

PROFILE OF PEDIATRICS PATIENTS EVALUATED AT THE MULTIPROFESSIONAL RESIDENCY IN AN UNIVERSITY HOSPITAL

PERFIL DOS PACIENTES PEDIÁTRICOS AVALIADOS PELA RESIDÊNCIA MULTIPROFISSIONAL EM UM HOSPITAL UNIVERSITÁRIO

PERFIL DE PACIENTES PEDIÁTRICOS EVALUADOS POR LA RESIDENCIA MULTIPROFESIONAL EN UN HOSPITAL UNIVERSITARIO

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Aiming to analyze the profile of patients admitted to the pediatric unit of a university hospital, it was performed a descriptive, retrospective study that included children hospitalized in Pediatric Wards and Infant Emergency Room, of a university hospital. Data was obtained from the records of evaluations carried out from May to October 2012. There were 404 children evaluated, among which 35% were infants and 59% were male. May was the month of highest incidence of hospitalizations (21.5%) and 58% were children from Uberaba, Minas Gerais, Brazil. As for the number of residents, it had a frequency of four people/household (31.6%), with the prevalence of income of two minimum wages (33.6%) and among the total number of children, 38% receive some benefits. The most occurring diseases are related to the respiratory tract (28.2%). The data allow us to characterize the sample group, understand the illness profile, as well as develop plans of health attention that prevent the aggravation of the diseases, in order to avoid future hospitalizations, suggesting the focus on prevention of breathing issues through primary care.

Descriptors: Health profile; Inpatient care units; Child.

Com o objetivo de analisar o perfil dos pacientes internados na unidade de pediatria de um hospital universitário, realizou-se um estudo descritivo e retrospectivo que incluiu crianças internadas nas Enfermarias de Pediatria e no Pronto Socorro Infantil, de um hospital universitário. Os dados foram obtidos a partir dos registros das avaliações realizadas de maio a outubro de 2012. Foram avaliadas 404 crianças, dessas 35% são lactentes e 59% do sexo masculino. Maio foi o mês de maior incidência de internações (21,5%) e 58% eram crianças procedentes de Uberaba. Quanto ao número de moradores, teve-se uma frequência de quatro pessoas/casa (31,6%), sendo a renda de dois salários mínimos (33,6%) e, do total de crianças, 38% recebem algum tipo de benefício. As doenças com maior ocorrência estão relacionadas ao aparelho respiratório (28,2%). Os dados permitiram caracterizar a amostra estudada, compreender o perfil do adoecimento nessa faixa etária, bem como, elaborar planos de atenção à saúde que previnam o agravamento das doenças a fim de se evitarem hospitalizações futuras, sugerindo o enfoque da prevenção de acometimentos respiratórios na atenção primária.

Descritores: Perfil de Saúde; Unidades de Internação; Criança.

Con el objetivo de analizar el perfil de los pacientes ingresados en la unidad pediátrica de un hospital universitario, se hizo un estudio descriptivo, retrospectivo que incluyó a los niños hospitalizados en Enfermería Pediátrica y el Pronto Socorro Infantil. Los datos se obtuvieron de los registros de las evaluaciones llevadas a cabo entre mayo y octubre de 2012. Se evaluaron 404 niños, de éstos 35% son los lactantes y 59% hombres. Mayo fue el mes con mayor incidencia de hospitalizaciones (21,5%) y el 58% eran niños procedentes de Uberaba, Minas Gerais, Brasil. Cuanto al número de residentes habían una frecuencia de cuatro personas / hogar (31,6%), y la prevalencia de la renta de dos salarios mínimos (33,6%) y del número total de niños, el 38% recibe algún tipo de beneficio. Las enfermedades con mayor incidencia están relacionados con el tracto respiratorio (28,2%). Los datos permite caracterizar la muestra, la comprensión del perfil de la enfermedad en este grupo de edad, así como desarrollar planes de cuidados de salud para prevenir el empeoramiento de la enfermedad para que se evite hospitalizaciones futuras, lo que sugiere un enfoque en la prevención de las afecciones respiratorias en la atención primaria.

Descritores: Perfil de salud; Unidades de internación; Niño.

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INTRODUCTION

Childhood is a very important period in the growth and development process of human beings, both biological, psychosocial and cognitive. It is the disease process, event that with profound impact on human development, bringing multiple meanings and changes in the course of life of the affected individual and his family¹.

