# HEART TRANSPLANTED PATIENTS IN MEDIATE POSTOPERATIVE PERIOD: NURSING DIAGNOSES BASED ON HORTA ASSUMPTIONS\*

Transplantados cardíacos em pós-operatório mediato: diagnósticos de Enfermagem segundo pressupostos de Horta Trasplantados cardíacos en el pos-operatorio mediato: diagnósticos de Enfermería según los supuestos de Horta

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ABSTRACT: Objective: To identify the profile of Nursing diagnoses in heart-transplanted patients in the postoperative period from the Taxonomy II of the North-American Nursing Diagnosis Association, and to discuss them using Horta's assumptions and scientific literature. Method: A retrospective, descriptive, exploratory study performed in Belo Horizonte, Minas Gerais State, Brazil, in a large-sized general hospital. The sample consisted of 49 adult patients, aged ≥18 and <60 years, of both genders, heart-transplanted subjects in the postoperative period. Data were collected from patient records. Results: We identified 12 Nursing diagnoses, divided into 10 real and two potential ones, 100% belonging to the psychobiological basic human need. Conclusion: There was not a diagnostic identification for psychosocial and psychospiritual needs. According to Horta, the biologicist paradigm moves Nursing career to the patient's fragmentation, keeps nurse in alienation, and is opposed to the pragmatic focused on holism. Keywords: Nursing diagnosis. Heart transplantation. Perioperative nursing. Nursing theory.

RESUMO: Objetivo: Identificar o perfil dos diagnósticos de Enfermagem nos pacientes transplantados cardíacos em pós-operatório mediato, a partir da Taxonomia II da North-American Nursing Diagnosis Association, e discuti-los à luz dos pressupostos de Horta e da literatura científica. Método: Estudo retrospectivo, descritivo, exploratório, realizado em um hospital geral de grande porte de Belo Horizonte, em Minas Gerais. A amostra foi composta por 49 pacientes adultos, de ambos os sexos, idade ≥18 anos e <60 anos, transplantados cardíacos em pós-operatório mediato. Os dados foram coletados a partir do prontuário do paciente. Resultados: Foram identificados 12 diagnósticos de Enfermagem, classificados em 10 reais e dois potenciais, sendo 100% pertencentes à necessidade humana básica psicobiológica. Conclusão: Não houve identificação diagnóstica para as necessidades psicossocial e psicoespiritual. Segundo Horta, o paradigma biologicista move a carreira à fragmentação do paciente, mantém o enfermeiro em alienação e opõe-se à pragmática centrada no holismo. Palavras-chave: Diagnóstico de enfermagem. Transplante de coração. Enfermagem perioperatória. Teoria de enfermagem.

RESUMEN: Objetivo: Identificar el perfil de los diagnósticos de Enfermería en pacientes trasplantados cardíacos, durante el pos-operatorio mediato utilizándose la Taxonomía II del North-American Nursing Diagnosis Association, y discutirlos basándose en los supuestos de Horta y de la literatura científica. Método: Estudio retrospectivo, descriptivo y exploratorio, realizado en un hospital general de gran tamaño en Belo Horizonte, Minas Gerais, Brasil. La muestra fue compuesta por 49 pacientes adultos, de ambos los géneros, con edad ≥18 años y <60 años, trasplantados cardíacos en el pos-operatorio mediato. Los datos fueron recolectados desde la historia clínica del paciente. Resultados: Fueron identificados 12 diagnósticos de Enfermería, clasificados en 10 reales y dos potenciales, per los 100% pertenecían a la necesidad humana básica psicobiológica. Conclusión: No se identificó diagnóstico para las necesidades psicosocial y psicoespiritual. Según Horta, el paradigma biologicista conlleva a fragmentar el paciente, manteniendo al enfermero alienado y contrario a la pragmática centrada en el holismo.

Palabras clave: Diagnóstico de enfermería. Trasplante de corazón. Enfermería perioperatoria. Teoría de enfermería.

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# INTRODUCTION

Heart transplantation is performed when the probability of a lifespan is greater in the surgical treatment than the clinical treatment. It is a complex procedure that has organic, social and psychological impacts on the patient, which implies the need for specialized care<sup>1</sup>.

Thus, the heart transplant patient, in the mediate postoperative period beginning 24 hours after surgery, demands mediate and accurate professional actions from nurses, which require scientifically-based planning. Thus, the nursing care as a result of professional action should move nurses to act in a lucid, reflective way, in a technically and humanistically competent manner, because this care is critical to patient recovery<sup>2,3</sup>.

