SALUD COLECTIVA. 2016;12(1):97-111. DOI: 10.18294/sc.2016.870

Child nutritional status in contexts of urban poverty: a reliable indicator of family health?

El estado nutricional infantil en contextos de pobreza urbana: ¿indicador fidedigno de la salud familiar?

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ABSTRACT This work questions the premise that the nutritional status of children under six years of age is a reliable indicator of family health. To do so, a research strategy based in case studies was carried out, following a qualitative design (participant observation and semistructured interviews using intentional sampling) and framed within the interpretivist paradigm. The anthropometric measurements of 20 children under six years of age attending the local Child Care Center in Villa La Tela, Córdoba were evaluated. Nutritional status was understood as an object that includes socially determined biological processes, and was therefore posited analytically as a cross between statistical data and its social determination. As a statistic, child nutritional status is merely descriptive; to assist in the understanding of its social determination, it must be placed in dialectical relationship with the spheres of sociability proposed to analyze the reproduction of health problems.

KEY WORDS Nutritional Status; Child; Family Health; Argentina.

RESUMEN Este trabajo pone en discusión la premisa de que el estado nutricional de un niño menor de seis años constituye un indicador fidedigno de la salud familiar. Para ello, se llevó adelante una estrategia de investigación basada en estudios de casos siguiendo un diseño cualitativo (observación participante y entrevistas semiestructuradas mediante un muestreo intencional) enmarcado en el paradigma interpretativista. Además, se valoraron antropométricamente 20 niños menores de seis años asistentes al Centro de Cuidado Infantil de Villa La Tela, Córdoba, Argentina. En ese marco, entendiendo al estado nutricional como un objeto que incluye procesos biológicos socialmente determinados, se lo postuló analíticamente como un cruce entre el dato estadístico y su determinación social. El estado nutricional infantil en tanto dato estadístico es meramente descriptivo y para que colabore en el entendimiento de su determinación social debe ponerse en relación dialéctica con los módulos de sociabilidad que se proponen para el análisis de la reproducción de los problemas de salud.

PALABRAS CLAVES Estado Nutricional; Niño; Salud de la Familia; Argentina.

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INTRODUCTION

The recognition of the social existence of childhood as a well-differentiated category within humankind dates from the 17th century[1]. However, the assessment of nutritional status and/or child health status did not always constitute a medical concern. It was not until 1933 that malnutrition and diarrhea – two of the major causes of child deaths – were recognized as pediatric diseases[2]. Such events put into evidence the routine nature of death in the history of childhood up to that time, the naturalization and standardization of mortality as part of the social landscape. As it failed to represent a social or health problem, the State was not required to take action[3].

In the 18th century, the genesis of scientific medicine or biomedicine took place within the whole set of social classes, addressing living and health conditions of the population in a comprehensive fashion. This integrality, little by little, began to vanish due to the emergence and consolidation of modern scientific culture which put forward the segmentation of knowledge, reconfiguring it into disciplines around a scientist-positivist current of thought: food-fuel and body-machine, which is presented separately from its subject quality (sensitivity and cognition)[4],[5].

Within this framework, the State, supported by science, took over the educator's role in relation to the *correct manners* to feed oneself, to take care of oneself, to carry out a hygienic routine, appealing to family discipline and order[6]. Consequently, malnutrition either due to deficiency or due to excess became conceived as an a-historical, non-social and a-political *status*, having a biological and individual genesis[4]. Its etiology is based on genetics – congenital defects or family inheritance – as a predisposing factor to having a smaller or larger body size as compared with the *adequate* one, according to reference standards for child growth. This means that the inclusion in the analysis of such concepts as habits and culture, inherent to the symbolic matrix of social collectivity, is limited to an individual level subject to the field of morality, as a way of questioning mothers on their performance regarding their children's health[5].

During the 1960s, the Latin American social medicine movement was developed in Latin America as a counter-hegemonic paradigm to biomedicine, and its political-ideological flag was rooted in the intrinsic historical and social nature of people's health-disease processes[7]. Together with this current of thought, some discussions that had been initiated within the social sciences two centuries ago were restored[8], which helped posit nutritional status as *the expression of what each person eventually receives out of what is socially produced*[9].

Nevertheless, still today, there are deaths of children that go unnoticed*, no tears shed*, in dissimilar places all around the world, poverty being their common denominator[10]. Scientific medicine is still incapable of positing hunger and malnutrition as the consequences of a *social relationship* of domination or colonization, as argued by De Castro[11]. In an attempt to make contributions in that direction, in the year 2006, the World Health Organization (WHO) acknowledged that at a population level the first five years of a child's life are crucial to achieve optimal growth and development, which depends to a greater extent on nutrition, eating practices, the environment, the care and medical attention received, rather than depending on genetic or ethnic factors[12],[13]. Prior to those contributions, the critical window to guarantee a child's adequate growth and development was restricted to the time elapsed between birth and two years of age[14]. In the aforementioned scenario, health status and nutrition status of children under two years of age were considered to be the indicators of the health of the family itself, since children were the most vulnerable members within their households[6],[15].

