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Nursing diagnoses of cocaine/crack users with risk of suicide: A cross-sectional study

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ABSTRACT

People who use cocaine and crack have a high social and clinical vulnerability, often associated with mental disorders and suicide risk. Identifying nursing diagnoses helps improve care in these situations. This was a descriptive cross-sectional study carried out with 56 participants in therapeutic communities and a shelter for the homeless. Sociodemographic and clinical data were collected, and nursing diagnoses were screened according to the standardized NANDA-I® classification. The study found a predominance of young men, with low education, early onset of substance use, and high rates of alcohol dependence and depressive episodes. Forty-six nursing diagnoses were identified, with a focus on the domains of health promotion, stress coping, and activity/rest. The most frequent diagnoses were health behavior prone to risks, anxiety, self-neglect, and impaired parenting. The main defining characteristics and related factors included substance abuse, low self-efficacy, nervousness, and insufficient interest in physical activities. The findings highlight particular and multidimensional needs of high complexity, related to behavioral, emotional, and social aspects. The predominance of diagnoses related to risk behavior and emotional regulation reinforces the importance of nursing in health promotion, suicide prevention, and psychosocial rehabilitation. The identification of multiple nursing diagnoses shows the importance of systematic care for people who use cocaine and crack and who are at high risk of suicide, supporting clinical, psychosocial, and preventive interventions that are sensitive to the vulnerabilities identified.

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RESUMO

As pessoas que fazem uso de cocaína e crack apresentam elevada vulnerabilidade social e clínica, frequentemente associada a transtornos mentais e risco de suicídio. A identificação de diagnósticos de enfermagem contribui para qualificar o cuidado nesses contextos. Estudo descritivo - transversal, realizado com 56 participantes em comunidades terapêuticas e em centro de acolhimento para população em situação de rua. Foram coletados dados sociodemográficos, clínicos e rastreados os diagnósticos de enfermagem segundo classificação padronizada NANDA-I®. Observou-se nesta pesquisa a predominância de homens jovens, com baixa escolaridade, início precoce do uso de substâncias e alta frequência de dependência de álcool e episódios depressivos. Foram identificados quarenta e seis diagnósticos de enfermagem, com ênfase nos domínios promoção da saúde, enfrentamento ao estresse e atividade/repouso. Os diagnósticos mais frequentes foram comportamento de saúde propenso a riscos, ansiedade, autonegligência e paternidade ou maternidade prejudicadas. As principais características definidoras e fatores relacionados incluíram abuso de substâncias, baixa autoeficácia, nervosismo e interesse insuficiente em atividades físicas. Os achados evidenciam necessidades particulares e multidimensionais de alta complexidade, relacionadas a aspectos comportamentais, emocionais e sociais. O predomínio de diagnósticos voltados ao comportamento de risco e à regulação emocional reforça a importância da enfermagem na promoção da saúde, prevenção do suicídio e reabilitação psicossocial. A identificação de múltiplos diagnósticos de enfermagem demonstra a relevância do cuidado sistematizado para pessoas que usam cocaína e crack e que tem elevado risco de suicídio, subsidiando intervenções clínicas, psicossociais e preventivas sensíveis às vulnerabilidades identificadas.

Keywords:
Mental Health, Nursing Diagnosis, Therapeutic Community, Suicide Prevention, Health Vulnerability.

Palavras-Chave:
Saúde Mental, Diagnóstico de Enfermagem, Comunidade Terapêutica, Prevenção do Suicídio, Vulnerabilidade em Saúde.

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Introduction

The use of cocaine, which is a powerful stimulant, increases dopamine in the central nervous system, and its function is related to controlling the dopaminergic reward circuit and behavioral changes (Brida et al., 2025; Konova et al., 2023). According to the World Drug Report, in 2021, around 292 million people worldwide had used psychoactive substances at least once in their lives. Of these, approximately 22 million drug users have mental disorders related to regular use. The previous year saw 450,000 deaths, and the use and abuse of cocaine/crack has stood out for being more concentrated in North and South America, where 1.9% and 0.95% of the population aged 15 to 64, respectively, have already used these substances (United Nations Office on Drugs and Crime, 2018).

Mental disorders are highly prevalent among populations who use psychoactive substances and have raised concerns regarding the provision of healthcare services. In particular, individuals who use cocaine/crack are more likely to attempt suicide (Choi et al., 2023; Kelly et al., 2024; Suchting et al., 2019). Other disorders have also been associated with the persistent use of these substances, including sleep disturbances, increased craving, anxiety, and depression (Winhusen et al., 2019).

