impact of a psychological intervention program on the personality traits of incarcerated female offenders?

The purpose of the research was to identify the specific personality traits of incarcerated female criminals, followed by the development and implementation of a psychological intervention program aimed at optimizing the identified personality traits in this category of inmates.

Objectives Established to Achieve the Purpose:

- Comparative study of the personality profile of the incarcerated female criminals in relation to incarcerated women who have committed non-violent crimes
- Evaluation of the clinical profile of incarcerated female criminals
- Determination of the presence of abuse in the life history of incarcerated female criminals
- Development and implementation of a psychological intervention program aimed at optimizing in incarcerated female criminals
- Determination of the effectiveness of the psychological intervention program.

Research Hypothesis. We assume that there is a difference between incarcerated female offenders who committed violent crimes and those who committed non-violent offenses regarding their personality profile, the presence and higher intensity of personality disorders, and a life history marked by experiences of abuse. Additionally, participation in a psychological intervention program will lead to optimization of the personality traits of incarcerated female criminals.

Theoretical framework of Research. The theoretical framework included: *theories attempting to explain criminal behavior* - F. Adler *et al.* [2], T. Amza [4], S.E. Brown, F.A. Esbensen, G. Geis [10], I. Ciobanu [22]; *studies on the personality of offenders, describing various typologies* - D. A. Andrews, J. Bonta [5], T. Bogdan [9], D. Canter [13], Bull *et al.* [12], M. Iovan [28], Mitrofan *et al.* [35]; *perspectives on female criminality* - R. Barberet [7], M. Chesney-Lind, L. Pasko [14], S.L. Mallicoat [29], S. Walklate [37]; *works and studies addressing general factors leading to criminal behavior, as well as factors specific to female criminality* - L. Acoca [1], S.S. Covington [25], Drapalski *et al.* [26], D. Finkelhor [27], S.L. Miller [31], S. Palmer, J.A. Humphrey [33], Warren *et al.* [38], Gido *et al.* [39].

Scientific Research Methodology: *theoretical methods* – analysis and synthesis of specialized literature to identify relevant theoretical models, concepts, and paradigms for the research field; *empirical methods* - Zuckerman-Kuhlman Personality Questionnaire (ZKPQ), Five-Factor Nonverbal Personality Questionnaire (FFNPQ), Freiburg Personality Inventory Form G (FPI G), Structured Clinical Interview for DSM Disorders II (SCID II), Scale for Detecting Abuse and Trauma, and statistical methods – frequency and mean calculations, Kruskal-Wallis test, Pairwise Comparisons analysis, Mann-Whitney test, and Wilcoxon test.

The results contributing to solving the scientific problem include: the development of a model for investigating the personality profile of incarcerated female criminals, the identification of common

personality traits among female criminals, and the development and implementation of a psychological intervention program aimed at optimizing the identified personality traits.

Scientific Novelty and Originality. For the first time at the national level, the personality profile of incarcerated female criminals was studied in comparison with other categories of incarcerated women who committed non-violent offenses. A methodology for evaluating and identifying the distinctive personality traits of incarcerated female criminals was developed. A psychological intervention program was designed and implemented, specifically tailored to women who committed homicide, addressing the unique personality characteristics of this group of incarcerated women. For the first time at the national level, methods and techniques specific to experiential-humanistic therapy were utilized. The proposed intervention program is based on modern research challenging the traditional view of rigid personality, demonstrating the plasticity of personality traits in adults.

The theoretical significance lies in: *enriching psychological and criminological literature* – female offenders are a less researched category, and the dissertation contributes to filling this theoretical gap by analyzing and identifying personality traits specific to female criminals; *developing a theoretical framework for therapeutic intervention* – the dissertation extends the applicability of the experiential-humanistic approach in the prison context, demonstrating how its principles and techniques can be used to optimize personality traits; *highlighting differences between various types of female offenders*.

The applied value of the research is derived from: a detailed investigation of incarcerated female criminals, including temperamental and biological traits (ZKPQ), personality factors based on the Big Five model (FFNPQ), and emotional and behavioral dimensions (FPI-G); identifying experiences of abuse (Scale for Detecting Abuse and Trauma) and personality disorders (SCID-II); establishing common personality traits among women who committed homicide compared to female offenders who committed non-violent offenses; developing a personalized therapeutic intervention model based on the identified personality traits; differentiating between the personality profile of various categories of female offenders, which enable the development and application of a psychological intervention program aimed at optimizing the identified personality traits; evaluating the effectiveness of the psychological intervention program design to optimize the identified personality traits; contributing to the improvement of prison practices by: *validating the effectiveness of personalized intervention* – the dissertation demonstrates the importance of a research-based approach tailored to gender and offense typology (homicide, theft, drug trafficking, robbery...), thus paving the way for the development of more effective psychological intervention programs that address real, specific needs of incarcerated women; *providing a theoretical and practical framework for psychologists in the prison administration system* – the dissertation integrates theoretical models and framework with practical tools (assessment methods, intervention techniques).

Main Scientific Results Submitted for Defense: 1) a distinct personality profile of incarcerated female offenders who committed homicide was identified, differing from that of women convicted for economic crimes, theft, and drug trafficking; 2) a pronounced clinical profile regarding personality disorders was highlighted in incarcerated women offenders who committed homicide compared to those convicted for economic crimes, theft, and drug trafficking; 3) incarcerated women offenders who committed homicide have a life history marked by abusive experiences, having been subjected to physical, sexual, and neglect-related abuse in their past to a greater extent compared to those who committed non-violent offenses; 4) the therapeutic intervention based on experiential-humanistic principles and techniques leads to the optimization of personality traits in female criminals, with beneficial effects on their overall level of functioning.

Approval and Implementation of Research Results. The research results were discussed and approved during the meetings of the Psychology Department at the State Pedagogical University “Ion Creangă” in Chișinău. They were also presented at the scientific conference organized by the State Pedagogical University “Ion Creangă”: “Current Concerns of the Humanities”, 19th Edition, International Scientific Event, Chișinău, 2021. Various aspects of the research were presented and discussed at national and international scientific conferences: “Contemporary Concerns of Criminology, Law, and Psychology in Pandemic Conditions”, Chișinău, 2020; “Adaptive and Maladaptive Competencies”, 17th Edition, Brașov, 2022; Kaleidoscope. International Conference for Doctoral Students, Post-Doctoral Researchers, and Young Researchers in the Humanities, Iași, 2023; International Conference on Psychology, Language, and Teaching, Dubai, United Arab Emirates, 2024. Seven articles related to the research topic were published in specialized journals. The entire process was conducted in compliance with legal provisions regarding the methodology for carrying out research projects in the prison system, with a Research Protocol signed with the facility housing the inmates. Subsequently, the intervention program was approved by the prison administration and proposed for implementation within the National Prison Administration System.

CONTENT OF THE DISSERTATION

The dissertation consists of annotations (in two languages), a list of abbreviations, an introduction, three chapters, general conclusions and recommendations, a bibliography, and appendices.

In the **Introduction**, the relevance and importance of the research topic are highlighted, the significant problem addressed is outlined, the purpose and objectives of the investigation are presented, the scientific novelty of the results obtained is emphasized, the theoretical significance and applied value of the work are discussed, and the method of implementing the results is described.

In **Chapter I**, titled *Theoretical Approaches in the Study of the Personality of Incarcerated Female Criminals*, various conceptual frameworks, models, and psychological theories applicable to the analysis of female criminal behavior are presented. Fundamental concepts underlying the study are defined, namely

offense, crime, female offender, incarceration, and female criminal. From a legal perspective, an *offence* is an act defined by criminal law and attributable to the person who committed it. From a psychological perspective, an offense is a deviant behavior resulting from the interaction of psychological processes (conscious and subconscious) and social factors. Criminal behaviors may be preceded by minor deviations, influenced by frustration, traumas, or hidden motivations. Unlike the legal perspective, the psychological perspective analyzes the mental processes contributing to the commission of offenses. Offenses are classified as *mala in se* (inherently illegal or morally wrong, regardless of the specific legislation of a country or time period, e.g., homicide) and *mala prohibita* (illegal by law, without a universal moral or legal basis). Depending on their severity, offenses range from minor acts (e.g., theft) to extremely serious acts (e.g., homicide). **Crime**, as an extreme form of criminality, is defined as an “intentional offense directed against a person’s life” [23, p. 5], resulting in the death of that person. A *female offender* is the active subject of an offense, legally responsible for the committed act, which involves an illegal act performed consciously and with intent. She is evaluated based on the degree of guilt and the circumstances under which the act was committed, which influences the application of the penalty in accordance with criminal law principles. A *female criminal* falls within the category of those who commit offenses against life, acting with intent to cause the death of another person. The consequence of committing an offense is the application and execution of a penalty. As a sanction, incarceration refers to “for a fixed term, ranging from 15 days to 30 years, and carried out in facilities specifically designated for this purpose” [24, art. 60, alin.1].

Various theoretical perspectives on female criminality and crime are reviewed, ranging from attempts to explain it through biological or psychological factors to exploring the influence of social and cultural contexts on the manifestation of such behavior. Although there is no single explanatory theory for female criminality, the predominant psychological theories have highlighted the role of disharmonious personality, influenced by factors such as moral degradation, frustration, psychological conflicts, social learning, and aggression.