Based on the age range proposed by the WHO, this work seeks to discuss the premise that the nutritional status of a child under six years of age constitutes a reliable indicator of their family's health. Particularly, it seeks to

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do so based in an analysis carried out in Villa La Tela[a], City of Córdoba, Argentina.

La Tela is one of the largest and oldest shantytowns in the City of Córdoba, located in the west side. The structure of its physical space reveals the presence of households with unmet basic needs, offering a clear picture of structural poverty. The local census carried out in the year 2007 showed that about 594 families residing there were engaged in the process of raising children.

METHODOLOGY

The strategy of investigation conducted was based on case studies following a qualitative design framed in the interpretivist paradigm[16],[17],[18]. As will be explained below, the two cases under review involved children from Villa La Tela selected by the comparative analysis technique based on similarities, both presenting a simultaneous alteration in two of the anthropometric indicators being evaluated with respect to the reference pattern presented by the WHO. In this way, the case studies have the potential to address the subject-matter of interest as thoroughly as possible for its holistic and contextual understanding[16]. Likewise, it should be mentioned that, with the aim of protecting the identity of the children and their families, their names were replaced with fictitious ones.

Villa La Tela was chosen because of a previous work bond (established in 2007) with the referential figures of the Community Center "Rincón de Luz," created in 1996 by a neighbor living in block No. 3. When describing where they live, the inhabitants report that they live in an *"area of 'mallines,'"* which in the Mapuche language means wet meadows, tideland or estuary[19]. In fact, this type of soil caused the crumbling of the Center's building structure in 2009, and a result of this situation, only for reasons of strict necessity, their activities had to be moved to the multipurpose room of the Center for Community Integration (CIC) [*Centro Integrador Comunitario*], a governmental building located on the corner of block No. 3. The community center ceased to operate in 2012 due to repeated conflicts with the municipal management that ran the CIC at that time.

Upon understanding nutritional status as an object including socially determined biological processes[20], it was analytically posited as a cross between statistical data (biomedicine) and a socially determined process.

Nutritional status as statistical data

As statistical data, nutritional status constitutes a complex variable since it presents four relational dimensions: biochemistry, clinical medicine, nutrition and anthropometry. The assessment of nutritional status using anthropometric measurements and indicators constitutes a valuable tool, particularly in epidemiological studies[21]. This investigation is focused on the two latter dimensions listed above.

The place chosen for the anthropometric assessment was the Child Care Center (CCI) [*Centro de Cuidado Infantil*] which operates within the framework of the Community Center "Rincón de Luz." The facility offered the community services of stimulation, care and food (lunch and afternoon meal) to children under six years of age with the aid of the funds provided by the Government of the Province of Córdoba[c]. In those days, as stated by one of the female referential figures of the Community Center, the CCI was the only organization in Villa La Tela that could provide that "*tangible food* [food assistance] *go hand in hand with intangible food* [stimulation, care]" (field note, visit to the female referential figure of the Center).

The sample universe was composed of the 35 children that attended the CCI (belonging to 27 families). To make up the samples, the following inclusion criteria were taken into account: that the child attended the CCI and that the child belonged to a family that voluntarily agreed to take part in the study, within a time limit of three home visits.

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In compliance with ethical safeguards based on the Declarations of Nüremberg, Helsinki and Tokyo, each family was visited to inform the person in charge of the children about the following: research objectives, methodological strategies, treatment, purpose and information confidentiality. In addition, a written record was left containing everything that was expressed verbally. There were 15 children (belonging to 11 families) that were not part of the sample for various reasons: four had stopped attending the CCI because they no longer lived in Villa La Tela, two did not participate because their families so decided and, finally, nine were visited more than three times without obtaining any answer on the part of their parents.

Therefore, 20 children (belonging to 16 families) were anthropometrically assessed using the new standards of growth and development presented by the WHO[13], following the measurement techniques recommended by the Federal Ministry of Health of Argentina in collaboration with the Pan American Health Organization[22]. The measurement units of the anthropometric indicators – weight for age, height for age, body mass index (BMI) for age – were expressed in percentiles, with cutoff values placed in the 3rd percentile (minimum) and the 97th percentile (maximum).

Nutritional status as a socially determined process

It proves interesting to recall Bengoa's clarification when it comes to reading statistical data. The author suggests that conceiving that children "are" malnourished puts an end to any kind of questioning and, accordingly, he wonders whether they "are or get to be" malnourished. While "being malnourished" puts an end to any type of problematization, "getting to be malnourished" opens such problematization[3]. As Marx stated, quoted by Breilh: "The history of nature and the history of men are mutually conditioned," in a relationship that is dialectical and non-deterministic in either direction[20].