Cocaine/crack use poses significant challenges to nursing practice, particularly in mental health care, as the neurobiological and behavioral effects associated with these substances increase vulnerability to mental disorders and suicidal behavior (World Health Organization, 2016). In this context, nurses play a central role in the early identification of signs of psychological distress, suicidal ideation, and problematic patterns of substance use through the systematic application of the nursing process, care coordination, harm reduction, and the strengthening of suicide prevention strategies in specialized healthcare settings (Riedel et al., 2025).

The nursing process involves independent clinical judgment exercised by nurses to assess individual and population health through the identification of actual and potential health problems. It is a systematic method that enables nurses to provide effective patient care through problem-solving, critical thinking, and nursing care management. The purpose of the nursing process is to identify, diagnose, and treat actual and potential human responses to illness. This approach incorporates a standardized nursing language system that supports the scientific and efficient application of the nursing process to individuals (Open Resources for Nursing, 2021). The use of standardized nursing diagnoses makes it possible to identify actual and potential human responses associated with psychoactive substance use, such as ineffective coping, risk for self-directed violence, anxiety, sleep disturbances, and social isolation, thereby informing targeted clinical, educational, and psychosocial interventions (Dias et al., 2021).

From an epidemiological perspective, identifying nursing diagnoses at the population level makes it possible to recognize the most prevalent needs across different community

groups and guide appropriate nursing interventions for implementation and evaluation (Fernández-Gutiérrez et al., 2023). Screening for nursing diagnoses among individuals who use cocaine/crack represents an important strategy for improving the quality of care, strengthening evidence-based practice, and informing suicide prevention and mental health promotion initiatives across different levels of healthcare. Furthermore, this approach contributes to improving nurses' clinical decision-making and developing care policies and programs that are more responsive to the needs of this population (Fernández-Gutiérrez et al., 2023; Herdman et al., 2024; World Health Organization, 2016). Therefore, this study aimed to analyze nursing diagnoses according to the NANDA-I® classification among individuals who use cocaine and crack and are at risk of suicide, considering their sociodemographic, clinical, and psychosocial characteristics.

Materials and methods

Type of study and eligibility criteria

This was an observational, cross-sectional, exploratory-descriptive study with a quantitative approach, conducted in the municipality of Arapiraca, Alagoas, Brazil, between 2018 and 2019. The study was carried out in three residential support communities and a service center for individuals experiencing homelessness. These institutions provided assistance to socially vulnerable individuals with a history of psychoactive substance use. The study population consisted of individuals with a history of crack/cocaine use who were receiving care or support at the selected facilities. A nonprobability convenience sample was used, comprising participants who met the eligibility criteria and voluntarily agreed to participate in the study.

Individuals aged 18 years or older with a history of crack or cocaine use and preserved cognitive ability to understand the instructions provided by the researchers, answer the proposed questions, and provide reliable information for the data collection instruments were included. Participants were excluded if they had a previous diagnosis of psychosis or cocaine-induced psychosis, intellectual disabilities, or hearing, visual, or cognitive impairments that could interfere with their understanding of the questions, communication with the researchers, or proper completion of the data collection instruments.

Data collection

At the first meeting with the participants, a structured form was used to collect sociodemographic information. The researchers created it based on a literature review and sociodemographic indicators provided by the Brazilian Institute of Geography and Statistics (*Instituto Brasileiro de Geografia e Estatística* - IBGE). The form included variables related to the participants' individual, family, and socioeconomic characteristics, such as age,

education, marital status, self-declared color/race, area of residence, family composition, occupation, monthly family and per capita income, number of children, and religion.

In addition to sociodemographic characteristics, variables related to patterns of psychoactive substance use were investigated, including age of cocaine/crack use initiation, route of administration, forms of use, history of use, previous treatment for other psychoactive substances, and the motivation for treatment. Information on family history of cocaine/crack use was also collected, including the presence of family members who used the substances and their preferred substance among those with a history of use.

Organizing this information made it possible to describe the participants in terms of their sociodemographic, family, and substance use aspects, providing insights into the vulnerability context and the health needs of the population studied. This data also supported the analysis of health conditions and the process of identifying nursing care needs, considering that a systematic evaluation should integrate relevant clinical, behavioral, and social information for clinical reasoning and care planning.