The nurse is the professional required to coordinate and implement health care, from meeting the patient's basic human needs (BHN), aiming at their better response to treatment. Therefore, it is up to this professional to seek technical, scientific and humanistic improvement to tend to the patient's needs<sup>4</sup>.

The search for this improvement moves the nursing professionals to surround themselves with care alternatives, through a characteristic work methodology, which is based on the scientific method, expressed by the Systematization of Nursing Assistance (SEA). It is being implemented in the healthcare practice and provides greater security to patients, improves the quality of care and ensures autonomy to the professionals, as it enables them to organize the work and operate the nursing process (NP)<sup>1</sup>.

The NP is part of a set of actions that express the nurses' way of acting and thinking towards the patient and his family, with regard to health promotion, prevention and treatment of disease. It consists of five interdependent steps, namely: data collection or Nursing history; Nursing diagnosis (ND); planning; implementation and evaluation of Nursing. This constitutes the methodological tool that guides Nursing care<sup>4</sup>.

In addition, the NP must be based on a theoretical framework to guide data collection, the establishment of the ND and intervention planning. It should also provide data for the evaluation of results.

In this study, the philosophical presuppositions of Wanda de Aguiar Horta were used to guide it<sup>4,5</sup>, which are based on Maslow's Theory of Human Motivation, whose primary

concept is the hierarchy of the BHN. These are arranged in five levels of priority, outlined from the most basic to the most complex, namely: physiological needs, safety and security, love and gregariousness, self-esteem and self-actualization. Nursing employs the proposition by John Mohana, which ranks the BHN in: psychobiological, psychosocial and psycho-spiritual<sup>5</sup>.

The conjectures by Horta allow nurses to reflect upon and move towards a healthcare practice centered around understanding the patient as a person, as well as stimulating their participation as subjects of the therapeutic plan and contributing to the production, further development and expansion of the knowledge on Nursing<sup>1,5</sup>.

Thus, among the steps of the NP, the ND is recognized as a guide for the remaining steps, as it represents the basis for the selection of the actions towards the expected results. It is drawn from the interpretation and collation of the data collected and culminates in the decision-making process about diagnostic concepts, which express the answers of the patient, family or community on the health versus disease binomial<sup>3-5</sup>.

It is understood that knowing the diagnostic profile of patients is relevant to the nursing care because the ND is the guiding principal for the remaining steps of the NP. Thus, this study aimed to identify the profile of the ND in heart transplant patients in the mediate postoperative period based on the Taxonomy II of the North American Nursing Diagnosis Association (NANDA) and discuss them in light of Horta's assumptions and the scientific literature<sup>5,6</sup>.

## **METHODS**

This is a descriptive, exploratory and retrospective study. The scenario was the Intensive Care Unit (ICU) of a large general hospital, located in Belo Horizonte, Minas Gerais, whose staff had 20 specialist nurses who cared to patients in the postoperative period of cardiac surgery, including cardiac transplants. The ICU nurses were responsible for the drafting of the Nursing history and the for the formulation of the ND in their respective work shifts. The population consisted of 60 medical records of heart transplant patients in the mediate postoperative period, which that occurs after the first 24 hours, lasting about 2 to 10 days<sup>7</sup>.

Sociodemographic data and the ND were collected from medical records of patients who underwent heart transplantation and recorded on an instrument previously developed for this purpose. The data collection phase lasted three months and included transplant patients over a period of 48 months from the implementation of the NP in the unit. The ND with a reliability rate of 70% were included in the study, which was understood as a measure of agreement between the diagnostic findings of two or more nurses — in this case, between the researcher and the hospital nurses, using the same data from the records of patients in the mediate postoperative period after a heart transplant. Data analysis was performed using descriptive statistics and discussed in the light of Horta's assumptions on the scientific literature<sup>5,8</sup>.

Inclusion criteria were adults of both sexes, aged ≥18 years and <60 years, who underwent a heart transplantation procedure, in the mediate postoperative period, admitted to the ICU. Exclusion criteria were patients with serious complications in the immediate postoperative period (<24 hours) such as: global graft dysfunction, pulmonary hypertension with use of intra-aortic balloon, hypocontractility with low cardiac output and acute renal failure; patients who had no Nursing history and evolution in the medical record. After the application of the criteria, the sample consisted of 49 records.