In that sense, to be able to understand the construction of child nutritional status, the anthropometric data obtained was put in relationship with the historicity of its production/reproduction based on the modules of sociability proposed by Samaja for the analysis of the reproduction of health problems of human societies: bio-communal (family), communal/cultural (Villa La Tela), political/state-related (opened to other institutions, to the university, to the State), economic/societal (market)[23], all of which place emphasis on both material living conditions and the existing network of bonds. One of the nodal concepts of the analytical model proposed by the above-mentioned author is *epigenesis*, which comes from the embryology field and refers to development processes that go through stages. Every new stage is created over a previous one. In fact, epigenesis refers to the formative development arising, recursively, over previous results, integrating itself deep inside (assimilation, according to Piaget) and re-signifying it (accommodation, according to Piaget).

Regarding the monitoring of the growth curves of the children, as there was no access to their respective clinical records, we resorted to maternal memory in order to identify tendencies (growth lines parallel to the median, flat lines, or lines with mild or pronounced increases/decreases) that could make it possible to interpret the measurements made. The mothers were asked about their memory of specific situations throughout the child's lifetime that they may have marked as the beginning of a change in their weight or height, and also if there was a recovery or stagnation of such body measurements over time.

The preexisting relationship between the researcher and the members of the family made it possible to prevent the data about nutritional status constructed from being impersonal. The connections inherent to the *social construction of child nutritional status* were outlined by crossing information obtained through the following techniques and stages of investigation:

a. *Field entry stage:* Semi-structured interviews with seven women in charge of community

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organizations, one referential figure of school tutoring, a health care promoter, a doctor and a social worker of the health team, a psychologist in charge of a social food program being implemented locally, a social worker belonging to the Center for Community Participation (a municipal agency) and two head authorities of state-run educational institutions in the area. The composition of the sample was intentional. The themes of exploration were: history of the Villa, living conditions, perception of the local problems, how daily family eating is organized and the reasons for this, and eating-related activities planned by the local organizations.

b. *Anthropometric assessment stage:* Participant observation was carried out in each visit to the CCI, during food preparation and meal supplies provision, eating (commensality), recreation and stimulation activities; in the immediate neighborhood context, emphasizing the everyday dynamics among neighbors, in the gatherings held at local institutions and organizations and in several festivities (such as the Children's Day and Family Day); and in home meetings with certain families of the children attending the CCI. The latter interactions made it possible to avoid third-party mediations in order to learn how the families live and interact in their daily lives and, above all, in developing bonds of trust within an extremely intervened community, as is Villa La Tela, where the outsider asking questions (doctor, social worker, nutritionist) is doing so to evaluate whether to remove or give (resources, guidelines, courses of action); that is why the answers – in many instances – could be adapted to what is thought to be ideal, in this opportunity, by the nutritionist[24]. In turn, those interactions helped to observe the relationships established between the construction of child nutritional status and the body of other family members, particularly mothers.

Considering that *the way* families *eat* is in a dialectical relationship with *the way they live*, between the years 2008 and 2011, during the time the interaction lasted, quali-quantitative data obtained from secondary sources were introduced (population censuses, journalistic articles, local and academic works about Villa La Tela).

The ensuing analysis of the primary and secondary data was based on the postulates of grounded theory or constant comparative method[25], starting from the information obtained during the field work, that is to say, from the nutritional status as *statistical data* so as to frame it in its *process* nature. In order to give materiality to the relationship between what is biological and what is social, the cases of the children named Juan and Antonio were specifically considered.

RESULTS

Nutritional status as statistical data: anthropometric diagnosis

The ages of the anthropometrically assessed children ranged between 19 and the 67 months, presenting a homogeneous distribution by sex (50% male and 50% female).

The *weight for age* indicator showed that 17 children (85%) were within the normal range (between the 10th and 90th percentiles), while the other three children (15%) presented *risk of underweight or emaciation* (between the 10th and 3rd percentiles). The malnutrition due to deficiency reflected by the *weight for age* indicator showed that three of the anthropometrically assessed children had not reached the body mass appropriate for their chronological age.

The *height for age* indicator showed that 18 children (90%) presented a normal size for their age (over the 3rd percentile), while in two children (10%) values below the 3rd percentile were recorded, that is to say, presence of *small size or shortening*. In effect, malnutrition due to deficiency expressed using the *height for age* indicator showed that two children could not attain an adequate linear growth relative to their chronological age.

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The *BMI for age* indicator showed that 14 children (70%) presented a normal nutritional status (between the 10th and 88th percentiles); two children (10%) accounted for a nutritional status at a *risk of underweight* (between the 10th and 3rd percentiles); and four children (20%) showed a nutritional status evidencing *malnutrition due to excess*. In that respect, two of them (10%) showed *overweight* (between the 85th and 97th percentiles), while the other two (10%) showed *obesity* (over the 97th percentile). It is therefore understood that the malnutrition yielded by the *BMI for age* indicator is due both to deficiency (two children) and excess (four children), the latter having the greatest prevalence.