For the assessment of psychiatric disorders, the Mini International Neuropsychiatric Interview (MINI Plus), version 5.0 (Sheehan et al., 2002), was used. It's a structured, short diagnostic interview developed for the systematic investigation of psychiatric disorders. The tool, widely used in research and clinical practice, is based on the diagnostic criteria of the Diagnostic and Statistical Manual of Mental Disorders, Fourth Edition, Text Revision (DSM-IV-TR) and the International Classification of Diseases (ICD-10), allowing the investigation of different psychiatric disorders.

The MINI Plus was also used to assess suicide risk, according to the instrument's specific module, with severity classified into three levels: low risk (1-5 points), moderate risk (6-9 points), and high risk (≥10 points). Conducting the interview made it possible to identify psychiatric conditions and indicators related to suicidal behavior, expanding the clinical and psychosocial characterization of the participants.

The data obtained through the MINI Plus were analyzed together with sociodemographic, clinical, and substance use pattern information. This integration of information supported nursing clinical reasoning, making it possible to identify defining characteristics, related factors, and risk factors relevant to the human responses presented by the participants. Based on the integrated analysis of these findings, nursing diagnoses were established.

Nursing diagnoses were systematically developed by integrating data obtained from sociodemographic characteristics, the history of psychoactive substance use, and the assessment of psychiatric disorders and suicide risk conducted using the MINI Plus. The diagnostic process was grounded in nursing clinical reasoning, involving the analysis, interpretation, and integration of indicators identified during participant assessments.

Initially, the collected data were analyzed individually to identify clinical, behavioral, and psychosocial indicators relevant to nursing practice. These indicators were then grouped according to similarities, complementary relationships, and associations to identify patterns and human responses that could reflect care needs. Based on these groupings, diagnostic hypotheses consistent with the identified findings were formulated.

During the diagnostic refinement stage, potential diagnoses with similar characteristics were examined, considering the presence, frequency, and specificity of the indicators identified in each participant. Possible diagnoses were then differentiated, and the diagnosis that best represented the identified human response was selected. For problem-focused diagnoses, defining characteristics and related factors were considered, whereas relevant risk factors were analyzed for risk diagnoses. Resources, strengths, and aspects amenable to nursing interventions were also considered when identified during the assessment.

Subsequently, diagnostic statements were formulated, and the diagnostic labels were cross-referenced with the taxonomy of NANDA International (formerly the North American Nursing Diagnosis Association), using the 2018–2020 edition (NANDA International, 2018). This procedure ensured standardized terminology and alignment between the assessment findings and the established nursing diagnoses, in accordance with the defining characteristics, related factors, and risk factors described in the classification.

All stages of the diagnostic process were conducted systematically and discussed among the researchers. Diagnostic hypotheses, their supporting indicators, and the relevance of the corresponding related or risk factors were jointly examined to reach a consensus regarding the appropriateness and specificity of the assigned diagnoses. Thus, the development of nursing diagnoses was not limited to the isolated identification of signs, symptoms, or clinical conditions but resulted from an integrated interpretation of sociodemographic, clinical, psychiatric, and substance use-related data, taking into account the participants' human responses and nursing care needs. The process of identifying and developing nursing diagnoses was described in accordance with the principles of transparency and completeness recommended by the Strengthening the Reporting of Observational Studies in Epidemiology (STROBE) guidelines, considering the study's cross-sectional design.

Statistical analysis and ethical aspects

The collected data were organized in Microsoft Excel® spreadsheets and analyzed using the Statistical Package for the Social Sciences (SPSS®), version 23. Initially, a descriptive statistical analysis was carried out, in which quantitative variables were expressed as mean and standard deviation, while categorical variables were presented in absolute and relative frequencies.

The data collected was initially organized, checked, and tabulated in Microsoft Excel® spreadsheets, and was later exported to the Statistical Package for the Social Sciences (SPSS®), version 23.0, for processing and statistical analysis. Initially, a descriptive statistical analysis of the investigated variables was carried out. Quantitative variables were presented using measures of central tendency and dispersion, using mean and standard deviation, while categorical variables were described using absolute and relative frequencies.

The descriptive analysis made it possible to characterize the studied population in terms of sociodemographic variables, patterns of psychoactive substance use, and psychiatric conditions investigated using the MINI Plus, as well as to describe the distribution of nursing diagnoses identified according to the NANDA-I taxonomy, 2018-2020 version. When applicable, the choice of measures of central tendency and dispersion took into account the distribution of quantitative data. The results were presented in a way that allowed for characterizing the participants' profiles and identifying the frequency of the main conditions and human responses related to nursing care needs.