The study was approved by the Research Ethics Committee of Universidade Federal de Minas Gerais (UFMG), under protocol no. ETIC 397/06, according to Resolution 196/96, revoked by Resolution 466/12 of the National Health Council, protecting the anonymity of the persons undergoing treatment and of the professionals who issued the ND.

### RESULTS

The results are presented by the characterization of the patients who underwent heart transplantation and the distribution of ND given by nurses in the mediate postoperative period.

Table 1 shows that among the 49 patients undergoing heart transplantation, 67.3% were male; ages ranged between 18 and 60 years; 77.6% were married and 59.2% were Catholic Christians. As for education level, 65.3% had primary education and 8.2% had higher education.

Concerning the ND, 12 diagnoses were listed, and are classified into real (n=10) and potential (n=2). Among the real are: impaired bed mobility; ineffective protection; impaired gait; impaired tissue integrity, attributed to 100% of the heart transplant patients; imbalanced nutrition, less than body requirements, in 93.9% of patients; decreased cardiac output in 87.7% of them; acute pain in 83.7%; impaired gas exchange and ineffective breathing pattern attributed to 79.6%; in addition, impaired urinary elimination was attributed to 73% of subjects. Among the potential diagnoses are: risk of infection assigned to 100% of the patients and risk of constipation to 77.5%.

When evaluating the ND and identifying the BHN affected, it was shown that 100% of them concerned the psychobiological needs. Therefore, there was no identification of diagnoses for psychosocial and psycho-spiritual needs, as shown in Table 1.

**Table 1.** Frequency distribution of heart transplant patients, according to sociodemographic data, in Belo Horizonte, 2009.

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Variables	n	%
Sex		
Male	33	67.3
Female	16	32.6
Age		
18 to 30 years	6	12.2
31 to 40 years	13	26.5
41 to 50 years	16	32.7
51 to 60 years	14	28.6
Marital status		
Single	3	6.1
Married	38	77.6
Other	8	16.3
Education		
Primary education	32	65.3
Secondary education	9	18.3
Higher education	4	8.2
Not informed	4	8.2
Religion		
Catholic	29	59.2
Evangelicalism	13	23.5
Spiritism	3	8.1
Not informed	4	9.2

# **DISCUSSION**

This topic was organized into two sections: in the first, the analysis of the classification of the ND in heart transplant patients in the mediate postoperative period in the light of Horta's assumptions. Then, these diagnoses were discussed according to NANDA's Taxonomy II and the scientific literature<sup>5,6</sup>.

# Analysis of the classification of nursing diagnoses in heart transplant patients in the mediate postoperative period in the light of Horta's assumptions

There was a predominance of male patients aged between 41 and 60 years, and in relation to education, the majority

had elementary school, a condition that favors the patient's social vulnerability, which could compromise their adherence to the treatment plan. Such situations should arouse in the nurse the clarity of their role as a health educator, aiming to establish actions with the patient that guide them to personal growth and development<sup>9</sup>.

The ND were classified according to Horta's assumptions regarding the psychobiological BHN. The data revealed a trend by nurses to highlight this aspect at the expense of psychosocial and psycho-spiritual aspects. This fact stems from the prevailing understanding that life ends in the biological dimension, in addition to the highest valuation given to technological advances promoted by science<sup>5,10</sup>.

Chart 1. Distribution of nursing diagnoses according to related or risk factors, defining characteristics and basic human need affected.

Nursing Diagnoses	Related or risk factors	Defining characteristics	Basic human need affected
Impaired bed mobility	Major surgery	Impaired immunity; impaired healing	Psychobiological
Ineffective protection	Inadequate nutrition, immunosuppression	Impaired immunity; impaired healing	Psychobiological
Impaired gait	Mediate postoperative period for major surgery (2 to 10 days)	Impaired ability to walk	Psychobiological
Impaired tissue integrity	Surgical procedure	Invasion of body structures (breaking of the dermis and epidermis)	Psychobiological
Imbalanced nutrition, less than body requirements	Inability to eat or drink food or absorb nutrients, caused by prior congestive heart failure, pain, anxiety or nausea	Body weight 20% or more below the ideal. Account of lower food intake than the recommended daily portion; lack of interest in food	Psychobiological
Decreased cardiac output	Altered heart rate	Fatigue, oliguria, edema, arrhythmia	Psychobiological
Acute pain	Major surgical procedure, invasive	Verbal or coded reporting; evidence observed by facial expression; changes in appetite and food; position to avoid pain	Psychobiological
Impaired gas exchange	Imbalanced ventilation-perfusion	Restlessness, drowsiness, shortness of breath, confusion or irritability	Psychobiological
Ineffective breathing pattern	Body position, fatigue, anxiety, decreased energy or pain	Beating of the ala of nose; dyspnea; use of accessory muscles to breathe and imbalanced ventilation-perfusion	Psychobiological
Impaired urinary elimination	Surgical anesthesia, urinary tract infection	Urinary retention and dysuria	Psychobiological
Risk of infection	Immobilization in bed	-	Psychobiological
Risk of constipation	Invasive procedures, malnutrition, immunosuppression, chronic disease, increased environmental exposure to the pathogen	-	Psychobiological