Hence, if the findings obtained are reconsidered for each indicator: a) 55% (n = 11) of the children under assessment present a nutritional status that in its anthropometric dimension is appropriate for their age and sex; and b) 45% (n = 9) suffers from some kind of malnutrition expressing values outside the normal range based on the applicable indicator (Table 1). Cases of children showing the coexistence of malnutrition due to deficiency and due to excess were not evidenced.

In a complementary way, the staff at Primary Health Care Unit (UPAS) [*Unidad Primaria de Atención de la Salud*] No. 31 reported that even though the prevalence of underweight at birth is very low inside its programmatic coverage area (Villa La Tela and bordering zones), with respect to the anthropometrically assessed children, one was prematurely born weighing 1.800 kg; however, at the moment of the anthropometric assessment, the child presented normal parameters (evidencing adequate catch-up growth).

Nutritional status as a process: statistical data within the framework of the capitalist economic system and physical and neighbor-interaction space

At a global scale, the intertwining of nutrients, energy, foods and bodies constitues itself as the cartography that (re)maps the current geopolitics of hunger[11]. If we adhere to Fischler, an "eater" is constructed by eating[26]. Yet, in a capitalist society (or a class society), food is a good whose appropriation will differ according to an individual's ability to pay. This appropriation is not only of energy and nutrients, but also of the possibility of forging meanings. Therefore, geopolitics finds in the relationships of social domination the ignominious causes of hunger, reflecting them in definite territories. As far as our case of interest is concerned, such social asymmetries are expressed in Villa La Tela.

In 2003, the Primary Health Care Unit was created at a local level (UPAS No. 31). At that moment, an emblematic group of professionals moved into the Villa, with a well-marked community profile aligned with the postulates of Latin American social medicine and, at the same time, great acceptance on the part of the inhabitants, which fostered a bond of trust. Such qualities enabled users to pay visits – with or without scheduled appointments – to talk about worries and to clear up doubts of diverse natures, not only associated with health. Between the years 2010 and 2013[d], there was a high staff turnover within the health team due to political-ideological reasons, basically due to disagreements with the municipal management in power in relation to the *ways of providing health care* across neighborhoods.

For that reason *walking the Villa*, an activity which characterized them as a health care institution, was no longer possible, and consequently the contact with families that did not regularly come over the UPAS was lost. From 2010 to late 2011, when the fieldwork of this investigation came to an end, whenever a family received the diagnosis of any child pathology – malnutrition, among others – the knowledge was *confined* within the individual/family sphere, limited by the impotence of not knowing what to do; when, paradoxically, there is a public health system that has the responsibility for giving answers.

In the presence of diagnoses of child malnutrition, the actions of the former

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Table 1. Anthropometric nutritional diagnosis of the children attending the Child Care Center of the Community Center "Rincón de Luz," Villa La Tela, City of Córdoba, Argentina, 2011.

Case number	Family number	Fictitious name	Age in months	Nutritional status
1	1	Karen	63	Eutrophic
2	2	Martín	64	Eutrophic
3	3	Sebastián	55	Eutrophic
4	4	Tatiana	38	Malnutrition due to excess[3]
5	4	Celeste	58	Eutrophic
6	5	Matías	34	Eutrophic
7	6	Antonio	43	Malnutrition due to deficiency[11]
8	7	Brenda	62	Malnutrition due to deficiency[12]
9	8	Mariano	38	Malnutrition due to excess[3]
10	8	Darío	67	Eutrophic
11	9	Margarita	61	Eutrophic
12	9	Andrés	43	Eutrophic
13	10	Adrián	51	Malnutrition due to deficiency[2]
14	11	Fernando	30	Eutrophic
15	12	Candelaria	60	Malnutrition due to excess[4]
16	13	Juan	55	Malnutrition due to deficiency[1]
17	14	Alma	54	Eutrophic
18	15	Otilia	33	Malnutrition due to deficiency[2]
19	15	Cristina	50	Eutrophic
20	16	Luisa	19	Malnutrition due to excess[4]

Source: Own elaboration.
[1] *Weight for age*: underweight risk; *height for age*: short height
[2] *BMI for age*: underweight risk
[3] *BMI for age*: overweight
[4] *BMI for age*: obesity

health team were oriented towards the search for alternatives that helped the family to find food-service-resources available in the framework of State assistance: certificates were provided for food reinforcements in school dining rooms; advice was given in order to have access to social food programs at all government levels (school meals, food modules for children with celiac disease and/or underweight, magnetic cards for food purchases); the frequency of health check-ups was increased; enrollment of children with malnutrition was expedited in the community kitchens located in the neighborhoods; and food counseling was offered with previous knowledge of the material living conditions and cultural family traditions.

In this sense, that health team upheld that the main determination of child malnutrition is poverty, since it gives limited possibilities of action for the families. And, in turn, when referring to the nutritional status of the children within their programmatic area, they emphasized that:

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> *... a child's appearance is an extension of the conditions in which they live [...], and as a result of the same family nutrition we have children with overweight/ obesity and malnutrition.* (Interview with a doctor at the local UPAS, 2008).