The results were presented in tables, showing both absolute and relative frequencies and, for the quantitative variables, the respective measures of central tendency and dispersion. The study was approved by the Research Ethics Committee of the Federal University of Alagoas (*Universidade Federal de Alagoas* - UFAL), in accordance with the ethical principles established by Resolution No. 466/2012 of the National Health Council, under opinion No. 2,408,885 and Certificate of Presentation for Ethical Appreciation (CAAE) No. 67643417.3.0000.5013.

Results

A total of 56 individuals participated in the study, with a predominance of males (83.9%; n = 47). The average age of the participants was 31.7 years (SD = ±8.6). Regarding area of residence, 44 (78.6%) lived in urban areas in their own or rented homes, while 16 (28.6%) were homeless. As for marital status, most participants were single (78.6%; n = 44). Concerning sociodemographic characteristics, the majority had not completed elementary school (66.1%; n = 37), identified as evangelical (48.2%; n = 27), and had children (67.9%; n = 38).

Regarding the history of substance use, alcohol was the first drug used by 20 participants (34.0%). The average age of starting psychoactive substance use was 13.8 years (SD = ±4.0), while the start of cocaine/crack use occurred, on average, at 20.3 years (SD = ±6.9). The most commonly identified mental disorders were alcohol dependence (82.1%) and major depressive episode (78.6%) (Table 1).

Table 1

Sociodemographic characteristics of the sample under study.

Variable (n = 56)	n (%)
Age (average ± SD)	31.7 ± 8.6
Age when they used drugs (average ± SD)	13.8 ± 4
Age when they used cocaine/crack (average ± SD)	20.3 ± 6.9
Male	47 (83.9)
Homeless	16 (28.6)
Residential area	
Rural	12 (21.4)
Urban	44 (78.6)
Marital status	
Married	4 (7.1)
With a partner	3 (5.4)
Divorced	4 (7.1)
Single	44 (78.6)
Widow	1 (1.8)
Schooling	
Illiterate	3 (5.4)
Incomplete high school	5 (8.9)
High school graduate	3 (5.4)
Incomplete elementary education	37 (66.1)
Complete elementary education	6 (10.7)
Incomplete higher education	2 (3.6)
Religion	
Evangelical	27 (48.2)
Catholic	19 (33.9)
Spiritist	1 (1.8)
Candomblé	1 (1.8)
Does not have	8 (14.3)
Children	
Yes	38 (67.9)

No	18 (32.1)
First drug used	
Alcohol	20 (34)
Marihuana	18 (32.1)
Tobacco	7 (12.6)
Cocaine/crack	4 (7.2)
Other substances	7 (14.1)
Mental disorders	
Depressive episode	44 (78.6)
Alcohol dependence	46 (82.1)
Alcohol abuse	32 (57.1)
Generalized anxiety disorder	33 (58.9)
Antisocial personality disorder	32 (57.1)

Source: Prepared by the authors (2026).

A total of 46 nursing diagnoses were identified, spread across different domains of the NANDA-I taxonomy, as shown in Table 2. The most common diagnosis was Health-Seeking Behavior at Risk (n = 45), belonging to the Health Promotion domain. Among the most frequent nursing diagnoses were Anxiety (n = 32), Self-Neglect (n = 28), Impaired Parenting (n = 17), Risk for Deficient Fluid Volume (n = 16), Ineffective Impulse Control (n = 16), Acute Pain (n = 15), Risk for Personal Identity Disturbance (n = 9), and Risk for Constipation (n = 6).

Table 2.

Comparison of the distribution of nursing diagnoses by domains.

Domains	Nursing diagnosis titles	n (%)
Health promotion	Health behavior prone to risk	45
	Sedentary lifestyle	20
	Ineffective health control	1
Nutrition	Risk of poor fluid volume	16
	Risk of metabolic imbalance syndrome	13
	Overweight	6
	Risk of unstable blood sugar	6
	Obesity	5
	Unbalanced nutrition: Less than body needs	2
	Risk of impaired liver function	2
	Readiness for improved nutrition	1
	Deficient liquid volume	1
Elimination and exchange	Risk of constipation	6
	Impaired urinary elimination	5
	Constipation	1
	Dysfunctional gastrointestinal motility	1
Activity/rest	Self-neglect	28
	Risk of ineffective cerebral tissue perfusion	12
	Risk of decreased cardiac tissue perfusion	17
	Risk of activity intolerance	5
	Ineffective breathing pattern	5
	Insomnia	8
	Fatigue	1
	Risk of unstable blood pressure	1
Perception and cognition	Ineffective impulse control	16
	Acute confusion	6
	Impaired memory	1
	Risk of acute confusion	1
Self-perception	Risk of personal identity disturbance	9
	Situational low self-esteem	1
Roles and relationship	Impaired paternity or motherhood	17
	Impaired social interaction	14
	Dysfunctional family processes	1
	Risk of impaired bond	1
Sexuality	Sexual dysfunction	3
Coping/stress tolerance	Anxiety	32
	Readiness for improved power	8
	Post-trauma syndrome	14
	Impaired mood regulation	2
	Fear	1
	Post-trauma syndrome risk	1
	Feeling of powerlessness	1
	Stress overload	1
Comfort	Sharp pain	15
	Social isolation	3
	Impaired comfort	2