Thus, influenced by the advances of modern science, the nursing profession uses the scientific technical view. This perspective is philosophically grounded, especially marked by the separation of the knowledge obtained from objectivity and subjectivity, and therefore, the biologicist aspect is considered foundational to the Nursing care practice<sup>11</sup>.

This paradigm comes from Positivism and, for this philosophical current, science is objective; therefore, human subjectivity is not valuated. Such influence was evidenced in this study because, due to the complexity of human existence, the nurse sub-categorized ND to psychosocial and psychospiritual BHNs<sup>5,11</sup>.

Of course, the importance of the biological aspect as founder and sustainer of human life cannot be ignored; however, Horta's views is that life is not defined only by it, because the patient aspires to be worth in their entirety, that is, to be recognized as a person<sup>5,11,12</sup>.

Another relevant aspect of the biologicist paradigm is the anthropological concept claimed by it. In it, the human being is perceived as a machine, which implies the loss of health in the individual, strictly identified as an operational failure, subject to correction, maintenance and adjustment. It is inferred, therefore, that the state of alienation experienced by nurses should not be analyzed from the perspective of lack of skills or competencies to identify diagnoses that are beyond the psychobiological level. However, it lies in the deformed vision of the human dimension in their social, political and ethical aspects<sup>10</sup>.

In contemporary times, the influence of the separation between objectivity and subjectivity is clear, notably in the hospital setting. In that setting, scientific objectivity is manifested from professional specialization; fragmentation in the work processes; priority in the valuation of technical knowledge; increasing use of technologies and innovations in terms of equipment, medicines, at the expense of the valuation of the aspects that involve knowledge from subjectivity. These elements characterize the setting surrounding the care of patients undergoing heart transplantation. On the unit where they spend the mediate postoperative period, technological advances and the professional expertise of nurses are notorious.

Historically, the Brazilian Nursing activity, in the healthcare and educational aspect, has been marked by its closeness to the biomedical model, which exacerbates the biologicist aspects in its professional training. Consequently,

the biologicism amalgamates the worldview of nurses, moving them to care for patients in a fragmented way. This characteristic builds on the anthropological concept of man as a machine<sup>5,11</sup>.

Overcoming this inherited biologicist paradigm will cause the awakening of the nurse to the recognition of the patient's subjective dimension, giving nurses the ability to identify the ND to psychosocial and psychospiritual BHNs. This will cause the transformation of nurses, allowing the planning of the nursing care, intrinsically valuable, by seeing the patient as a person<sup>5</sup>.

In this way, it is up to the nurse, in the exercise of the NP, to keep their attitudes critical and reflective. They can thus overcome the hegemonic biologicist vision influencing the profession today, and will then reaffirm the integrity that characterizes the patient, valuing the psychobiological, psychosocial and psychospiritual needs<sup>5</sup>.

Thus, what science divided is reintegrated, and assumes a new anthropological concept based on holism. In it, man is an indivisible, dynamic whole, in constant interaction with the environment. This endeavor begins at the birth, culminating in death. Such a concept is a basic element of Horta's assumptions and should constitute the fulcrum used by nurses to subsidize the healthcare practice<sup>5,13</sup>.

# Nursing Diagnoses in heart transplant patients in the mediate postoperative period according to NANDA's Taxonomy II

Real and potential ND relate to the fields of disposal or exchange, activity or rest, safety or security, nutrition and comfort<sup>6</sup>.