Such an assertion takes into account that on rainy days they get muddy; that in winter it gets difficult to heat the home; that the construction of their houses, in addition to earthen floors, presents the aggravating circumstance of humidity which has great bearing on predisposition to respiratory diseases; that the garbage dumped on the streets causes the presence of a great number of rodents; that since there are no curbs or gutters, water stagnates in ditches in the street, which favors the formation of breeding sites of larvae, mosquitoes, insects.

In view of the aforementioned factors, this doctor at UPAS No. 31 discussed with his colleagues *"what can be done in the presence of child malnutrition in this Villa?"* After long debates, the answer ended up being: *"nothing."* The causes were found outside *child biology* and regrettably their professional scope of action had a limit. Even though some referential community figures highlighted as an explanatory premise of child malnutrition the presence of parasites that *"eat up the children on the inside,"* the health team found their limit expressed in the impotence created by those *parasites* understood in metaphoric terms, that is to say, the ones inherent to the economic-political neoliberal capitalist system. External *parasites* that take for themselves every kind of socially available energy necessary to produce and reproduce everyday life and the interactions it entails. *Parasites* that condemn families to poverty and to construct themselves in the role of beneficiaries of state-run programs to survive, that is to say, to inhabit a world determined by someone else located outside of the neighborhood, thus configuring bodies colonized by their own need to solve their material conditions of existence.

Nutritional status as a process: statistical data in the framework of family ties and the child growth curve

As previously mentioned, the examples taken were those of Juan and Antonio, since in both cases a simultaneous alteration was observed in two of the anthropometric indicators assessed: low values relative to *weight for age* and *height for age* with respect to the reference pattern presented by the WHO.

Juan's mother has two children and lives with her partner in Villa La Tela. When conversing with her about the growth curve of one of her children, she commented:

> *...the weight of* [Juan] *was low up to last month, but he never weighed a lot. His height stays the same, 96 cm. The doctor says that because of the problem he had when he was born, because he had an operation a few hours after he was born, he's not a child that is going to weigh what he has to weigh. He's three and a half years old and weighs 11.500 kg, he doesn't weigh what a child of three should weigh...* [Juan] *has had chronic pneumonia since he was born. From the moment he was born I was supposed to take him to the nutritionist and I never did, not because I didn't want to but because sometimes I didn't have a cent... to get to the Children's Hospital.* (Interview with Juan's mother, 24 years old, 2010)

In Juan, a 2.830 kg increase in weight is evidenced during a period of approximately a year and two months: in the year 2010 his recorded weight was 11.500 kg, while in 2011 it was 14.330 kg.

His growth curve shows a change in the *weight for age* indicator, from below the 3rd percentile (underweight) to the area between the 3rd and 15th percentiles. On the contrary, regarding the *height for age* indicator, even though Juan's height increased 2 cm in one year's time (from 96 to 98 cm), a descending trajectory is evidenced in terms of the growth

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area, moving from that included between the 15th and 50th percentiles to being positioned below the 3rd percentile.

From the public health system, when outlining possible causes for his small size, the presence of some base pathology was suspected, particularly celiac disease. During the time that the corroboration process of this diagnosis lasted, very long periods between appointments were observed; however, inside the family system, the following occurred:

a. The *alleged* diagnosis is commented to his mother, who finds it hard to understand the biomedical denomination, but she is also afraid of asking questions and opts to clear up her doubts about such a "strange name" by consulting her neighbors. One of them told her that she was going to find out on the Internet at the Web café of the closest gas station.
b. In turn, she is given the eating guidelines to be followed, including: lactose-free milk and gluten-free food consumption. This situation occurs without anyone first inquiring about the concrete possibilities of carrying out the guidelines. The mother is not asked about her material living situation or how the family eating routine is organized.
c. Upon the suspicion of a celiac disease diagnosis, she is told that her child should be withdrawn from the neighborhood community kitchen, because in those places they only cook for healthy people, and wheat (and its by-products) turns out to be the staple of the culinary preparations due to its low cost, high efficiency and cultural acceptance. For his mother, having the food from the community kitchen was a resource considered to be an "achievement" (having earned that focalized aid), as well as a "relief" (the certainty that her son would have something to eat).
d. Paradoxically, as the diagnosis is not yet confirmed, she does not have the certificate to enforce her *right to a special diet* within the framework of the school meal program[e] or to be given the food module provided by the provincial Government[f].
e. The mother stops treating her own disease (a special diet for chronic kidney insufficiency) in order to save money to buy the food that Juan needs to undergo a gluten-free diet, and also to conserve her energy so as to focus on the careful follow-up of her child's growth.

As a result of these events, the mother expresses that she is "*distressed*" and, above everything, she is afraid "*to be doing something wrong as a mother*."