Source: Prepared by the authors (2026).

Sixty-six Defining Characteristics (DCs) associated with nursing diagnoses were identified. Among them, the most frequent for the diagnosis Health Behavior prone to risks was substance abuse (n = 44). For the diagnosis Sedentary Lifestyle, the most prevalent defining characteristic was physical activity below the recommended level for age and gender (n = 20). For the Mood Disorder diagnosis, the most frequent defining characteristic was

observed in 10 participants (n = 10). In the diagnosis Impaired Parenting, the defining characteristic that stood out was failure to provide a safe home environment (n = 17). Regarding the Anxiety diagnosis, the most prevalent defining characteristic was nervousness (n = 12). As for the Post-Traumatic Syndrome diagnosis, substance abuse was the most frequent defining characteristic (n = 14) (Table 3).

Table 3.

Distribution of defining characteristics by nursing diagnoses.

Nursing diagnosis	Defining characteristics	n (%)
Health behavior prone to risk	Substance abuse	44
	Failure to achieve a sense of social control	1
Sedentary lifestyle	Average physical activity lower than recommended for age and gender	20
Ineffective health control	Failure to act to reduce risk factors	1
Overweight	BMI level above ideal	-
Obesity	Body mass index above prescribed	2
	Body mass index (BMI) > 30 kg/m²	3
Unbalanced nutrition: Less than body needs	Body 20% lower than ideal weight	1
Impaired urinary elimination	Dysuria	5
Constipation	Straining when evacuating	1
	Reduction in stool frequency	1
Dysfunctional gastrointestinal motility	Abdominal pain	1
Self-neglect	Lack of adherence to health activities	8
Ineffective breathing pattern	Abnormal breathing pattern	5
Insomnia	Change in sleep pattern and reduced quality of life	1
	Change in sleep pattern	6
	Change in mood	4
Fatigue	Change in libido	1
	By non-restorative sleep pattern	1
Ineffective impulse control	In search of sensations	6
	Mood disorder	10
	Act without thinking	1
Acute confusion	Unrest	1
	Change in the function of the level of consciousness	1
	Hallucinations	6
	Incorrect perceptions	2
Impaired memory	Persistent forgetfulness	1
Situational low self-esteem	Helplessness and indisposition	1
Impaired paternity or motherhood	For failure to provide a safe home environment	17
Impaired social interaction	Discomfort in social situations	14
Dysfunctional family processes	Substance abuse	1
	Inability to accept help	1
	Social isolation	1

Sexual dysfunction	Reduced sexual desire	2
	Change in sexual activity	2
	Conflict of values	1
Anxiety	Emotional states of helplessness and fear	3
	Restlessness	2
	Regret	1
	Nervousness	12
	Fear	1
	Agony	1
	Change in sleep pattern	3
	Suffering	10
Willingness to improve power	Expressing a desire to increase involvement in change	1
	Expressing a desire to increase involvement in changing the current situation	7
Post-trauma syndrome	Substance abuse	14
	Mood swings	2
	Depression	1
	Headache	3
	Panic attacks	11
	Anxiety	11
Impaired mood regulation	Hopelessness	1
	Manifested dysphoria	1
Fear	Vomiting	1
	Apprehension	1
	Increased tension	1
	Feeling of panic	1
Feeling of helplessness	Depression	1
Stress overload	Feeling pressured	1
Sharp pain	Reporting pain-related behavior during activities	1
	Self-report of pain	13
Social isolation	Withdrawal	1
	Sad affect	2
	Desire to be alone	2
Compromised comfort	Discomfort with the situation	1

Source: Prepared by the authors (2026).