The diversity of personality traits among offenders is presented, highlighting the varied psychological profiles underlying the commission of different types of offenders, from less violent behaviors such as vagrancy and theft to more serious crimes like homicide and sexual assault. Typologies of female criminals identified in the specialized literature are presented. The modern perspective on personality is introduced, emphasizing its flexibility and capacity for change, even in adulthood. Within this section, recent studies are also presented, demonstrating how therapeutic interventions can contribute to modifying personality traits and, consequently, reducing the risk of recidivism among women who commit offenses.

The study continues by presenting specific factors associated with female criminality, emphasizing the significant impact of abuse on involvement in delinquent activities and highlighting the higher prevalence of personality disorders in prisons housing women.

Chapter II, titled *The descriptive Research on the Personality Profile of Incarcerated Female Criminals*, presents the results of experimental research on the personality traits and clinical profile regarding personality disorders of incarcerated female criminals, as well as the intensity of abuse experiences, compared to incarcerated women who committed economic crimes, theft, and drug trafficking.

The purpose of the research was to identify the specific personality traits of incarcerated female criminals, establishing their clinical profile, and explore their history of abuse.

To achieve the proposed purpose, the following research objectives were established:

1. Characterizing the research sample in terms of socio-demographic dimensions
2. Determining the constellation of common traits among incarcerated women who committed homicide
3. Investigating the clinical profile of incarcerated female criminals
4. Examining the presence of abuse in the life history of incarcerated women who committed homicide.

General Hypothesis of the Exploratory Experiment. There is a difference between incarcerated female offenders who committed violent crimes and those who committed non-violent offenses regarding their personality profile, the presence and higher intensity of personality disorders, and a life history marked by experiences of abuse.

Based on this hypothesis, the following operational hypotheses were formulated:

Hypothesis 1: We assume that incarcerated female offenders who committed homicide have a distinct personality profile compared to incarcerated women who committed non-violent offenses.

Hypothesis 2: We assume that incarcerated female offenders who committed homicide exhibit a more pronounced clinical profile regarding personality disorders compared to incarcerated women who committed non-violent offenses.

Hypothesis 3: We assume that incarcerated female offenders who committed homicide have a more pronounced history of abuse compared to incarcerated women who committed non-violent offenses.

The exploratory experimental research was conducted throughout 2021 in a prison in Romania housing female inmates.

The research sample consisted of 200 incarcerated women from all custodial regimes in a women's prison in Romania. They were divided into four numerically equal groups based on the type of offense committed: homicide, theft, drug trafficking, and economic crimes (tax evasion). This sample structure aimed to ensure the homogeneity of the study group regarding the analyzed offense categories and allowed for a detailed analysis of the specific characteristics associated with each type of offense, contributing to a nuanced understanding of the participants' profile and the criminal context, in line with the research objectives. To characterize the research sample in terms of socio-demographic dimension, data from the

PMSweb application and information from the individual files of incarcerated individuals were used. The average age of the participants is 41.26 years (minimum-19 years; maximum-81 years). Table 2.1 presents the distribution of socio-demographic characteristics for the entire sample:

Table 2.1 Socio-demographic dimensions of the Studied Sample

Dimension	N	%
PLACE OF ORIGIN		
Urban	132	66
Rural	68	34
EDUCATIONAL LEVEL		
Illiterate	15	7,5
Primary education	28	14
Middle school	67	33,5
10 th grade	22	11
High school	36	18
Higher education	32	16
MARITAL STATUS		
Single	42	21
Married	76	38
Widowed	12	6
Cohabiting	49	24,5
Divorced	21	10,5
PROFESSIONAL QUALIFICATION		
Unqualified	148	74
Qualified	54	26
OCCUPATION AT THE TIME OF ARREST		
Unemployed	165	82,5
Employed	29	14,5
Retired	6	3

Instruments Used: Zuckerman-Kuhlman Personality Questionnaire (ZKPQ); Five-Factor Nonverbal Personality Questionnaire (FFNPQ); Freiburg Personality Inventory Form G (FPI G); Structured Clinical Interview for DSM Disorders II (SCID II); Scale for Detecting Abuse and Trauma.

Results of the Zuckerman-Kuhlman Personality Questionnaire (ZKPQ): According to the results presented in *Figure 2.1*, different average scores were recorded for each scale of the ZKPQ test across the offense types.

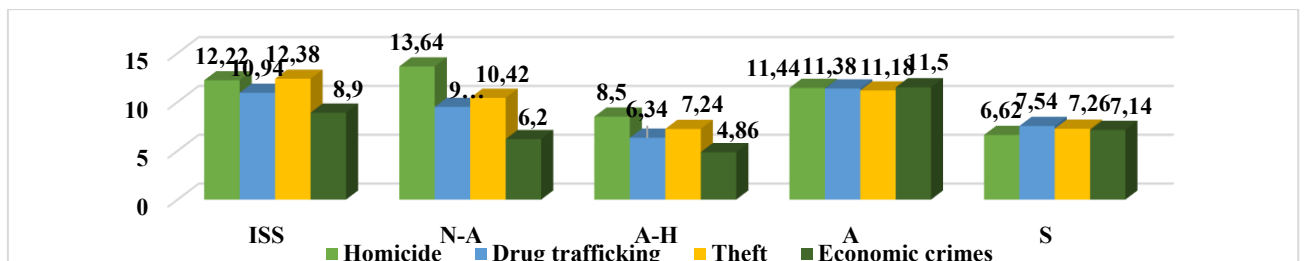


Fig. 2.1 Average values of personality traits, ZKPQ

On the *Impulsive Sensation Seeking (ISS)* scale, women who committed homicide (M=12.22) and theft (M=12.38) scored higher than those involved in drug trafficking (M=10.94) and economic crimes

($M=8.90$). The Kruskal-Wallis test ($p<0.001$) and pairwise comparisons confirm significant differences particularly between *Economic Crime* vs ($p<0.001$), *Economic Crime* vs. *Drug Trafficking* ($p=0.038$), and *Economic Crime* vs. *Theft* ($p<0.001$). These results suggest that homicide, an extremely violent act, may result from an impulsive reaction to a specific stimulus or conflict, especially in the context of intense emotional states. Additionally, women who commit homicide may be less concerned with the impulsive sensation-seeking trait.

On the **Neuroticism-Anxiety (N-A)** scale, the homicide group had the highest score ($M=13.64$), followed by the theft group ($M=10.42$), drug trafficking ($M=9.50$), and economic crimes ($M=6.20$). The Kruskal-Wallis test ($p<0.001$) and pairwise comparisons results show significant differences between the groups: *Economic Crime* vs. *Theft* ($p=0.001$), *Economic Crime* vs. *Homicide* ($p<0.001$), *Drug Trafficking* vs. *Homicide* ($p<0.001$), *Economic Crime* vs. *Drug Trafficking* ($p=0.013$), and *Theft* vs. *Homicide* ($p=0.005$). High levels of neuroticism and anxiety may contribute to impulsive or aggressive reactions in the face of emotional conflicts or stressful situations, which may explain the link between these traits and the commission of a serious offense such as homicide. Neuroticism and anxiety tendencies can amplify extremely strong emotional responses, which, in certain situations, may lead to acts of extreme violence.

For the **Aggressiveness-Hostility (A-H)** scale, the homicide group recorded the highest score ($M=8.50$), with significant differences compared to: *Economic Crime* vs. *Homicide* ($p<0.001$) and *Drug Trafficking* vs. *Homicide* ($p=0.005$). Extremely violent behavior, characteristic of a serious offense like homicide, often involves significant difficulties in managing anger, a tendency toward impulsive reactions, and a confrontational attitude toward others. Thus, the high level of Aggressiveness-Hostility may partially explain and justify the severity of the criminal act.

In contrast, the **Activity (A)** and **Sociability (S)** scales showed no significant differences between groups ($p>0.05$), suggesting similar levels across these scales. Therefore, even women who committed homicide exhibit a need for social interaction and constant activity, indicating that they can continue to interact with others at a similar level to other offender groups. These findings also support the idea that offenses, including homicide, are not necessarily linked to sociability or activity but rather to other personality traits.

Results of the Five-Factor Nonverbal Personality Questionnaire (FFNPQ) are presented in *Figure 2.2* below.