On the other hand, the situation of Antonio, the other child being assessed, is different. In his case, there is no suspected base pathology. His mother cannot remember the exact weight and size registered in prior health checkups of her son, but she suggests that in general terms the growth curve relative to the *weight for age* has showed mild increases and decreases, anchored in the area of underweight. According to this woman, who lives in Villa La Tela with her husband and two children, sharing a plot of land with her sister's family:

> *He* [Antonio] *is underweight by nature, he gains a little weight but goes back to the weight that he had before*. [...] *I asked the doctor why... but it must be that he has relatives with skinny bodies, it must be that he is stretching out too much* (Interview with Antonio's mother, 21 years old, 2011).

However, that *stretching out too much*, as the mother claims, does not amount to a considerable growth in relation to his *height for age* that enables him to get out of the area below the 3rd percentile.

Antonio's mother (three months pregnant) and his father would walk every day to a bakery located 50 blocks away, where they would be given the bread from the day before. This family was the only one to expressly discuss "*going out to ask for things*," "*selling what they collect*" (anything that could be bought by another person) and that requested from the researcher "*the need for material aid*." Likewise, they expressed that

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"*if there was an extra coin*," they saved it as "*spare money*" to take their son to the hospital in the event any emergency happen beyond the schedule of attention at the local UPAS (7 am to 2 pm). To this family, the community kitchen was vital: "*The community kitchen is everything*." When it was closed, the only option they had was tea with bread.

In this scenario, the mother knew for certain the reasons why her son did not gain weight: without food there is no possibility of a body constructing itself, especially during the first stage of childhood, which is the time window for optimal growth and development. This testimony specifically unveils the social construction of malnutrition expressed in Antonio's body as a result of living in conditions of material deprivation.

> *...I tell the doctor because... when I have something I feed him but when I don't have anything, he spends the day without eating until the following day. That could be the reason why he doesn't gain weight. A day that they* [the children] *don't eat, they don't gain weight.* (Interview with Antonio's mother, 21 years old, 2011)

Both Juan's mother and Antonio's mother in their roles as caretakers, regardless of the nutritional status of their children, are an accurate representation of the adult female gender of the Villa. When shortage – in a broader sense: nutrition, habitat, work, transportation, health, clothing – is a constant element of the family landscape and neighborhood, one must choose within the family *who* will be *benefited* and in what aspect. From such a perspective, the doctor interviewed at UPAS No. 31 reported that all family members "*endure violence*" for having to live where they live, apart from the ordeals that adults – mainly women – have to go through to give their children something to eat. The focalization strategy of the state-run social programs, deepened since the 1990s, is put in action again in the inner heart of families; however, now it is not an integral part of any programmatic guideline, but a constituent mechanism of the strictly necessary *adjustment* between what comes in as a result of *female management, state subsidies,* and *work remuneration* and how it is distributed among all of the members of the family unit. The premise that supports the election of the *beneficiary* in these families is determined, principally, by being *the youngest of the household*.

> *... he* [Juan] *had to drink thick milk and it was too expensive for me [...] and it's not that I don't want to, I can't. Each little jar of milk was 40 pesos and with that money everyone in the house eats for a whole day, and I couldn't. I bought it for a month and it was such an effort, because* [Juan] *would have that and Bianca* [the other daughter] *would have it too, although she didn't like it, because I couldn't make two different things to eat. And we* [she and her husband] *preferred for them to eat and we would have some tea...* (Interview with Juan's mother, 24 years old, 2010)

However, "*when there isn't any*" specially-designed menu to offer, for instance, in the case of the nursing babies (especially during the first year of age), they are *obliged* to eat the same as the rest of the family, thus introducing them precociously into adult nutrition. When talking to many of the male parents, it appears a feat worthy of pride that the child at a very early age (months old) eat barbecued beef and very seasoned stews, expressing how the qualities of the food are transferred to their eater. Both culinary preparations are identified with a *hardworking body* and, therefore, it is desired that their condition of *strength* be transferred to the children to protect them and guarantee their healthy growth.

DISCUSSION

At this point it proves important to return to something that we mentioned

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earlier: nutritional status is an object that includes socially determined biological processes[20]. In that sense, we tried to include in the analysis of child nutritional status all material living conditions, the framework of family and neighborhood ties (modules of sociability), in a "direct" way, in the same way every constituent dimensions is taken in account: clinical medicine, biochemistry, nutrition and anthropometry. With respect to this latter dimension, the following limitations should be highlighted: the results found in the anthropometric measurements of the children are not representative of the universe of children of Villa La Tela; and the fact that we had no access to child medical records to gain knowledge about their respective growth curves led us to resort to their mothers' memory, which revealed apparent memory bias.

Considering that the word "indicator" etymologically derives from Latin and means *that which serves to understand something*, and considering that family health is a process that expresses how the socio-historical and biological dynamics among society-family-child have been weaved *epigenetically*[27], the following question remains: Does the description of the anthropometric indicators serve to understand the complex social process of construction of child nutritional status in the heart of a family-society, or is it necessary to problematize it in the light of modules of sociability?

From that perspective, De Castro[28] is one among many thinkers that posits the intrinsic relationship existing between body size and environmental conditions. In this way, he allows for an account of how the social, political and historical context in which populations live operates, molds, opens or closes the windows for body growth/development. In other words, the author argues that nutritional status, in its condition of statistical data, expresses what out of that which is socially produced ends up in the hands of each person.