Regarding the related factors, a total of 45 were identified. The most frequent were low self-efficacy (n = 40), substance abuse (n = 26), insufficient interest in physical activities (n = 20), disturbed thought processes (n = 13), and harmful biological agent (n = 13) (Table 4).

Table 4.

Distribution of related factors.

Nursing diagnosis	Related factor	n (%)
Risk-prone health behavior	Social anxiety	18
	Low self-efficacy	40
Sedentary lifestyle	Insufficient interest in physical activities	20
Ineffective health management	Insufficient social support	1
	Perceived barrier	1
	Feeling of powerlessness	1
Overweight	Excessive alcohol consumption	4
	Sedentary behavior occurring for ≥ 2 hours/day	3
Obesity	Excessive alcohol consumption	5
	Sedentary behavior occurring for ≥ 2 hours/day	2
	Average daily physical activity below the level recommended for one's age and gender	1
	Disorganized eating behaviors	3
Imbalanced nutrition: Less than the body's requirements	Insufficient food intake	2
Deficient fluid volume	Insufficient fluid intake	1
Impaired urinary elimination	Multiple causes	5
Constipation	Dehydration	1
Dysfunctional gastrointestinal motility	Anxiety	1
	Sedentary lifestyle	1
	Stressors	1
Self-neglect	Substance abuse	26
	Lifestyle choices	4
Ineffective breathing pattern	Respiratory muscle fatigue	5
Insomnia	Anxiety	6
	Alcohol consumption	5
	Anxiety	2
	Depression	2
	Stressors	1
Fatigue	Depression	1
	Anxiety	1
Ineffective impulse control	Substance abuse	8
	Mood disorder	10
Acute confusion	Substance abuse	6
Impaired social interaction	Disturbed thought processes	14

Sexual dysfunction	Vulnerability	1
	Conflict of values	1
Anxiety	Substance abuse	27
	Stressors	6
Post-trauma syndrome	Insufficient social support	2
Impaired mood regulation	Anxiety	2
	Substance abuse	2
Fear	Reaction to a phobic stimulus	1
Feeling of powerlessness	Low self-esteem	1
	Anxiety	1
Acute pain	Harmful biological agent	13
Compromised comfort	Insufficient situational control	1

Source: Prepared by the authors (2026).

Discussion

The results showed that people with a history of cocaine/crack use and suicide risk have complex care needs, reflected in a diverse set of nursing diagnoses, mainly in the Health Promotion, Coping/Stress Tolerance, and Activity/Rest domains of the NANDA-I taxonomy. These findings highlight the need to understand psychoactive substance use beyond just dependence, considering its biological, psychological, behavioral, and social impacts, as well as the need for a comprehensive and interdisciplinary approach.

Although identifying nursing diagnoses is important for clinical reasoning and care planning, there are still few studies focused on people who use cocaine/crack and are at risk of suicide. In this sense, the findings help to expand knowledge about human responses in this population and highlight the need to strengthen scientific research and the application of the Nursing Process in mental health, supporting more qualified and individualized care practices.

The identified sociodemographic profile showed a predominance of men, with low education, living in urban areas, and a high proportion of people experiencing homelessness, which characterizes a context of high social vulnerability. These findings are consistent with national and international studies that show a higher occurrence of substance use disorders in populations exposed to social exclusion, housing insecurity, unemployment, and weak social support networks (Coombs et al., 2024; Miler et al., 2021; Souza et al., 2023). Besides encouraging drug use, these social determinants make it harder to access health services, compromise the continuity of treatment, and increase the occurrence of mental health problems.

The early age of substance use initiation observed in this study reinforces the understanding of adolescence as a period of increased vulnerability to the initiation and progression of psychoactive substance use due to the neurobiological, emotional, and psychosocial characteristics inherent to this developmental stage. Substance use initiation during adolescence may be associated with greater exposure to problematic patterns of use and adverse consequences throughout the lifespan, highlighting the importance of prevention and early intervention strategies. Early substance use, particularly alcohol consumption, is associated with an increased likelihood of polysubstance use, relapse, and the development of substance use disorders in adulthood (Bailey et al., 2024; Sjödin et al., 2024). In this context, preventive strategies targeting adolescents and young adults represent an important opportunity to reduce the progression of substance dependence and its clinical and social consequences.

The high prevalence of alcohol use disorder and depressive episodes identified among participants highlights the coexistence of significant psychiatric comorbidities, which increase clinical complexity and the risk of adverse outcomes, including suicidal behavior. Caring for this population requires integrated approaches involving specialized mental health services, services for individuals who use alcohol and other drugs, and Primary Health Care (PHC), thereby promoting continuity of care and long-term follow-up. In this context, nurses play a fundamental role in the early identification of psychological distress, clinical monitoring, and the implementation of interventions aimed at harm reduction and improving treatment adherence (Mari et al., 2024).