The hospitalized child is away from his routine, that is, from home, from school, from living with friends and family members. The therapeutic intervention, the disease and the hospital environment, that is, the physical structure, the routines, the number of people in area cause big changes in children's lives and their families, due to several reasons. With all this, the new health condition creates uncertainty, fear of death, pain, embarrassment, loneliness, longing, and the loss of autonomy over their own bodies, which is often subjected to invasive situations².

In the priorities of public policies for the health of the population there is the comprehensive health care of the child because it is a group with increased vulnerability to diseases and illnesses. Thus, it is necessary to know, evaluate and improve the indicators, as well as highlight the importance of health services in force³.

They are health indicators that reflect on the population's standard of living, population structure information (gender, age, marital status, religion, socio-economic structure of the population, type and quality of housing and home environments), mortality rates and their determinants, standard of morbidity of the population or demand met by services and degree of risk of an event or condition in health⁴.

Another factor refers to high rates of hospitalizations sometimes inherent to the care of primary care, which could mean problems of access to health services or performance; in this way, the monitoring of these hospitalizations can support decision-making to address excess preventable hospitalizations⁵.

In this sense, it is necessary to study the health conditions of children in order to

understand the pattern of illness in this age group and organize health care so that preventive measures can be taken to injuries and hospitalizations are avoided⁶.

In order to alleviate the suffering presented by the children, raising new possibilities, promoting difficulties overcoming, the humanization of assistance to ensure the rights and the creation of recreational areas, it is necessary that health teams expand their perceptions and knowledge of the population served. Thus, this study aims to analyze the profile of pediatric ward hospitalizations and the children's emergency room of a university hospital.

METHOD

This is a descriptive, temporal and exploration study of hospitalizations of Pediatrics Unit of the Clinical Hospital of the Federal University of Triângulo Mineiro (UFTM). This hospital is childcare reference of 27 cities in the macro-region of Uberaba.

The data used in this study were taken from the files of the Multidisciplinary Integrated Health Residency team (RIMS - child health modality) attached to patient records. The data collected were analyzed between 1 May to 31 October of 2012. The variables related month of hospitalization, gender, age, origin, income, receiving benefit, the number of residents per household and clinical diagnosis were studied.

The information contained in the evaluated records of RIMS team were tabulated from pre-established record units, noting the occurrence and frequency in each data evaluated, as the month of hospitalization, as well as verification of the higher and lower incidence month. The genders were divided into male and female. The age group was subdivided in newborns (0-28 days), infants (28 days to 2 years old), preschool (2-7 years old), school (7-10 years old) and adolescents or pre-pubescent (>10 years old)⁷.

Regarding the origins they were divided the ones from Uberaba and from other cities. Family income was verified by the remuneration in number of minimum

salaries. The number of residents per household was recorded, as well as internal (residents) from other institutions, for example, protection homes. As for the public benefit, there was observed if they received or not. The diseases were grouped into systems presented, such are: respiratory, gastrointestinal, prematurity, hematologic, orthopedic, cardiac, dermatological diseases and others.

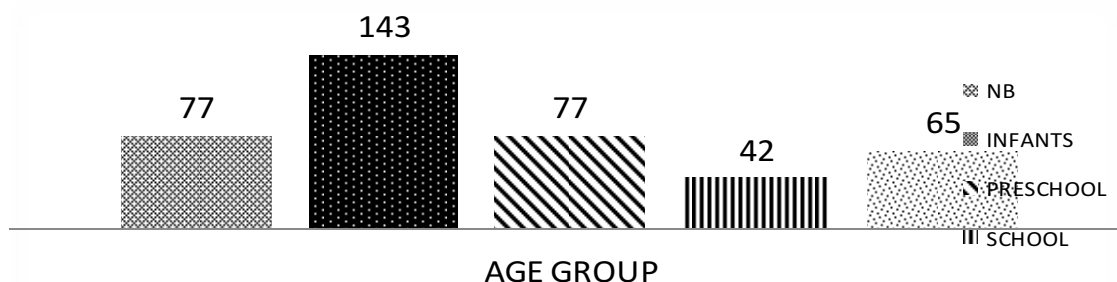
Afterwards the data was analyzed using the spreadsheet, Microsoft Excel®, being presented in tables and graphs containing the frequency and percentage of all variables questioned in the study.

This study was approved by the Ethics Committee in Research of the Federal University of Triângulo Mineiro under protocol number 2609/2013.