> What is called "race" is, at the end of the day, a little bit inheritance and a great deal adaptation to environmental conditions: either good or bad. In that way, the small size of populations that inhabit tropical regions, rather than a racial characteristic, is the consequence of low protein intake. [28 p.20]

Therefore, following such arguments in a way complementary to the production of the statistical data about nutritional status makes it possible to historicize how the body of each child assessed anthropometrically has been socially constructed. And, in this way, we agree with Bronfman[29] in that the structure and dynamics of the family, understood as a system, molds their production and reproduction. In that sense, in Villa La Tela the relational fabric between the family-child and the society frames the scenario of child rearing and body construction in the material deprivation of conditions of existence resulting from poverty. This means *"managing to get by as you can"* as regards care, nutrition, hygiene, education, thus unveiling a non-existent sphere of election that comes from a position of domination/subordination (asymmetry) in relation to the social distribution of power, knowledge and goods within the society[29]. In addition, Scheper Hughes maintains that in explanatory terms a single example (an "n" equal to 1) dramatically contributes to demographic investigation[30]. For that reason, we took here Juan's and Antonio's cases to give an account of the complex fabric of family – and neighborhood – practices that are behind a child nutritional diagnosis.

In this way, the backdrop of child nutritional status is made up of the eating and nutritional adjustment practices that happen in the bodies of those who are not given priority in the families, that is, the adults. As a corollary, one should wonder, given the particular features of Villa La Tela, and unlike the arguments presented by Bronfman[6] and Sandoval Priego *et al*. [15], whether the nutritional status of a child under six years of age, who is given priority at the time of eating, is a reliable indicator of the health status of their family, and whether it is sufficient to

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look at that child analytically or whether that view should be broadened.

"Having to give priority to someone" means that one has to take special considerations regarding the distribution of food inside the family because *"from the beginning, there isn't enough for everyone,"* in addition to restricting the discussion to "food itself." This category of food is placed, in culinary terms, outside the territories of pleasure and nutrition, apart from being unanchored to what is culturally eligible as good to eat[31]. The situation of adjustment on the part of some members to benefit others produces family and individual maladjustments (due to unequal opportunities in the appropriation of nutrients), since these inter-generational practices of learning and socialization are not spontaneous, but rather accompany the eating-nutritional history of these families[32].

The concern for childhood and its centrality in the family unit derives from the valorization of children's lives which, as noted at the beginning of this work, has not always been this way. The counterpart is established in the construction of the role of the woman-mother as the person responsible for the child's socialization and health, as well as the actions of prevention, curing and family care in general[29]. For that reason, if one raises one's gaze, in the immediacy of a child's body is the body of the woman-mother. The social presentation of women-mothers, in the eyes of the health team or the educational institutions, receives descriptions that serve to explain their survival: *"aged, toothless, fat but undernourished"* (Interview with the principal of the local school, 2009).

Fortes, in an investigation conducted in Africa, recognizes in the "eating sacrifice" a mechanism of solidarity[33]. If we go back to the case of Juan's mother, sacrifice was the only way (and solution) to give central priority to the clinical-nutritional attention of her son's condition and to bear, at the same time, that inevitable moral condemnation. There have been several studies conducted in contexts of poverty[6],[34],[35],[36] whose findings reveal that, at the time of food distribution inside the family, women are the last to eat, only *"if there are leftovers," "if there is enough."* This threatens the preservation of physical and emotional health, being worse during pregnancy.

In view of the foregoing, child nutritional status as statistical data is merely descriptive. In order for it to be useful in the understanding of its social determination, it should be presented in a dialectical relationship with the above-mentioned modules of sociability. From that perspective, Hintze[34] maintains that analyzing "the eating aspect"[g] only from the nutritional point of view (nutritional status statistics) impedes seeing that what is biological is in a dialectical relationship with what is social. As a result, social (and hence health) inequalities get naturalized, and malnutrition is conceived as a status of a-historic, non-social and a-political nature, having a biological and individual genesis. Consequently, the possibility of problematizing the fact that to a great number of families worldwide the result of their eating-nutritional reproduction is translated into hunger and malnutrition is occluded. Hence, the author provocatively invites us to move from the description to the explanation of eating-nutritional problems[9]. Actions will be put into practice depending on how the nutritional status is conceived, but none of them should be stripped of political-ideological implications[20].