The diagnoses of impaired bed mobility and gait, as well as the risk of constipation, are closely related to each other. This fact focuses on the sharing of related risk factors, based on major surgery and immobilization in bed. About 30-60% of patients admitted to ICU after surgery developed generalized weakness related to immobility. Stimulation and conducting exercises in bed are essential components of the Nursing care, from the realization of bed baths, changing positions, among others, and enable nurses to participate in the fight against immobility<sup>14,15</sup>.

Such developments, in synergy with other health professionals, promote physical benefits (e.g., stimulation of intestinal peristalsis, muscle strengthening, pressure ulcer prevention, among others), maintaining the patient's

mental health, reducing oxidative stress and inflammation, because performing exercises in the bed, whether active or passive, stimulate the increased production of anti-inflammatory cytokines<sup>14,15</sup>.

Thus, early mobilization of the patient has been identified as an effective intervention to reduce physical weakness and, when associated with the correct positioning in bed, to avoid physical disabilities, weakness of the respiratory, abdominal and peripheral muscles, and to provide patient interaction with their environment, working their motor, cognitive and psychological stimulation<sup>14,15</sup>.

The diagnosis of impaired tissue integrity and risk of infection were common to, as related or risk factors, the performance of invasive surgical procedure. The surgery, in addition to breaking the epithelial barrier, disrupts the arrival of glucose, amino acids and oxygen to the tissue, triggering a series of systemic reactions that facilitate the occurrence of infectious processes<sup>16</sup>.

In the surgical site occurs hypoxia, pH change and fibrin deposition. Hypoxia and acidosis hinder the migration of neutrophils and their microbicidal activity; the deposition of fibrin contributes to infection, as bacteria sequesters and modifies the local defense mechanism. In addition to invasive procedures and insufficient primary defense due to surgical trauma, several factors influence the incidence of wound infection, among them: patient's preoperative clinical status (age, nutritional status, chronic diseases, etc.); technical conditions of the surgery; preoperative hospital stay; sequestering and destruction of leukocytes promoted by cardiopulmonary bypass<sup>16</sup>.

Therefore, it is up to the nurse to assess the patient's clinical condition daily and prevent potential complications, electing, for example, Nursing interventions related to the supervision of the skin, establishing, among others, the following activities: examining the skin and mucous membranes for redness, excessive heat, edema and draining; observing extremities for color, heat, swelling, pulse, texture, edema and ulcerations; monitoring the skin for excessive drying and moisture<sup>17</sup>.

The diagnoses of ineffective protection and imbalanced nutrition, less than body requirements, lower than bodily needs, can be considered as solidarity, that is, the basis on which they sit have, from their defining characteristics, a close relationship. Ultimately, imbalanced nutrition has a synergistic effect on immunity deficiency and results on impaired healing<sup>18</sup>.

The patient, due to the cardiovascular bypass, undergoes changes in the body's physiological balance, which is a complex and multifactorial aggressor agent. Blood cells are subject to the action of various forces, which differ from the normal circulation; thus, erythrocytes, leukocytes and platelets are affected by both the physical trauma and the contact with the surfaces of the circuit. Leukocytes are sequestered from the circulation and others are destroyed, lowering the body's defense against infection and releasing inflammatory and pro-oxidative factors, which exert synergism to move the patient to an unbalanced nutritional status and harm the immune defense<sup>16-18</sup>.

Therefore, nurses should promote safety and prevent complications, using the Nursing intervention for nutritional monitoring, choosing activities that bring the best benefit to the patient, such as: monitoring the occurrence of nausea, vomiting, pallor, flushing and dryness, as well as redness, swelling and cracks in the mouth/lips<sup>17</sup>.

The diagnosis of decreased cardiac output had altered heart rate as a related factor. This is defined as an insufficient amount of blood pumped by the heart to meet the bodily metabolic requirements. A study shows that this diagnosis is also related to lower blood pressure, altered heart rate, arrhythmia, altered central venous pressure, altered left atrial pressure, impaired peripheral perfusion, changes in appearance and oliguria; such factors are shared by this research<sup>19</sup>.

Thus, nurses must remain in a state of attention to the manifestation of this condition; to do so, they shall list the Nursing intervention that denotes cardiac care and establish activities that match the patient's care, such as: monitoring cardiovascular status and vital signs often, monitoring the respiratory condition for symptoms of heart failure and the occurrence of dyspnea, fatigue, tachypnea and orthopnoea<sup>17</sup>.