RESULTS

Records of the Multidisciplinary Integrated Health Residency team were analyzed, from the period of May 1 to October 31. There were 404 evaluations in the pediatric unit of Clinical Hospital of the Federal University of Triângulo Mineiro – HC/UFTM. From them, 59% were male and 41% female. As Figure 1 shows 143 subjects represented the classification of subjects according to age and a higher prevalence of infants.

Figure 1. Age group of hospitalized users in the pediatric unit of HC/UFTM, Uberaba. 2012.



The Table 1 shows the variety of cases in the total sample, grouped according to diagnosis of the International Classification of Diseases (ICD). The most prevalent diseases are related to the respiratory tract (n=114), followed by the osteoarticular system diseases (n=99), prematurity (n=64),

blood disorders (n=46), digestive diseases (n=29), cardiovascular diseases (n=10) and the less frequent are those related to cutaneous system diseases (n=5). The sample also presents subjects (n = 37) which the diagnosis at the time of multi-screening had not been conclusive.

Table 1. Children attending in the pediatric unit of HC/UFTM according to diagnosis grouped by ICD, Uberaba, 2012.

ICD GROUPS	N°	%
Respiratory tract diseases	114	28,2
Osteoarticular system diseases	99	24,5
Prematurity	64	15,8
Blood disorders, hematopoietic organs and immune disorders	46	11,3
Without information	37	9,1
Digestive diseases	29	7,1
Cardiovascular diseases	10	2,4
Cutaneous system diseases	05	1,2
TOTAL	404	100,0

When the months of hospitalization were analyzed among the period defined in the methodology (May to October) it was found that the highest incidence of hospitalizations was in May (21.5%) and the lowest (9.9%) in July.

Most hospitalizations (58%), assisted at HC/UFTM, comes from the city of Uberaba (Figure 2). In turn, 42% of children hospitalized in the institution come from other cities, as Uberaba is the center city of Triângulo-Sul health regions and reference for treatment of highly complex of 27 municipalities. The formation of this macro-region consists of the following cities: Água Comprida, Araxá, Campo Florido, Campos

Altos, Carneirinho, Comendador Gomes, Conceição das Alagoas, Conquista, Delta, Fronteira, Frutal, Ibiá, Itapagipe, Iturama, Limeira do Oeste, Pedrinópolis, Perdizes, Pirajuba, Planura, Pratinha, Sacramento, Santa Juliana, São Francisco de Sales, Tapira, Uberaba, União de Minas e Veríssimo.

However, it was found that 11.7% of the cities assisted are out of this macro-region such as Aguaí (n=1), Bambuí (n=1), Igarapava (n=2), Itapira (n=1), João Pinheiro (n=1), Lagoa Verde (n=1), Monte Carmelo (n=1), Nova Ponte (n=3), Nova Serrana (n=1), Presidente Olegário (n=2), Santa Fé (n=1), São Gotardo (n=2), São Sebastião do Pontal (n=1), Tiros (n=1), Vazante (n=1).

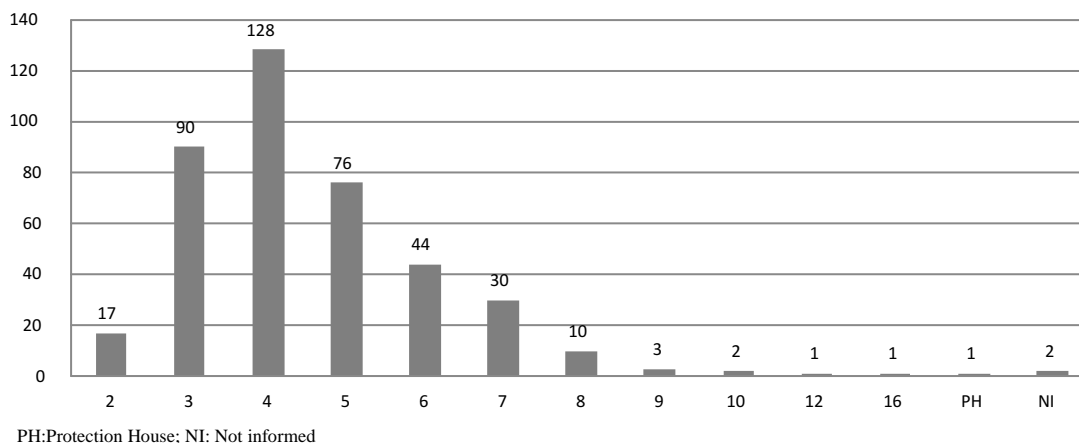
Figure 2 - Children hospitalized in the HC/UFTM according to origin. Uberaba, 2012.