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FINAL NOTES

a. The name Villa La Tela comes from the fact that the neighborhood abuts the wire mesh [*tela de alambre*] of the School of Air Force Petty Officers of the Province of Córdoba and runs the length of the fence. The wire mesh has historically operated as an element of georeference to offer information on spatial locations among neighbors and people from outside the neighborhood. Structurally speaking, it comprises a total of 22 blocks, located in two rows of 11, which are crossed by the main street Avenida Fuerza Aérea Argentina or Route 20 (which separates it from Villa Adela), Sargento Gómez and Francisco Arteaga (which separate it from the neighborhood Barrio San Roque), and Aviador Valenti (which separates it from the School of Air Force Petty Officers).

b. Up to the date on which it closed, it received funding from two state sources. One was from the Ministry of Social Development of the Government of the Province of Córdoba, from the year 2007 to 2012, allocated to the operation of the Child Care Center (CCI). The other was provided by the Federal Ministry of Social Development, from the year 2003 to 2012, allocated to the operation of the community kitchen service, which offered around 180 daily meal supplies (from Monday to Friday) for dinner. This organization carried out other cultural activities, such as a project of *murga* [a popular music style involving dancing in the streets] and an institutional library. These initiatives were supported and enriched through contacts with certain teaching chairs of the School of Psychology, the School of Social Work and the School of Nutrition of the Universidad Nacional de Córdoba (in the framework of scholarships of continuous education, undergraduate final research papers, pre-professional training practice or programs for community intervention).

c. Funding was provided by the Program of Child Care and Family Promotion Centers of the Ministry of Social Development of the Province of Córdoba. It became effective in 1984 during the government of Eduardo Angeloz who belonged to the political party Unión Cívica Radical (UCR). Its objective was focused on offering comprehensive care to children aged 0 to 4, through the creation of child care centers in neighborhoods in conditions of poverty and social segregation. The above-mentioned comprehensiveness defines the nature of what is to be included in its services, directed towards: a) adequate child growth and bio-psycho-social development (education, nutrition, eating, health and recreation are some of the components); b) a shared responsibility – family and State – in the child rearing process; and c) an intentional search of articulations with other organizations/institutions of the society. A sum of money is given per child to cover the following: food, fuel to cook and cleaning products. In a supplementary way, the money is also used for the purchase of stationary items and the payment of scholarships to cooks, educational stimulation staff and teaching assistants. It should be highlighted that this program places particular emphasis on the contributed community organization, in order to complement what is financed by the Ministry in all the above-mentioned components, a circumstance which is not so favorable – and is even ludicrous – for grassroots organizations inserted in a community in a situation of structural poverty, like Villa La Tela. The Child Care Center of the Community Center "Rincón de Luz" extended the age range of the children given the needs of the families living there.

d. Through comments by people closely related to the Primary Health Care Unit (UPAS No. 31), we were able to learn that, in the year 2013, a permanent group of professionals with experience in community service was consolidated.

e. The Program of Integral Assistance of Córdoba (P.A.I.Cor) [*Programa de Asistencia Integral de Córdoba*] was implemented in the 1980s, upon the return to democracy in Argentina, in order to tackle the "crisis," as a support to the nutrition of children, young people and adults studying in state-run schools. It offers a main meal (lunch) and a secondary meal (breakfast/afternoon snack) depending on the school shift attended (morning/afternoon); as it has a focalized nature, the beneficiary's family has to prove their condition of poverty.

f. The provincial program "Helping to Grow" [*Ayudando a Crecer*] has a focalized approach; its beneficiaries are those people with nutritional risk, including children, pregnant women or young people, detected by the public health system. The nutrition aid involves a box or module of dry food supplies containing: oil, salt, flours, legumes, sugar, milk, *yerba mate* [dried leaves for having a traditional hot infused drink called *mate*] and tea. Likewise, it takes into account people with celiac disease to adapt the food box or module to this pathology (gluten-free diet).

g. Following Hintze (9), this concept should be understood as the articulated set of family practices and processes, its rules, products and consequences, encompassing everything from the natural goods based upon which the ingredients for the elaboration of food is produced to the exchange, appropriation, and consumption of the aforementioned food/meals and their consequences in an individual's health.

ACKNOWLEDGEMENTS

This work is the product of two investigations: "*The relationship between the nutritional status of the children attending the Center of Child Development 'Rayito de Sol' of Villa La Tela, and the safety level as perceived by their families,*" carried out in 2011, in the framework of the Undergraduate Degree in Nutrition, offered at the School of Medicine, Universidad de Córdoba; and "*Eating-Nutritional Reproduction of the families from Villa La Tela, Córdoba,*" carried out in 2013, as part of the Doctoral Degree in Social Studies of Latin America, Center of Advanced Studies, National University of Córdoba, with the contribution of a scholarship granted by the National Scientific and Technical Research Council (CONICET) [*Consejo Nacional de Investigaciones Científicas y Técnicas*]. We are grateful to the families living in Villa La Tela whose children were anthropometrically assessed, and to the work team of the Community Center "Rincón de Luz" and to the local health team that worked in the Primary Health Care Unit No. 31 during the period 2003-2010.

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CITATION
Huergo J, Casabona EL. Child nutritional status in contexts of urban poverty: a reliable indicator of family health? Salud Colectiva. 2016;12(1):97-111.

Received: 16 June 2015 | Revised: 20 October 2015 | Accepted: 24 November 2015

This article was translated by Mariela Santoro.