The identification of 46 nursing diagnoses and 66 defining characteristics demonstrates the complexity of the human responses exhibited by the participants. The predominance of the nursing diagnosis Risk-Prone Health Behavior, primarily associated with substance abuse, indicates that drug use-related behaviors remain a central focus of nursing care. This finding reinforces the need for interventions aimed at health promotion, health education, harm reduction, and strengthening self-care, all of which are considered essential components of care for individuals with substance use disorders. Studies conducted in Psychosocial Care Centers for Alcohol and Drugs (*Centros de Atenção Psicossocial Álcool e Drogas* - CAPS AD) and other specialized services have identified similar nursing diagnoses, supporting the findings of the present study (Dias et al., 2021; Moreira et al., 2019; Pinho et al., 2022; Vargas et al., 2011).

The high frequency of the nursing diagnoses Self-Neglect, Ineffective Impulse Control, and Impaired Parenting is also noteworthy, reflecting the significant impact of cocaine/crack use on self-care, emotional regulation, and family relationships. Impaired parenting represents an important public health concern, as it may negatively affect child development, increase social vulnerability, and perpetuate intergenerational cycles of psychoactive

substance use. Recent reviews indicate that family-centered care strategies integrated with social protection policies have the potential to minimize these impacts and strengthen family bonds (Rodrigues et al., 2022).

Among the most frequently identified related factors were low self-efficacy and insufficient interest in engaging in physical activity. These findings suggest important opportunities for nursing interventions aimed at strengthening autonomy, motivation, and coping skills. Recent evidence indicates that interventions based on cognitive behavioral therapy, motivational interviewing, and mindfulness-based programs improve self-efficacy, reduce relapse rates, and enhance treatment adherence among individuals with substance use disorders (Abdelaal & El-Ashry, 2024; Sudhir, 2018). Therefore, incorporating these strategies into the nursing process may enhance the effectiveness of care and contribute to better clinical outcomes.

Another relevant finding was the high frequency of subjective manifestations, such as nervousness, compared with the formal diagnosis of anxiety, suggesting that psychological distress may be underrecognized in this population. This finding reinforces the importance of systematically using validated instruments to screen for psychiatric symptoms, as well as providing ongoing training for nurses to facilitate the early recognition of emotional disturbances and suicide risk, thereby enabling timely interventions and appropriate referrals (Pierini et al., 2023).

The findings of this study have important implications for clinical practice and public policy development. The high frequency of nursing diagnoses related to risk-taking behaviors, psychological distress, and social vulnerability highlights the need to strengthen coordination among Primary Health Care (PHC), Psychosocial Care Centers for Alcohol and Drugs (CAPS AD), residential support services, and social assistance services. Such coordination is essential to address social determinants of health related to housing, employment, income, and the strengthening of social support networks. Furthermore, future research should develop and evaluate nursing interventions based on the diagnoses identified in this study, particularly those focused on harm reduction, promoting self-efficacy, strengthening parenting skills, and preventing suicidal behavior.

This study has some limitations that should be considered when interpreting the results. The small sample size and cross-sectional design limit the generalization of the findings and make it impossible to establish causal relationships between the variables investigated. Additionally, including participants from specific services may restrict the representativeness of the population of people who use cocaine/crack. In this way, it is recommended that future studies use larger and more representative samples, longitudinal designs, and assess the effectiveness of nursing intervention protocols aimed at the identified diagnoses, in order to validate the findings and strengthen the evidence for clinical practice. In

this context, future research may benefit from the expansion of national data production on homeless populations, especially with the implementation of the 1st National Census of the Homeless Population by the Brazilian Institute of Geography and Statistics (*Instituto Brasileiro de Geografia e Estatística* - IBGE), scheduled to take place between July 3rd and 7th, 2028. This initiative represents a milestone in producing official information about this population group, as it covers their demographic and socioeconomic characterization on a national level and enables the creation of a standardized and comparable statistical database.

The availability of this data could contribute to future epidemiological studies that seek to relate sociodemographic characteristics, living conditions, use of psychoactive substances, health needs, and access to services, supporting more comprehensive analyses of the vulnerabilities of this population. For Nursing, such information could help in planning interventions based on the identified needs, developing care protocols, and organizing strategies for comprehensive care for people experiencing homelessness who use cocaine/crack. In this way, linking evidence from local studies with future national databases could broaden the understanding of this phenomenon and strengthen the formulation of public policies and evidence-based care practices.