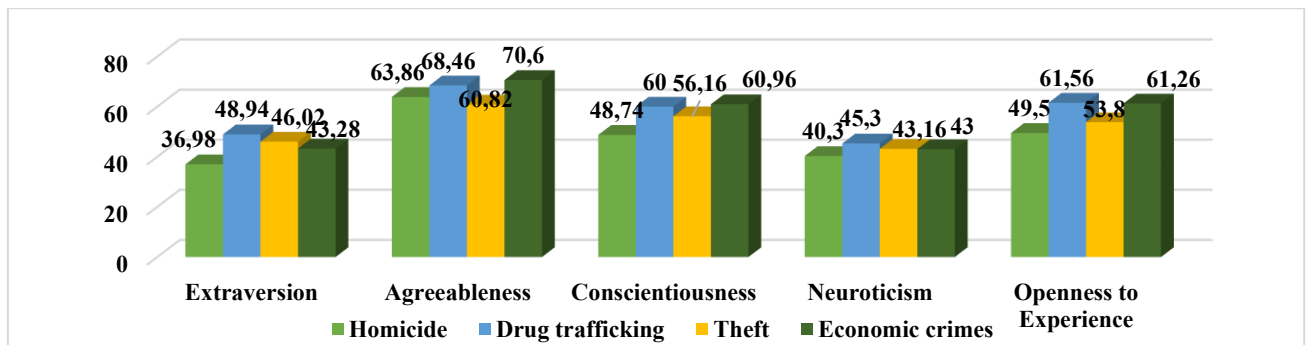


Fig. 2.2 Average values of personality traits, FFNPQ

The **Extraversion** scale shows an ascending order of average scores: homicide (M=36.98), economic crimes (M=43.28), theft (M=46.02) and drug trafficking (M=48.94). The Kruskal-Wallis test indicates significant differences ($p < 0.001$), confirmed by pairwise comparisons, with the following values: *Drug Trafficking vs. Homicide* ($p < 0.001$), *Theft vs. Homicide* ($p = 0.003$). Women who commit homicide tend to be less sociable and energetic in social interactions, possibly due to tendency toward social isolation and difficulties in forming and maintaining relationships. They may accumulate emotional tensions and frustrations that are not visibly expressed in typical social settings or through regular interactions. Accumulated emotional tensions escalate in situations of extreme violence, such as homicide.

The **Agreeableness** scale reveals a high level in the economic crimes group (M=70.60), followed by drug trafficking (M=68.46), homicide (M=63.86) and theft (M=60.82). The Kruskal-Wallis test shows significant differences in agreeableness levels between offense categories ($p < 0.001$), and pairwise comparisons identify the following differences: *Economic Crime vs. Theft* ($p = 0.001$), *Theft vs. Drug Trafficking* ($p = 0.019$), and *Economic Crime vs. Homicide* ($p = 0.035$). The score obtained by female offenders who committed homicide indicates their difficulties in adapting to social contexts and maintaining harmonious interpersonal relationships. Homicide, by definition, is a violent and highly destructive act for human relationships, suggesting a significant breakdown in the ability to empathize or interact positively with others.

The **Conscientiousness** scale indicates the highest level in the economic crimes group (M=60.96), followed by drug trafficking (M=60.00), theft (M=56.16), and homicide (M=48.74). The Kruskal-Wallis test shows significant differences ($p < 0.001$), and pairwise comparisons confirm differences between: *Drug Trafficking vs. Homicide* ($p = 0.002$) and *Economic Crime vs. Homicide* ($p = 0.001$). The fact that homicide is often the result of impulsive or emotionally escalated situations suggests a lack of self-control and self-discipline, characteristics associated with low conscientiousness. Additionally, women involved in homicides may exhibit lower social responsibility and a tendency to disregard moral norms and values.

The **Neuroticism** scale shows variations: drug trafficking (M= 45.30), theft (M=43.16), economic crimes (M=43.00), and homicide (M=40.30). The Kruskal-Wallis test indicates no significant differences ($p = 0.273$), confirmed by pairwise comparisons ($p > 0.05$). In the context of the research, it is possible that

the general level of stress and emotional tension is influenced by the common condition of incarceration, which may dilute differences between groups regarding neuroticism.

The *Openness to Experience* scale shows a high level in the drug trafficking group (M=61.26), theft (M=53.80), and homicide (M=49.50). The Kruskal-Wallis test indicates significant differences ($p=0.001$), confirmed by pairwise comparisons: *Theft vs. Drug Trafficking* ($p=0.003$), *Economic Crime vs. Homicide* ($p=0.001$), *Economic Crime vs. Theft* ($p=0.018$), and *Drug Trafficking vs. Homicide* ($p=0.003$). This suggests that women involved in homicide may be more reluctant or reserved in exploring and accepting varied and unusual experiences compared to the other analyzed groups.

Results of the Freiburg Personality Inventory Form G (FPI G) highlighted significant differences in the distribution and variability of scores obtained by the four analyzed offense groups, namely homicide, theft, drug trafficking, and economic crimes. These results are presented in *Figure 2.3*.

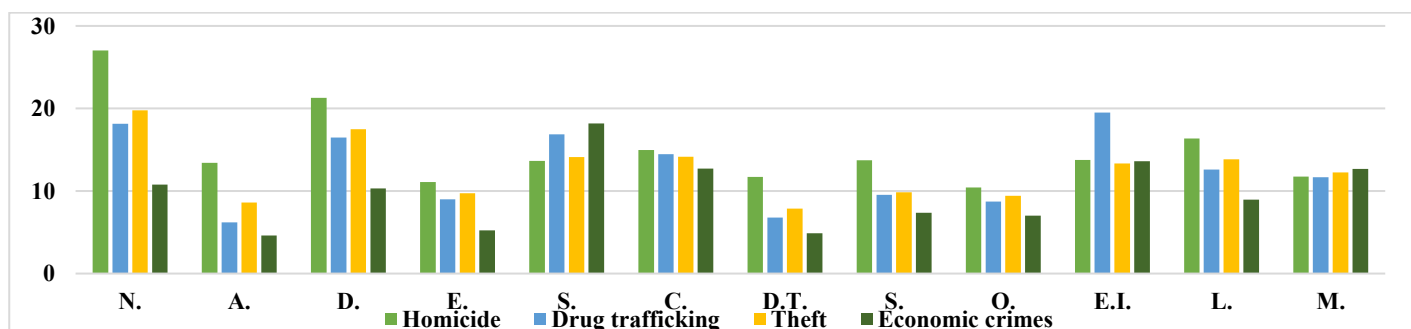


Fig. 2.3 Average values of personality traits, FPI-G

Nervousness (N.) scale: The homicide group obtained the highest average (M=27.04), followed by theft (M=19.78), drug trafficking (M=18.14), and economic crimes (M=10.78). The Kruskal-Wallis test shows significant differences ($p<0.001$), and the pairwise comparisons analysis confirms differences between: *Economic Crime vs. Drug Trafficking* ($p=0.005$), *Economic Crime vs. Theft* ($p<0.001$), *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), and *Theft vs. Homicide* ($p<0.001$). Women who commit homicides are often characterized by intense emotional tensions, such as repressed anger, anxiety, and long-term accumulated stress. They may experience strong physical symptoms, such as sleep disturbances, affective irritability, and constant restlessness, which favor impulsive and violent reactions, especially in moments of emotional crisis.

Aggressiveness (A.) scale: The highest level of aggressiveness was observed in the group of incarcerated women who committed homicide (M=13.40). This is followed by the theft (M=8.60), drug trafficking (M=6.20), and economic crimes (M=4.62). The Kruskal-Wallis test ($p<0.001$) indicates significant differences between groups, and the pairwise comparisons analysis highlights significant differences between the groups: *Economic Crime vs. Theft* ($p<0.001$), *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.007$). Women who commit homicides tend to discharge their affects through acts of aggression, without adequate capacity to control

their anger or frustration, leading to impulsive behaviors and, in some cases, even to homicide. High aggressiveness may be the result of strong emotional conflicts or the inability to rationally manage intense emotions.

Depressiveness (A.) scale: The homicide group expresses the highest level of depressiveness ($M=21.28$), followed by theft ($M=17.50$), drug trafficking ($M=16.48$), and economic crimes ($M=10.30$). The Kruskal-Wallis test indicates a varied distribution between groups ($p<0.001$). The pairwise comparisons analysis led to the identification of the following significant differences: *Economic Crime vs. Drug Trafficking* ($p<0.001$), *Economic Crime vs. Theft* ($p<0.001$), *Economic Crime vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.044$), and *Drug Trafficking vs. Homicide* ($p=0.005$). Women who commit homicides tend to live in a continuous state of emotional discomfort. It is possible that these women are affected by obsessive thoughts, excessive rumination on the committed offense, and a strong sense of guilt, which can fuel deep feelings of failure and self-deprecation.

Emotionality (E.) scale: The highest level of emotionality was observed in the homicide group ($M=11.68$), followed by drug trafficking ($M=9.00$) and theft ($M=9.72$), and economic crimes ($M=5.22$). The Kruskal-Wallis test ($p<0.001$) indicates that the distribution of scores is not equal between groups. The pairwise comparisons analysis indicates the following significant differences: *Economic Crime vs. Drug Trafficking* ($p<0.001$), *Economic Crime vs. Theft* ($p<0.001$), and *Economic Crime vs. Homicide* ($p<0.001$). Violent tendencies may be a manifestation of extreme emotions to which they failed to cope adequately. Female criminals may have a very low tolerance for frustration, becoming irritable and explosive even in the face of minor challenges. The elevated level of emotionality may make them more vulnerable to violent responses when confronted with stressful or conflicting situations.

Sociability (S.) scale: The economic crimes group shows the highest level ($M=18.18$), followed by drug trafficking ($M=16.88$), theft ($M=14.12$), and homicide ($M=13.66$). The Kruskal-Wallis test ($p<0.001$) shows differences, and the pairwise comparisons identify: *Drug Trafficking vs. Homicide* ($p=0.004$), *Economic Crime vs. Homicide* ($p<0.001$), *Theft vs. Drug Trafficking* ($p=0.027$), and *Economic Crime vs. Theft* ($p<0.001$). Women who commit homicides are more isolated and less capable of engaging in healthy relationships, which may contribute to violent manifestations. The lack of social skills or desire to engage in social relationships may contribute to the escalation of tensions and violent outbursts.