The diagnosis of impaired urinary elimination had anesthesia as an associated factor. An investigation shows that acute kidney injury (AKI) is one of the main complications after cardiac surgery and produces decrease in urine volume. This fact is associated with cardiovascular bypass and blood pressure, in addition to the kidney injury mechanism produced by the anesthetic used. The association between the amount of blood components received and the development of AKI during transplantation was also demonstrated<sup>20</sup>.

Nurses should keep close attention to the quantitative and qualitative aspects of urinary elimination, and should also assess the choice of Nursing intervention based on the control of urinary elimination, as well as establish activities, namely monitoring the urinary elimination, including frequency, consistency, odor, volume and color; checking the appearance of signs and symptoms of urinary retention and guiding the patient to verify the presence of symptoms of urinary tract infection<sup>17</sup>.

The diagnosis of acute pain was evident from the risk factor 'major surgery, invasive', having as defining characteristics the verbal report, the change in appetite and position to avoid the pain. This results from trauma to the chest wall and ribs, given the incisions, the presence of drains and the retraction of the sternal edges, which can cause fracture or microfracture in the ribs, and intercostal muscle strain. It is up to the Nursing professional to list interventions that can help the patient overcome this condition, either through the administration of medication, or through the non-pharmacological control of pain<sup>21,22</sup>.

It is also noteworthy that the pain related to the surgical procedure is associated with noxious stimuli, especially in the sternotomy, changing lung function by upper chest instability. Thoracic and abdominal pain may favor the following losses: tensing of the muscles of the diaphragm and chest wall; hindering of the ability to cough, breathe and move in bed; decreasing the vital and functional residual lung capacity, as well as resulting in atelectasis and pneumonia<sup>21,22</sup>.

In this sense, pain control should be a concern of the nurse, for their correct evaluation and conduct promote comfort and well-being and prevent respiratory complications. Thus, the Nursing professional should choose the Nursing intervention for pain control and establish activities that care for the patient, such as controlling environmental factors that may influence a patient's response to discomfort (e.g. temperature, lighting or ambient noises); observing the occurrence of non-verbal factors of discomfort, especially in patients unable to communicate effectively; and investigating with the patient for factors that alleviate or worsen pain<sup>17</sup>.

The diagnosis of impaired gas exchange and ineffective breathing pattern had the imbalance between ventilation and perfusion as their intersection point. The defining characteristics listed pointed to the clinical status of sensory, cognitive and mood alterations in the clientele; followed by dyspnea and accessory use of muscles to breathe. Impaired gas exchange and ineffective breathing pattern may be signs of pulmonary complications<sup>15</sup>.

Pulmonary complications account for 40% of deaths in patients aged over 70 years and are the second most frequent cause of complications after cardiac surgery. Factors such as prolonged intraoperative time, cardiovascular bypass, general anesthesia, surgical incision, intensity of surgical manipulation or number of drains may predispose to changes in lung function, in addition to the psychological factor, in which the patient believes he can break the suture when breathing or coughing, which may cause changes in respiratory function<sup>15</sup>.

Moreover, it is up to the nurses to strive to promote the best conditions of the patient, choosing a Nursing intervention for respiratory monitoring, proposing, among others, the following activities: monitoring the frequency, pace, depth and effort in breathing; checking the occurrence of noisy breathing, such as wheezing, shrill and snoring; verifying the occurrence of fatigue of the diaphragmatic muscles and monitoring the patient's respiratory secretions<sup>17</sup>.

### CONCLUSION

In conclusion, it can be said that ND were identified for heart transplant patients in the mediate postoperative period, classified in real and potential. As for Horta's assumptions, there were no psychosocial and psycho-spiritual diagnoses. The titles for the diagnoses of psychobiological nature were impaired bed mobility, ineffective protection, impaired gait, impaired tissue integrity, imbalanced nutrition, decreased cardiac output, acute pain, impaired gas exchange, impaired urinary elimination, ineffective breathing pattern, risk of constipation and risk of infection.

The predominance of psychobiological factors made evident the influence of the biologicist paradigm on the professional Nursing practice. This reinforces the need to sensitize nurses about the development and prioritization of a critical and reflective attitude about the care pragmatics, in order to awaken them to the adoption of the anthropological concept based on holism. Only then, they will have the conditions that will enable them to judge the ND that expresses the entirety of the patient, from the identification of BHN in the psychobiological, psychosocial and psycho-spiritual spheres, giving them the recognition of the person, which is a basic concept of Horta's assumptions and a transforming factor in the Nursing practice.

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