As demonstrated in Figure 3, households are compounds in most cases for 4 residents (n=128), followed by 3 (n=90) and 5 residents (n=76). In one instance, the child was under guard of a protection home

(PH). In some cases (n=17) the house was composed of only two residents, that is, the child and the caregiver. In two cases, the number of residents was not computed (NC).

Figure 3. Residents per household of children hospitalized to the HC/UFTM. Uberaba, 2012.



PH: Protection House; NI: Not informed

Family income based on the minimum wage in force at the time (R\$ 622.00) is

shown in Figure 4. It is possible to see that most of the families have income of two

minimum wages (n=33.6). From the studies carried out, 38% of households receive some kind of government benefit, “Bolsa Família” or “Benefício de Prestação Continuada”.

Figure 4. Family income of hospitalized children in HC/UFTM. Uberaba, 2012.



DISCUSSION

In this study, it was sought to know the characteristics of hospitalized children and assessed by the multidisciplinary team of residents in the pediatric ward of the Federal University Clinical Hospital of Triângulo Mineiro. An epidemiological data noted in this study and presented in other studies was the males representing the largest amount of hospital hospitalization. In accordance with the study presented here, there are other investigations⁸⁻¹⁴ in which the prevalence of hospitalization for males were higher.

Another important epidemiologic data is the age and in this is survey the most frequent at the pediatric ward was infants. Other studies show that this age group is present among the highest rates of hospitalizations^{8,10,12,13,15,16}. Thus, it can be inferred a predisposition to the illness at this age alerting health professionals about the care of this population.

As for the causes responsible for hospitalizations, there are respiratory diseases, which accounted 28.2%. Other university hospitals have even higher rates. In Clemente de Faria University Hospital, the frequency of hospitalization for respiratory diseases was 36.5%¹⁰, at the Hospital of Federal University of Mato Grosso do Sul was 42.8%¹³ and at the Hospital of Federal University of Santa Catarina was 44, 8%⁸. In the Hospital of São Luis (MA), pneumonia was among respiratory diseases, being 15.56%¹⁴. However, in the School Hospital of the Federal University of Pelotas the main cause was related to the newborn diseases,

represented by 27.4% and respiratory diseases ranked second with 25.5%¹². In a similar study conducted in India, the causes of hospitalization were between gastrointestinal and respiratory diseases, each one with 23%¹⁶.

Regarding the cities of origin, it is found that 42% are not in Uberaba, and 11.7% of these are not part of the macro-region. The big cities index assisted outside the coverage area of the macro-regional Uberaba can be justified by the functioning of the State System of Care Regulation (SUS Fácil), which through the instrumentalization of flows, guarantees the population access to health services of SUS¹⁷. Another way to access may have occurred through CNRAC (National Center of High Complexity Regulation) responsible for interstate referral of patients, who require highly complex care, elective character, to another State¹⁸.

Low incomes and high household density found in the study may be related to hospitalizations particularly when observing the most prevalent age group. More precisely in relation to respiratory disorders high density family can be a cause as well as the presence of smokers in the household and those children cared by grandparents^{19,20}.

As for the more frequent hospitalization, it was found that the month of May (autumn) had more hospital records. This fact does not agree with other studies in which the period of hospitalization is higher in winter^{21,22}. It was not possible to relate it to our study because this was a biannual epidemiological analysis.

CONCLUSION

Through epidemiological knowledge of the children in the pediatrics ward and emergency room of HC/UFTM, it is possible to perform an adaptation of the services provided and can improve customer service so that the population is benefited. In addition, it is expected to be a basis for the realization of actions to promote health and disease prevention, causing users to receive comprehensive care.

Thus, it is necessary to intensify the care of children in primary preventing hospitalizations, and provide clarification to parents and caregivers of children in care with their health, and always carry out and encourage continuing education for health professionals who work in this unit, providing conditions to perform with quality care.

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CONTRIBUTIONS

All authors participated in the elaboration of the study, data collection and tables, analysis, interpretation and composing of the text. Ana Paula Espíndula led the research and reviewed the final draft of the manuscript.