Calm (C.) scale: The obtained averages are relatively similar: homicide ($M=14.98$), drug trafficking ($M=14.46$), theft ($M=14.14$), and economic crimes ($M=12.72$). The Kruskal-Wallis test ($p=0.014$) shows differences, and the pairwise comparisons identify the following difference: *Economic Crime vs. Homicide* ($p=0.009$). The apparent calm of the homicide group may also be a defense mechanism, through which individuals mask their emotional tension or regulate their behavior to cope with the extreme situation. Thus, calm may actually be a form of dissociation or emotional detachment.

Dominance Tendency (D.T.) scale: The following averages were obtained: homicide (M=11.70), drug trafficking (M=6.80), theft (M=7.88), and economic crimes (M=4.88). The Kruskal-Wallis test ($p<0.001$) indicates differences, and the pairwise comparisons identify: *Economic Crime vs. Theft* ($p<0.001$), *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), and *Theft vs. Homicide* ($p=0.006$). The desire to impose one's own will and protect personal interests, sometimes in an extreme manner, can lead to destructive actions, such as killing. Women who commit homicides may exhibit suspicion and distrust toward others, and aggression becomes a form of self-protection and a way to control circumstances.

Shyness (S.) scale: The obtained averages are: homicide (M=13.74), theft (M=9.84), drug trafficking (M=9.54), and economic crimes (M=7.36). The Kruskal-Wallis test ($p<0.001$) indicates differences, and the pairwise comparisons identify differences between groups: *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), and *Theft vs. Homicide* ($p=0.001$). Shyness and social anxiety may lead incarcerated women in the homicide group to avoid conflicts and repress their emotions or frustrations. In some cases, this repression can result in outbursts of anger or extreme violence.

Openness (O.) scale: The results obtained are: homicide (M=10.44), theft (M=9.42), drug trafficking (M=8.72), and economic crimes (M=7.02). The Kruskal-Wallis test ($p<0.001$) indicates differences, and the pairwise comparisons identify differences between groups: *Economic Crime vs. Theft* ($p=0.002$), *Economic Crime vs. Homicide* ($p=0.001$). Women who commit homicides are often forced to confront the consequences of their actions directly, which may make them more aware of their mistakes and flaws. Those who committed economic crimes tend to maintain a positive self-image and rationalize their behaviors.

Extraversion-Introversion (E.I.) scale: The results obtained are: homicide (M=13.76), economic crimes (M=13.60), drug trafficking (M=13.50), and theft (M=13.32). The Kruskal-Wallis test ($p=0.972$) and pairwise comparisons ($p=1.000$ for all pairs) show no differences between groups. The relatively similar scores can be explained by the fact that many offenses involve situational factors and complex motives, with offenses potentially committed by both introverted and extraverted individuals, depending on their social context, and other variables such as economic motives, social pressures, or impulsivity in certain situations.

Lability (L.) scale: The obtained averages can be ordered in descending order as follows: homicide (M=16.36), theft (M=13.86), drug trafficking (M=12.60), and economic crimes (M=8.96). The Kruskal-Wallis test ($p<0.001$) confirms differences, and pairwise comparisons analysis indicates differences: *Economic Crime vs. Drug Trafficking* ($p=0.013$), *Economic Crime vs. Theft* ($p<0.001$), *Economic Crime vs. Homicide* ($p<0.001$), and *Drug Trafficking vs. Homicide* ($p=0.006$). The act of homicide may be

committed in the context of a critical situation where the individual faces extreme tensions. This situation may reflect an inability to maintain stable emotional control, leading to extreme and impulsive reactions.

Masculinity (M.) scale: The obtained average values are relatively similar: economic crimes (M=12.66), theft (M=12.26), homicide (M=11.76), and drug trafficking (M=11.68). The Kruskal-Wallis test results $p=0.362$, and pairwise comparisons ($p>0.05$) show no significant differences between groups. The fact that masculinity does not significantly differentiate between offense types may suggest that each type of offense can be committed by individuals with similar levels of masculinity.

The results highlight a distinct profile for incarcerated women who committed homicide compared to groups who committed non-violent offenses.

Results of the Structured Clinical Interview for DSM Disorders II (SCID II). Operational hypothesis: We assume that incarcerated female offenders who committed homicide exhibit a more pronounced profile regarding personality disorders compared to incarcerated women who committed non-violent offenses. *Figure 2.4* summarizes the results obtained.

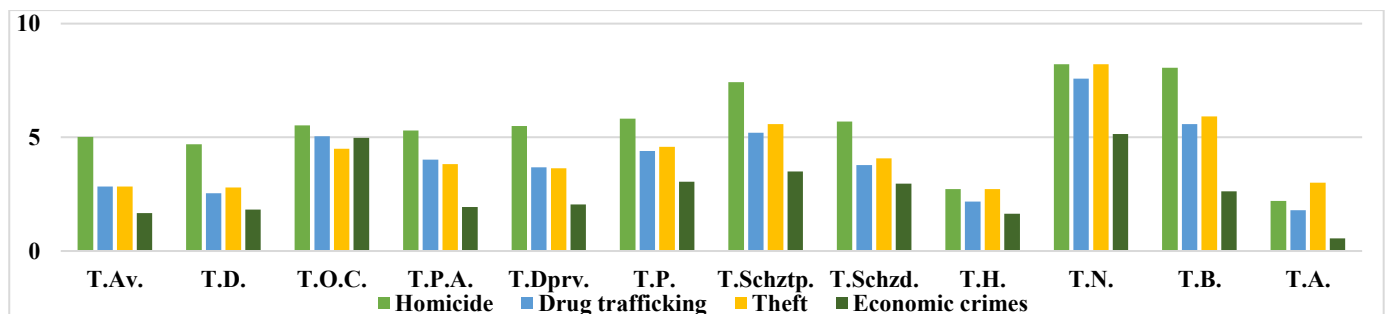


Fig. 2.4 Average values of SCID-II scales

The homicide group obtained the highest averages for most of the assessed personality disorders, namely: T.Av. (M=5.02); T.D. (M=4.70); T.P.A. (M=5.30); T. Dprv. (M=5.50); T.P. (M=5.82); T. Schztp. (M=7.42); T. Schzd. (M=5.70), and T.B. (M=8.06). For T.A. and T.H., the homicide group scored higher than drug trafficking and economic crimes but lower than the theft group, with M=2.20 (T.A.) and M=2.26 (T.H.). For T.N. (M=7.50), the homicide group ranks third, after women who convicted for theft and drug trafficking. The average scores for T.O.C. appear relatively consistent across all offense types, with values around 5: homicide (M=5.52), drug trafficking (M=5.04), economic crimes (M=4.98), and theft (M=4.94). The Kruskal-Wallis test yielded $p<0.001$ for the following disorders: T.Av., T.D., T.P.A., T. Dprv., T.P., T. Schztp., T. Schzd., T.N., T.B., and T.A., and $p=0.006$ for T.H.. Pairwise comparisons indicate the following differences for the homicide group: **Avoidant (T.Av.), Dependent (T.D.), Schizoid (T. Schzd.):** *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), and *Theft vs. Homicide* ($p<0.001$); **Passive-Aggressive (T.P.A.):** *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p=0.015$), and *Theft vs. Homicide* ($p=0.004$); **Depressive (T. Dprv.):** *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.001$); **Paranoid**

(T.P.): *Economic Crime vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.010$), and *Drug Trafficking vs. Homicide* ($p=0.003$); **Schizotypal (T. Schztp.):** *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), and *Theft vs. Homicide* ($p=0.005$); **Narcissistic (T.N.):** *Economic Crime vs. Homicide* ($p=0.004$); **Borderline (T.B.):** *Drug Trafficking vs. Homicide* ($p=0.002$), *Theft vs. Homicide* ($p=0.026$), and *Economic Crime vs. Homicide* ($p<0.001$); **Antisocial (T.A.):** *Economic Crime vs. Homicide* ($p<0.001$).

For T.H., pairwise comparisons highlighted only one significant difference: *Economic Crime vs. Theft* ($p=0.003$). The only disorder for which no significant differences were identified between offense groups is T.O.C., with $p=0.353$; supported by pairwise comparisons.

The results confirm the hypothesis that incarcerated female offenders who committed homicide exhibit a more pronounced clinical personality disorder profile compared to incarcerated women who committed non-violent offenses, namely theft, drug trafficking, and economic crimes.

Results of the application of the Scale for Detecting Abuse and Trauma. Operational hypothesis: We assume that incarcerated female offenders who committed homicide exhibit a more pronounced history of abuse compared to incarcerated women who committed non-violent offenses.

As shown in *Figure 2.5*, the homicide group has the highest averages for all three types of abuse (physical, sexual, neglect).