Training nursing teams to recognize early signs of psychological distress, behavioral changes, and suicide risk, along with the systematic use of nursing diagnoses in care planning, is an important strategy to improve care for people using cocaine and crack. The high proportion of participants living on the streets, combined with low education levels and early onset of substance use, highlights a context marked by multiple vulnerabilities and care needs that go beyond just the clinical aspect. In this scenario, nursing care requires a comprehensive, interdisciplinary, and cross-sectoral approach that aligns with the social, family, psychological, and health needs identified during the assessment process.

The findings also reinforce the close relationship between problematic use of psychoactive substances, living conditions, and mental health aspects. The coexistence of these conditions can negatively affect individual, family, and social functioning and should be considered when assessing risk and setting care priorities. Therefore, nursing care should not be limited to managing alcohol, cocaine, or crack use, but should also include identifying psychological distress, changes in family and social relationships, impaired self-care, coping difficulties, and other factors that may impact individuals' safety and quality of life.

In the context of the Nursing Process, identifying the diagnoses of Health Behavior Risk-Prone, Anxiety, Self-Neglect, and Impaired Parenting highlights the multiple human responses present in this population. These diagnoses reflect different dimensions of care and emphasize the need for an assessment that integrates behavioral, emotional, relational, and self-care aspects. The presence of defining characteristics and related factors, such as

substance abuse, low self-efficacy, and disturbed thought processes, adds important elements for clinical reasoning and for setting care priorities.

From this perspective, nursing diagnoses can serve as organizing elements of care, allowing the findings identified in the assessment to be translated into specific intervention needs. Interventions should, according to the identified needs, focus on strengthening coping strategies, self-efficacy, autonomy, and self-care, as well as reducing risky behaviors and early identification of changes related to mental health and suicidal behavior. Systematizing this information in the Nursing Process can help ensure continuity of care and coordination across different points of the care network, especially in situations of high social vulnerability.

In this sense, the results point to the need for ongoing training of nursing professionals for the comprehensive assessment of people who use cocaine and crack, including recognizing signs of psychological distress and factors associated with suicide risk. The use of structured tools, combined with clinical judgment and the application of standardized diagnostic language, can enhance nursing's ability to identify care needs that sometimes remain underrecognized in care focused solely on substance use. However, since this is a cross-sectional study, the findings should be interpreted as associations and characteristics observed in the investigated population, and they do not allow for establishing causal relationships between substance use, psychosocial conditions, and suicidal behavior.

Conclusion

Identifying the priority nursing diagnoses makes it possible to systematically recognize the main human responses and care needs of people who use cocaine and crack and are at risk of suicide, supporting clinical reasoning, decision-making, and the planning of individualized care. Recognizing the diagnoses, their defining characteristics, and related or risk factors can guide interventions aimed at harm reduction, strengthening self-care, autonomy, and coping strategies, treatment adherence, suicide prevention, and psychosocial support, connected to the different points of the Psychosocial Care Network.

In this way, the findings expand knowledge about human responses related to cocaine and crack use and reinforce the application of the Nursing Process in the field of mental health, providing support for improving care and developing care protocols aimed at this population. However, considering the cross-sectional design and the non-probabilistic nature of the sample, the results should be interpreted in the context of the population studied, not allowing for causal relationships to be established. Longitudinal and multicenter studies could deepen the understanding of the relationships between substance use, mental health, suicide risk, and nursing diagnoses.

Ethical statement

This study was conducted in accordance with the ethical principles applicable to scientific research. Participation was voluntary, based on free and informed consent; anonymity and data confidentiality were guaranteed, as was the right to withdraw at any time. All sources used have been duly cited, ensuring academic integrity and adherence to research ethics standards.

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Conflict of interest statement

The authors state that they have no financial, commercial, personal, or academic interests that could have influenced the results or interpretation of this manuscript.

Declaration of Artificial Intelligence use

Generative Artificial Intelligence tools were used exclusively for language editing tasks, reference standardization, and improving textual clarity. The tools were not used to generate ideas, hypotheses, interpretations, analyses, results, or scientific conclusions. The authors confirm that the manuscript does not contain content fabricated, manipulated, or fully produced by AI, and that all information was manually verified. The authors take full ethical and scientific responsibility for the final content.

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Data availability

The data underlying the research are reported in the article.

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