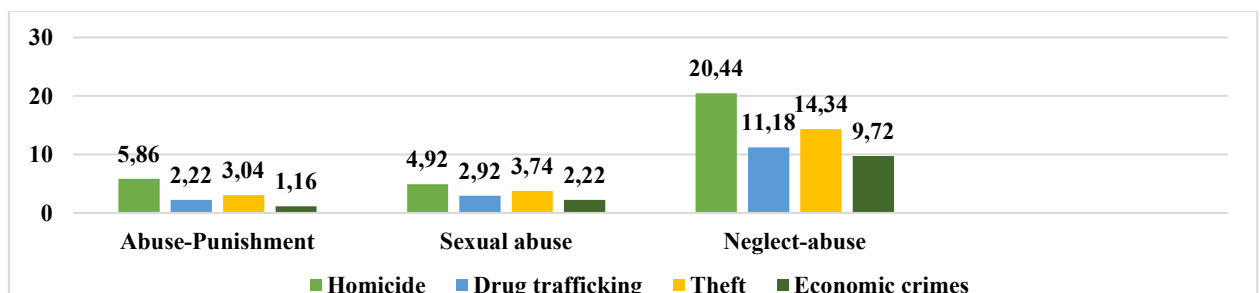


Fig. 2.5 Average values of the Scale for Detecting Abuse and Trauma

The Kruskal-Wallis test indicates significant differences for all three forms of abuse, with $p<0.001$; pairwise comparisons confirm differences between the homicide group and all other analyzed offense types: for the **Physical Abuse-Punishment** scale: *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p<0.001$); for the **Sexual Abuse** scale: *Economic Crime vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.033$), and *Drug Trafficking vs. Homicide* ($p<0.001$), and for the **Neglect-Abuse** scale: *Economic Crime vs. Homicide* ($p<0.001$), *Drug Trafficking vs. Homicide* ($p<0.001$), *Theft vs. Homicide* ($p=0.033$).

These results support the hypothesis that incarcerated female offenders who committed homicide have a life marked by abusive experiences compared to those who committed economic crimes, drug trafficking, and theft. Abuse experiences have a profound and complex impact on personality and

behavioral development. In this context, the history of female criminals may be a central explanation for the characteristics observed in their profile. These traumas leave deep marks on personality, generating behaviors and traits that reflect both responses to trauma and coping mechanisms to deal with suffering.

Chapter III, Optimization of Personality Traits in Incarcerated Female Criminals, details the psychological principles and theories underlying the development of the psychological intervention program. We consider that intervention programs for incarcerated female criminals must be gender-specific and address the complex needs of this group, as revealed by the exploratory experiment, to maximize intervention effectiveness. The program is based on recent research indicating the malleability of personality traits in adults through therapeutic interventions, challenging the traditional view of their stability. Meta-analyses show that therapies focused on interaction and direct psychological support produce rapid and lasting changes in personality traits. We propose an innovative experiential-humanistic program that relies on the active and direct involvement of the individual in the therapeutic process, facilitating awareness and expression of emotions and inner experiences through concrete experiences.

Formative Experiment Hypothesis: Participation in the psychological intervention program will have a positive impact on the personality traits of incarcerated female criminals.

Purpose of the Psychological Intervention Program: to optimize the personality traits of incarcerated female criminals by reducing impulsivity and aggressiveness, managing anxiety, improving emotional stability, increasing sociability, promoting healthy interpersonal relationships, and activating inner psychological resources.

Objectives of the Formative Experiment:

1. Development and implementation of the psychological intervention program to optimize personality traits in incarcerated female criminals
2. Evaluation of personality traits in the test/retest phase
3. Determination of the intervention's impact on the personality traits of incarcerated female criminals
4. Analysis of differences between the experimental group and the control group
5. Interpretation of results and formulation of conclusions regarding the program's effectiveness.

The sample consisted of 24 incarcerated women definitively convicted for homicide. Participants were divided into equal groups: the experimental group and the control group. The homogeneity of the groups was validated using the Mann-Whitney test.

The therapeutic intervention was conducted over 21 sessions, with a bi-weekly frequency, each session lasting an average of 90-120 minutes, and completion of the program was credited.

Results: pre- and post-intervention evaluations highlighted significant changes in personality traits, confirming the program's effectiveness. The Mann-Whitney and Wilcoxon tests were used to compare

results between the experimental group (EG) and the control group (CG), and the effect size was calculated using Cohen's d.

Results of the Zuckerman-Kuhlman Personality Questionnaire (ZKPQ) in the retest phase are presented in *Table 3.1*.

Table 3.1 Wilcoxon Test Values, EG, Test/Retest, ZKPQ

	Impulsive sensation seeking Test/Retest	Neuroticism-Anxiety Test/Retest	Aggressiveness-Hostility Test/Retest	Activity Test/Retest	Sociability Test/Retest
Z	-1.188 ^b	-3.088 ^b	-2.986 ^b	-2.613 ^c	-0.905 ^c
Asymp. Sig.(2-tailed)	0.235	0.002	0.003	0.009	0.366

The Wilcoxon test, followed by Cohen's d effect size analysis, highlighted significant changes in three dimensions: a significant reduction in *Neuroticism-Anxiety* ($Z=-3.088^b$; $p=0.002$; $d=-0.630$), *Aggressiveness- Hostility* ($Z=-2.986^b$; $p=0.003$; $d=-0.609$), as well as a significant increase in *Activity* ($Z=-2.613^c$; $p=0.009$; $d=-0.533$). The CG showed no significant changes, indicating the stability of the assessed traits in the absence of therapeutic intervention.

Table 3.2 Mann Whitney U Test Values, EG/CG, ZKPQ, Retest

	Impulsive sensation seeking	Neuroticism-Anxiety	Aggressiveness-Hostility	Activity	Sociability
Mann-Whitney U	40.000	123.000	108.500	33.000	63.000
Exact Sig. (2-sided test)	0.068	0.002	0.033	0.024	0.630

The Mann Whitney U test (*Table 3.2*) shows significant differences between the EG and CG in the retest phase for the factors: *Neuroticism-Anxiety* ($U=123.000$; $p=0.002$), *Aggressiveness- Hostility* ($U=108.500$; $p=0.033$) and *Activity* ($U=33.000$; $p=0.024$).

Results of the Five-Factor Nonverbal Personality Questionnaire (FFNPQ) are presented in *Table 3.3*.

Table 3.3 Wilcoxon Test, EG, Test/Retest, FFNPQ

	Neuroticism Test/Retest	Extraversion Test/Retest	Openness to experience Test/Retest	Agreeableness Test/Retest	Conscientiousness Test/Retest
Z	-3.061 ^c	-3.063 ^b	-1.497 ^b	-3.061 ^b	-0.938 ^c
Asymp. Sig.(2-tailed)	0.002	0.002	0.134	0.002	0.348

The analysis of the Wilcoxon test data and the Cohen's d effect size results shows that participation in the psychological intervention program led to significant changes in the following scales: a significant reduction in *Neuroticism* ($Z=-3.061^c$; $p=0.002$; $d=-0.625$), and significant increases in *Extraversion* ($Z=-3.063^b$; $p=0.002$; $d=-0.625$), and *Agreeableness* ($Z=-3.061^b$; $p=0.002$; $d=-0.625$).

In contrast, the CG remained stable without notable changes. This indicates that the psychological intervention program successfully addressed aspects related to anxiety and emotional reactivity, adaptability in interactions with others, openness to opportunities, and increased capacity to understand and emotionally connect with others, positively impacting the quality of interpersonal relationships and the social functioning of the participants.

The Mann-Whitney test highlighted significant differences between EG and CG for *Neuroticism* ($U=106.500$; $p=0.045$), *Extraversion* ($U=37.500$; $p=0.045$) and *Agreeableness* ($U=32.500$; $p=0.020$).

Results of the Freiburg Personality Inventory Form G (FPI G). In the retest phase, the Mann-Whitney test revealed significant differences between EG and CG for *Nervousness* ($U=107.500$; $p=0.039$), *Aggressiveness* ($U=107.500$; $p=0.039$), *Depressiveness* ($U=106.500$; $p=0.045$), *Emotionality* ($U=107.000$; $p=0.045$), *Calm* ($U=33.000$; $p=0.024$), *Dominance tendency* ($U=107.000$; $p=0.045$), *Shyness* ($U=108.000$; $p=0.039$), *Extraversion-Introversion* ($U=34.500$; $p=0.028$) and *Emotional Lability* ($U=108.500$; $p=0.033$).

The Wilcoxon test (Table 3.4), followed by Cohen's d effect size analysis, confirmed significant changes in EG for the same dimensions, with reductions in *Nervousness* ($Z=-3.095^b$; $p=0.002$; $d=-0.632$), *Aggressiveness* ($Z=-3.066^b$; $p=0.002$; $d=-0.626$), *Depressiveness* ($Z=-3.070^b$; $p=0.002$; $d=-0.627$), *Emotionality* ($Z=-3.068^b$; $p=0.002$; $d=-0.626$), *Dominance tendency* ($Z=-3.065^b$; $p=0.002$; $d=-0.626$) and *Emotional Lability* ($Z=-3.075^b$; $p=0.002$; $d=-0.628$), as well as increases in *Calm* ($Z=-2.859^c$; $p=0.004$; $d=-0.583$) and *Extraversion-Introversion* ($Z=-2.401^c$; $p=0.016$; $d=-0.490$).

Table 3.4 Wilcoxon Test, EG, Test/Retest, FPI-G

FPI	Z	Asymp. Sig.(2-tailed)
Nervousness	-3.095 ^b	0.002
Aggressiveness	-3.066 ^b	0.002
Depressiveness	-3.070 ^b	0.002
Emotionality	-3.068 ^b	0.002
Sociability	-1.667 ^c	0.096
Calm	-2.859 ^c	0.004
Dominance tendency	-3.065 ^b	0.002
Shyness	-3.077 ^b	0.002
Openness	-0.868 ^b	0.385
Extraversion-Introversion	-2.401 ^c	0.016
Emotional Lability	-3.075 ^b	0.002
Masculinity	-1.734 ^b	0.083

Participation in the psychological intervention program significantly contributed to optimizing personality traits and improving the psychosocial functioning of participants by fostering emotional and behavioral self-control, better understanding and management of their emotions and behaviors, and increasing their ability to adapt to the social environment.

The results obtained are supported by specialized literature, which highlights that, although personality traits have long been considered stable, recent research has demonstrated that they can undergo significant changes throughout life. Therapeutic interventions have been associated with positive changes

in personality traits such as emotional stability, agreeableness, and conscientiousness. Thus, the results align with studies supporting the idea that personality traits are more flexible than previously thought, and psychotherapeutic interventions can generate significant and sustainable changes, even in adulthood. These findings underscore the importance of therapeutic programs in optimizing personality traits and improving the psychosocial functioning of individuals, particularly incarcerated women.

Results of the Structured Clinical Interview for DSM Disorders II (SCID II). The Mann Whitney test for the results obtained in the initial testing phase showed no significant differences between CG and EG for any personality disorder, confirming initial homogeneity. In the retest phase, the same test showed a lack of significant differences between EG and CG (U between 38.000 and 76.000), suggesting a minimal impact of the therapeutic intervention on personality disorders.

Table 3.5 Wilcoxon Test Values, EG, Test/Retest, SCID-II

SCID-II	Z	Asymptotic Sig. (2-sided test)
Avoidant	-1.414 ^b	0.157
Dependent	-1.823 ^b	0.068
Obsessive-compulsive	-0.423 ^b	0.672
Passive-aggressive	-1.589 ^b	0.112
Depressive	-1.561 ^b	0.119
Paranoid	-0.241 ^b	0.809
Schizotypal	-0.060 ^c	0.952
Schizoid	-0.213 ^b	0.832
Histrionic	-0.812 ^b	0.417
Narcissistic	-0.310 ^b	0.757
Borderline	-0.549 ^b	0.583
Antisocial	0.000 ^d	1.000

The Wilcoxon test (*Table 3.5*), for EG indicates the absence of significant changes between test and retest (p between 0.068 and 1.000), with slight but non-significant decreases for all disorders: *Avoidant* (M1=4.75; M2=4.42; Z=-1.414^b; p=0.157), *Dependent* (M1=4.75; M2=4.17; Z=-1.823^b; p=0.068), *Obsessive-compulsive* (M1=6.58; M2=6.33; Z=-0.423^b; p=0.672), *Passive-aggressive* (M1=5.83; M2=5.17; Z=-1.589^b; p=0.112), *Depressive* (M1=6.33; M2=5.83; Z=-1.561^b; p=0.119), *Paranoid* (M1=6.08; M2=6.00; Z=-0.241^b; p=0.809), *Schizotypal* (M1=7.00; M2=6.91; Z=-0.060^c; p=0.952), *Schizoid* (M1=4.58; M2=4.5; Z=-0.213^b; p=0.832), *Histrionic* (M1=3.00; M2=2.75; Z=-0.812^b; p=0.417), *Narcissistic* (M1=9.25; M2=8.58; Z=-0.310^b; p=0.757), *Borderline* (M1=10.33; M2=10.08; Z=-0.549^b; p=0.583) and *Antisocial* (M1=3.17; M2=3.17; Z=0.000^d; p=1.000).

Cohen's d revealed *small effects* for: *avoidant* (d=-0.289), *dependent* (d=-0.372), *passive-aggressive* (d=-0.324) and *depressive* (d=-0.319) disorders, very small effects for *obsessive-compulsive* (d=-0.086), *paranoid* (d=-0.049), *schizoid* (d=-0.043), *histrionic* (d=-0.166), *narcissistic* (d=-0.063) and *borderline* (d=-0.112) disorders, and negligible effects for *schizotypal* (d=-0.012) and *antisocial* (d=0) disorders, indicating an almost non-existent impact of the intervention on these personality disorders.

The absence of significant changes in this case is consistent with the objectives and focus of the psychological intervention program. It was not designed or implemented with the specific aim of treating or alleviating symptoms of personality disorders but rather focused on optimizing the personality traits of incarcerated female criminals, closely linked to improving their emotional and psychosocial functioning. Therefore, the lack of significant changes in symptoms associated with personality disorders does not contradict the proposed objectives.

GENERAL CONCLUSIONS AND RECOMMENDATIONS

The general conclusions and recommendations reflect the results obtained from the exploratory and formative research on incarcerated female criminals. Through the obtained results, this research has addressed a significant scientific problem in the field, namely the identification of personality traits, specific personality disorders, and abuse experiences in the life of this group of inmates. Additionally, the research contributes through the development and implementation of a psychological intervention program aimed at optimizing their personality traits.

The analysis of theoretical and experimental results allows us to formulate the following conclusions:

1. Female criminality is a complex phenomenon determined by the interaction of personality traits, gender-specific risk factors, and socio-cultural influences. Personality plays a crucial role in the predisposition to criminal behavior. Traits such as aggression, impulsivity, affective indifference, and emotional lability are frequently associated with criminal behaviors. The personality profile of incarcerated female criminals is distinct and complex, marked by a high incidence of traits associated with personality disorders and elevated levels of abuse. Recent research challenges the traditional view that considers personality traits as rigid, demonstrating their malleability through targeted psychological interventions. These findings underscore the need to develop and implement therapeutic interventions tailored to the specific needs of incarcerated women who committed homicide (Chapter 1) [15, 16, 17, 18, 19, 20, 21].

2. The following personality traits were identified for the group of incarcerated female criminals: Neuroticism-Anxiety, Aggressiveness-Hostility, Emotional Lability, Shyness, Dominance Tendency, and Depressiveness. Less pronounced personality traits in incarcerated female criminals include Extraversion, Agreeableness, Conscientiousness, and Openness to Experience (Chapter 2) [16, 18, 20].

3. The evaluation highlighted the presence of the following personality disorders in incarcerated female criminals: Avoidant, Dependent, Passive-Aggressive, Depressive, Paranoid, Schizotypal, Schizoid and Borderline (Chapter 2) [15, 16, 18, 19, 20].

4. A history marked by experiences of sexual, physical, and neglect-related abuse was identified. Women convicted of homicide have a significantly more pronounced history of abuse - physical, sexual,

and neglect – compared to women who committed non-violent offenses such as economic crimes, theft, and drug trafficking (Chapter 2) [15, 16, 17].

5. The results of the formative and control experiment demonstrate that an experiential-humanistic psychological intervention leads to the optimization of personality traits specific to incarcerated female criminals, with beneficial effects on their overall level of functioning. The intervention's objectives included optimizing self-connection, improving relational capacities, enhancing emotional awareness, developing emotional self-control and regulation, reducing emotional lability and neurotic tendencies, and activating and strengthening personal resources, with direct effects on overall psychosocial functioning. The data from the application of the psychological intervention program demonstrate its effectiveness in generating positive changes in the personality traits of incarcerated female criminals.

Recommendation for Implementation

1. The evaluation procedure for incarcerated female criminals and the psychological intervention program can be implemented within the psychosocial assistance services of detention facilities housing women under the National Prison of Administration.

2. The theoretical and practical information included in this work can serve as the foundation for a best practices guide for psychologists in the prison administration system working with incarcerated female criminals.

3. The materials in this work can be used in teaching university courses, master's programs, or ongoing professional training and specialization for psychologists, and social workers engaged in the studied field.

Suggestions for Future Research:

This work aims to pave the way for new research in the field of psychological intervention for incarcerated women, such as:

- In-depth investigation of incarcerated female offenders, their evaluation, and psychotherapy
- Extending the study to other groups of incarcerated women and developing intervention programs tailored to their specific characteristics.
- In-depth study of how past abuse experiences influence the criminal behavior and personality disorder manifestations of incarcerated women.
- Thorough investigation of the consequences of abuse on the personality profile of incarcerated female criminals.

BIBLIOGRAPHY

1. ACOCA, L. *Investing in girls: A 21st century strategy*. In: Journal of the office of juvenile justice and delinquency prevention, 1999, vol. VI, no.1, p. 3-13 (Cited March 16, 2024). ISSN: 1524-6647. Available: <https://www.ojp.gov/pdffiles1/ojjdp/178254.pdf>
2. ADLER, F., MUELLER, G.O.W., LAUFER, W.S. *Criminology. Seventh edition*. New York: Mc Graw-Hill Education, 2010, p. 21-78, ISBN 978-0-07-340158-4

3. ADMINISTRAȚIA NAȚIONALĂ A PENITENCIARELOR. *Situație lunară deținuți*. (Cited February 27, 2025). Available: <https://anp.gov.ro/wp-content/uploads/2025/01/SITUATIA-LUNARA-decembrie-2024.pdf>
4. AMZA, T. *Criminologie teoretică*. București: Lumina Lex, 2000, p. 27-371, ISBN 973-9186-33-5
5. ANDREWS, D.A., BONTA, J. *The psychology of criminal conduct. Fifth edition*. New Providence: Anderson Publishing, 2010, 672 p. ISBN 978-1-4224-6329-1
6. ASHTON, M.C. *Individual differences and personality. Second edition*. Londra: Academic Press, 2013, p. 66-114, ISBN 978-0-12-416009-5
7. BARBERET, R. *Women, crime, and criminal justice. A global enquiry*. New York: Routledge Taylor&Francis Group, 2014, p. 15-28, ISBN 978-0-415-85635-5
8. BARLOW, H.D., DECKER, S.H. *Criminology and public policy. Putting theory to work*, Philadelphia: Temple University Press, 2010, 292 p. ISBN 978-1-4399-0007-9
9. BOGDAN, T. *Probleme de psihologie judiciară*. București: Ed. Științifică, 1973, p. 31-105
10. BROWN, S.E., ESBENSEN, F.A., GEIS, G. *Criminology: Explaining Crime and Its Context. Seventh Edition*. New Providence: LexisNexis Group, 2010, 528 p. ISBN 978-1-4224-6332-1
11. BROWN, S., SERIN, R., FORTH A., NUNES, K., BENNEL, C., POZZULO, J. *Psychology of criminal behavior. A Canadian perspective. Second edition*. Toronto: Pearson, 2016, 512 p. ISBN 978-0-13-298005-0
12. BULL, R. *et al. Criminal psychology. A beginner's guide*. Oxford: Oneworld Publications, 2006, p. 150-167, ISBN 978-1-85168-477-9
13. CANTER, D. *Criminal psychology. Topics in applied psychology*. Londra: Hodder Education, 2008, p. 1-53, ISBN 978 0 340 92892 9
14. CHESNEY-LIND, M., PASKO, L. *The female offender. Girls, women and crimes. Third edition*. Los Angeles: Sage Publications Inc., 2013, 224 p. ISBN 978-1-4129-9669-3
15. CHIȚOI, A.D. *Analiza relației dintre abuzul suferit în copilărie și tulburările de personalitate la femeile private de libertate*. In: Vector European, revista științifico-practică, 2024, no. 1, p. 173-178. ISSN 2345-1106 / ISSN e 2587-358X. Available: https://ibn.idsi.md/sites/default/files/imag_file/173-178_29.pdf
16. CHIȚOI, A.D. *Aspecte psihologice ale femeii private de libertate care a săvârșit infracțiuni contra vieții*. In: Probleme actuale ale științelor umanistice: Analele științifice ale doctoranzilor și competitorilor, Ed. 19, 2021, vol.19, Partea 2, p. 154-164. ISBN 978-9975-46-296-9. ISSN 1857-0267. Available: https://ibn.idsi.md/ro/vizualizare_articol/155920
17. CHIȚOI, A.D., (GROZA) VERDEȘ, A. *Impactul mediului insecurizant timpuriu asupra prevalenței tulburării antisociale la femeile private de libertate*. In: Competențe adaptative și dezadaptative, Ed. XVII, 2022, p. 150-159. ISBN 978-606-95470-0-7
18. CHIȚOI, A.D. *Personalitatea femeii infractor*. In: Preocupări contemporane ale criminologiei, dreptului și psihologiei în condiții de pandemie: dedicată împlinirii a 25 de ani a învățământului criminologic și 30 de ani de dezvoltare a Psihologiei Aplicate, 2020, p. 283-293. ISBN 978-9975-3314-2-5. Available: https://ibn.idsi.md/ro/vizualizare_articol/115400
19. CHIȚOI, A.D. *Prevalența și tipurile de tulburări de personalitate la femeile private de libertate*. In: Revista de Psihologie a Academiei Române, 2024, vol. 70, no. 1, p. 17-26. ISSN: 0034-8759 eISSN: 2344-4665. Available: https://revistadepsihologie.ipsihologie.ro/images/revista_de_psihologie/Revista-de-psihologie-1_2024.pdf
20. CHIȚOI, A.D. *Studiul profilului de personalitate al femeii agresor private de libertate*. In: Psihologie. Revista-științifico-practică, 2023, no. 2 (43), p. 111-120. ISSN 1857-2502 /ISSNe 2537-6276. Available: <https://key.upsc.md/wp-content/uploads/2023/12/PSPJ-V43-Iss2-2023-p111-120.pdf>
21. CHIȚOI, A.D. *The socio-demographic profile of incarcerated women in Romania*. In: International Journal of management and applied science (IJMAS), 2024, vol.10, no. 10, p.46-50. ISSN (p): 2394-7926 ISSN (e): 2394-7926. Available: https://ijmas.iraj.in/volume.php?volume_id=1041
22. CIOBANU, I. *Criminologie*. Chișinău - Universitatea de Stat din Chișinău, Catedra de Drept Penal și Criminologie, Ed. Ch. Cartdidact, 2007, Tipografia Reclama, p. 170 - 178, ISBN 978-9975-9912-1-6

23. CIOCLEI, V. *Criminologie. Suport de curs pentru învățământul la distanță*. București: Ed. Universității Titu Maiorescu, 62 p. ISBN 973-7963-63-6
24. CODUL PENAL AL ROMÂNIEI din 17 iulie 200: Legea nr. 286/2009. In: *Monitorul Oficial al României*, din 24 iulie 2009, no. 510 (Cited March 04, 2024). Available: <https://legislatie.just.ro/Public/DetaliiDocument/185905>
25. COVINGTON, S.S. *Women in prison: Approaches in the treatment of our most invisible population*. În: *Women&Therapy Journal*, 1998, vol. 21, no. 1, p. 141-155, ISSN 0270-3149 (Cited March 22, 2024). Available: <https://www.stephaniecovington.com/site/assets/files/1546/womeninprison.pdf>
26. DRAPALSKI, A.L. et al. *Gender differences in jail inmates` symptoms of mentall illness, treatment history, and treatment seeking*, În: *Criminal Behavior and Mental Health*, 2009, vol. 19, no. 3, p. 193-206 (Cited October 10, 2023). ISSN 0957-9664. Available: <https://pubmed.ncbi.nlm.nih.gov/19533597/>
27. FINKELHOR, D. *Childhood victimization. Violence, crime, and abuse in the life of young people*. Oxford: Oxford University Press, 2008, p. 49-55, ISBN 978-0-19-534285-7
28. IOVAN, M. *Studii de psihologie judiciară*. Arad: Vasile Goldiș University Press, 2000, p. 43-154, ISBN 973-9328-52-0
29. MALLICOAT, S.L. *Women, gender, and crime. Core concepts*. Los Angeles: Sage Publications Inc., 2019, p. 170-281, ISBN 978-1-5063-9927-0
30. MATTHEWS, G., DEARY, I.J., WHITEMAN, M.C. *Personality Traits. Third edition*. New York: Cambridge University Press, 2009, p. 1 - 150, ISBN 978-0-521-71622-2
31. MILLER, S.L. *Victims as offenders. The paradox of women`s violence in relationships*. New Jersey: Rutgers University Press, 2005, p. 44 - 45, ISBN 978-0-8135-3670-5
32. OGIEN, A. *Sociologia devianței*. Iași: Polirom, 2002, 262 p. ISBN 973-683-946-X
33. PALMER, S., HUMPHREY, J.A. *Deviant behavior. Patterns, sources, and control*. New York: Springer Science+Business Media, 1990, p. 10-44, ISBN 978-0-306-43285-9
34. PITARO, M. *Female inmates: overlooked and often forgotten*, *Psychology today*, 10 august 2023 (Cited June 07, 2024). Available: <https://www.psychologytoday.com/us/blog/the-crime-and-justice-doctor/202308/female-inmates-overlooked-and-often-forgotten?msocid=2364a085a4386f961fccb20ca0386980>
35. *Psihologie judiciară*. Coord. N. MITROFAN. București: Casa de editură și presă „Șansa” S.R.L., 1992, p. 1-68, ISBN 973-95793-6-1
36. VOINEA, M., DUMITRESCU, F. *Psiho-sociologie judiciară*. București: Sylvi, 1999, 238 p. ISBN 973-9175-96-1
37. WALKLATE, S. *Gender, crime and criminal justice. Second edition*. Devon: Willan Publishing, 2004, p 1-32, ISBN 1-84392-068-9
38. WARREN, J.I. et al. *Personality disorders and violence among female prison inmates*. In: *Journal of the American Academy of Psychiatry and the Law*, 2002, vol. 30, no. 4, p. 502-509 (Cited October 10, 2023). Available: <https://pubmed.ncbi.nlm.nih.gov/12539904/>
39. *Women`s mental health issues across the criminal justice system*. Coord. R.L. Gido, L. Dalley. New Jersey: Pearson Prentice Hall, 2009, 264 p. ISBN 978-0-13-243535-2

LIST OF AUTHOR'S PUBLICATIONS

a) Articles in Scientific Journals

1. CHIȚOI, A. D., *Studiul profilului de personalitate al femeii agresor privată de libertate*, In: *Psihologie, revista științifico-practică*, Chișinău, 2023, no. 2(43), p 111-120, ISSN P 1857-2502 /ISSNe 2537-6276. Available: <https://key.upsc.md/wp-content/uploads/2023/12/PSPJ-V43-Iss2-2023-p111-120.pdf>
2. CHIȚOI, A. D., *Analiza relației dintre abuzul suferit în copilărie și tulburările de personalitate la femeile private de libertate*, In: *Vector European. Revistă științifico-practică*, Chișinău, 2024, no.1, p 173-178, ISSN 2345-1106 / ISSNe 2587-358X. Available: https://ibn.idsi.md/sites/default/files/imag_file/173-178_29.pdf
3. CHIȚOI, A. D., *Prevalența și tipurile de tulburări de personalitate la femeile private de libertate*, In: *Revista de Psihologie a Academiei Române*, București, 2024, vol. 70, no. 1, p 17-26, ISSN: 0034-8759 eISSN: 2344-4665. Available:

https://revistadepsihologie.ipsihologie.ro/images/revista_de_psihologie/Revista-de-psihologie-1_2024.pdf

b) Articles in International and National Scientific Conferences

1. CHIȚOI, A. D., *Personalitatea femeii infractor*, In: Preocupări contemporane ale criminologiei, dreptului și psihologiei în condiții de pandemie: dedicată împlinirii a 25 de ani a învățământului criminologic și 30 de ani de dezvoltare a Psihologiei Aplicate, 17 octombrie 2020, Chișinău, Republica Moldova: Institutul de științe penale și criminologie aplicată, 2020, p. 283-293, ISBN 978-9975-3314-2-5. Available: https://ibn.idsi.md/ro/vizualizare_articol/115400
2. CHIȚOI, A. D., *Aspecte psihologice ale femeii private de libertate care a săvârșit infracțiuni contra vieții*, In: Analele științifice ale doctoranzilor și competitorilor: Probleme actuale ale științelor umanistice, Chișinău, 2021, vol. 19, partea 2, p 154-164. ISBN 978-9975-46-296-9, ISSN 1857-0267. Available: https://ibn.idsi.md/ro/vizualizare_articol/155920
3. VERDEȘ, A., CHIȚOI, A. D., *Impactul mediului insecurizant timpuriu asupra prevalenței tulburării antisociale la femeile private de libertate*, In: Lucrări Conferință A.P.A.R.-Ediția XVII: Competențe adaptative și dezadaptative, Brașov, 2022, p 150-159, ISBN 978-606-95470-0-7
4. CHIȚOI, A. D., *The socio-demographic profile of incarcerated women in Romania*, In: International Journal of Management and Applied Science (IJMAS), Dubai, 2024, vol.10, no.10, p 46-50, ISSN (p): 2394-7926, ISSN (e): 2394-7926. Available: https://ijmas.iraaj.in/volume.php?volume_id=1041

ADNOTARE

Anca-Daniela Chițoi. Profilul de personalitate al femeii criminale private de libertate.

Teză de doctor în psihologie. Chișinău, 2025

Structura tezei: teza cuprinde următoarele elemente constitutive: adnotări în 2 limbi, lista abrevierilor, lista tabelor, lista figurilor, introducere, 3 capitole, concluzii generale și recomandări, bibliografie care include 280 titluri, 6 anexe, 147 pagini text de bază, 19 figuri și 17 tabele. Rezultatele obținute sunt publicate în 7 lucrări științifice.

Cuvinte-cheie: infracțiune, crimă, femeia infractoare, privare de libertate, femeia criminală

Scopul cercetării: identificarea trăsăturilor de personalitate specifice femeilor criminale private de libertate urmată de elaborarea și implementarea unui program psihologic destinat optimizării acestor trăsături.

Obiectivele cercetării: studierea comparativă a profilului de personalitate al femeii criminale private de libertate în raport cu femeile private de libertate care au comis infracțiuni fără violență; evaluarea profilului clinic al femeii criminale private de libertate; determinarea prezenței abuzului în istoricul de viață al femeii criminale private de libertate; elaborarea și implementarea unui program psihologic destinat optimizării trăsăturilor de personalitate la femeile criminale private de libertate; determinarea eficienței programului de intervenție psihologică.

Problema științifică importantă soluționată în contextul cercetării realizate constă în identificarea trăsăturilor de personalitate specifice femeii criminale private de libertate, evaluarea profilului clinic și indicarea intensității tulburărilor de personalitate; determinarea prezenței experiențelor de abuz în istoricul de viață comparativ cu femeile care au comis infracțiuni fără violență; elaborarea unui program de intervenție psihologică adaptat particularităților de personalitate ale acestora și în evaluarea impactului pe care implementarea acestui program îl are asupra optimizării trăsăturilor de personalitate identificate.

Noutatea și originalitatea științifică. Pentru prima dată la nivel național, a fost studiat profilul de personalitate al femeii criminale, comparativ cu alte categorii de femei private de libertate care au săvârșit infracțiuni fără violență; a fost dezvoltată o metodologie de evaluare și identificare a trăsăturilor distinctive ale femeii criminale; a fost dezvoltat și aplicat un program de intervenție psihologică care nu se adresează populației generale (femei și bărbați), ci exclusiv femeilor care au comis omor, fiind adaptat specific particularităților de personalitate ale acestei categorii de deținute. Pentru prima dată la nivel național, au fost valorificate metode și tehnici specifice terapiei experiențial-umanistă. Programul de intervenție propus se bazează pe cercetări moderne care contestă viziunea tradițională a personalității rigide, demonstrând plasticitatea trăsăturilor la adulți.

Semnificația teoretică constă în evidențierea trăsăturilor de personalitate specifice profilului de personalitate al femeii criminale private de libertate.

Valoarea aplicativă a lucrării este dată de modalitatea de investigare a profilului de personalitate al femeii criminale private de libertate, de stabilirea trăsăturilor de personalitate comune femeilor care au săvârșit infracțiunea de omor în comparație cu femeile delicvente care au comis infracțiuni fără violență, dar și de elaborarea, aplicarea și investigarea eficienței programului de intervenție psihologică având ca obiectiv optimizarea trăsăturilor de personalitate identificate.

Implementarea rezultatelor științifice. Principalele elemente ale demersului de cercetare au fost expuse și supuse dezbaterii în cadrul unor conferințe naționale și internaționale, fiind valorificate prin publicarea în reviste de specialitate. Programul formativ a fost propus spre implementare de către personalul sectorului reintegrare socială cu atribuții în domeniul asistenței psihologice din unitățile aflate în subordinea Administrației Naționale a Penitenciarelor și care custodiază femei.

ANNOTATION

Anca-Daniela Chițoi. Personality Profile of Incarcerated Female Criminals. PhD Thesis in Psychology. Chișinău 2025

Thesis structure: annotations in 2 languages, list of abbreviations, list of tables, list of figures, introduction, 3 chapters, general conclusions and recommendations, bibliography containing 280 titles, 6 annexes, 147 pages of main text, 19 figures, and 17 tables. The obtained results are published in 7 scientific publications.

Keywords: offense, homicide, female offender, incarceration, female criminal

Research goal: identifying the specific personality traits of incarcerated female criminals, followed by the development and implementation of a psychological program aimed at optimizing these traits within this group of inmates.

Research objectives: comparison of the personality profile of incarcerated female criminals with that of women who have committed non-violent crimes; evaluation of the clinical profile of incarcerated female criminals; determination of the presence of abuse in the life history of incarcerated female criminals; development and implementation of a psychological program aimed at optimizing the personality traits of incarcerated female criminals; evaluation of the effectiveness of the psychological intervention program.

The significant scientific problem addressed in the conducted research consists of identifying the specific personality traits of incarcerated female criminals, evaluating their clinical profile and determining the intensity of personality disorders; assessing the presence of abuse experiences in their life history compared to women who committed non-violent crimes; developing a psychological intervention program tailored to their specific personality traits, and evaluating the impact of implementing this program on optimizing the identified personality traits.

Scientific novelty and originality. For the first time at the national level, the personality profile of female criminals was studied, compared to other categories of incarcerated women who have committed non-violent crimes; a methodology for evaluating and identifying the distinctive traits of incarcerated female criminals has been developed; a therapeutic-rehabilitative intervention program was developed and implemented, which does not address the general population (both women and men), but exclusively women who have committed murder, tailored specifically to the personality traits of this category of incarcerated women. For the first time at the national level, methods and techniques specific to the experiential-humanistic therapy were utilized. The proposed intervention program is based on modern research that challenges the traditional view of rigid personality, demonstrating the plasticity of traits in adults.

The theoretical significance lies in highlighting the personality traits specific to the personality profile of the incarcerated female criminals.

The applicative value of the paper is given by the method of investigating the personality profile of incarcerated female criminals, by identifying the common personality traits of women who have committed violent crimes compared to female offenders who have committed non-violent crimes, as well as by the development, implementation, and investigation of the effectiveness of the therapeutic-rehabilitative intervention program aimed at optimizing the identified personality traits.

Implementation of scientific results. The main findings of the research were presented and discussed at national and international conferences and disseminated through publications in specialized journals. The psychological intervention program was proposed for implementation within the National Administration of Penitentiaries.

CHIȚOI ANCA-DANIELA

**PERSONALITY PROFILE OF INCARCERATED FEMALE
CRIMINALS**

**511.02 DEVELOPMENTAL PSYCHOLOGY AND EDUCATIONAL
PSYCHOLOGY**

Summary of the Doctoral Dissertation in Psychology

Approved for printing:

Offset paper. Offset printing.

Printed sheets:

Paper format: 60x84 1/16

Print run.....copies....

Order no.....

Name and address of the institution where the summary was printed

