

THESIS & DISSERTATIONS
Postgraduate Program in Food, Nutrition and Health

VERONA, Luciana Drummond Paz. *Comida auwe, comida waradzu e ressignificação: o sistema alimentar dos Xavante da aldeia Nossa Senhora de Guadalupe, Mato Grosso*. 2009. 132 p. Dissertação (Mestrado em Alimentação, Nutrição e Saúde) – Instituto de Nutrição – Universidade do Estado do Rio de Janeiro, Rio de Janeiro, 2009. *Orientador*: Silvia Ângela Gugelmin

Recognizing the lack of information about the diet of the Xavante as well as the subjectivity associated with it, the topic of this dissertation is the dietary system of the Xavante who live in the Nossa Senhora de Guadalupe village located inside the Terra Indígena (TI) São Marcos, Mato Grosso, Brazil. We intend to discuss specific practices related to the diet of the members of this community, showing the limitations of purely biological and medical approaches in contrast to the beneficial relationship between nutrition and the social sciences to produce relevant and contextualized information useful to health professionals. Because the diet of a culture is a complex subject, we pursued appropriate theoretical and methodological resources to explore such cultural richness, in this case, ethnography. To organize the empirical material we used the five phases of dietary activities proposed by Jack Goody in the book *Cooking, Cuisine and Class*. We describe how the Xavante produce, distribute, prepare and consume their food and how they dispose of their garbage. Included is a discussion of the Xavante diet reflecting traditional and new practices as well as contemporary adaptations. The Xavante of the Nossa Senhora de Guadalupe Village, as in any other society, possess a consistent cosmology related to their diet and the way they deal with the transformations inherent to the process of social interaction with non-indigenous society. We understand that any intervention in the health education of the residents of the village should consider unique aspects of Xavante thought and its local peculiarities in order to respect their cultural values and the previous transformations that have already been incorporated by the group.

Key words: Food system; Diet; Xavante; Transformations; Indigenous peoples

TROTТА, Paula Affonso Ferreira. *A Inibição do pico da secreção de leptina aos 30 dias reverte as alterações metabólicas em ratos programados pela leptina na lactação*. 2010. 73 p. Dissertação (Mestrado em Nutrição, Alimentação e Saúde) – Instituto de Nutrição – Universidade do Estado do Rio de Janeiro, Rio de Janeiro, 2010. *Orientadora*: Magna Maria Cottini da Fonseca Passos. *Coorientador*: Egberto Gaspar de Moura.

Hyperleptinemia during lactation programs for higher serum leptin in 30 and 180 days old rats, higher body mass and related metabolic changes. Our aim was to evaluate the inhibition of serum leptin at 29 and 30 days old on the metabolic phenotype of rats programmed with leptin during lactation. Pups from Wistar rats were saline-injected (C) or leptin-injected (L – 8µg/100g BW) from 1 to 10 postnatal days. At 29 and 30 days old the animals from both groups were injected with anti-leptin antibody (3µg/100gPC – LA and CA) or saline (LS and CS). The higher visceral (VFM) (+53%) and total fat mass (TFM) (+33%), hyperleptinemia (+67%) hypertriglyceridemia (+47%) and lower adiponectinemia (-44%) observed in LS group compared to CS were prevented by immunoneutralization of leptin, since LA group had those parameters values similar to CS group. However, the immunoblockade of leptin in normal animals led to the same metabolic changes seen in leptin-treated animals, in addition to a lower serum adiponectin (-74% versus CS) and higher insulin resistance index (+37%). Hepatic SIRT1, a histone/protein deacetylase, was higher (+41%) only in LA group, suggesting a role for SIRT1 and possible epigenetic mechanisms in prevention of leptin programming. Therefore, our data suggest that one week after weaning is also a critical period for metabolic imprinting and that either lack or excess of leptin programs for unfavorable metabolic phenotype at adulthood. Remarkably, inhibitions of hyperleptinemia effects in 30 day-old rats abolish most of the leptin-programmed unfavorable metabolic phenotype, which represents a promising strategy for prevention or treatment of these metabolic dysfunctions.

Key words: Leptin. Hyperleptinemia. Programming.

ALVES, Kelly Poliany de Souza. *Promoção de Segurança Alimentar e Nutricional na Estratégia Saúde da Família: uma aproximação a partir da escuta de diferentes atores sociais*. 2010. 117 p. Dissertação (Mestrado em Alimentação, Nutrição e Saúde) – Instituto de Nutrição – Universidade do Estado do Rio de Janeiro, Rio de Janeiro, 2010. *Orientadora*: Inês Rugani Ribeiro de Castro. *Coorientadora*: Shirley Donizete Prado

Ensuring Food and Nutrition Security (SAN) refers to the need for intersectoral action to articulate the components of food and nutrition, beyond the contemporary question of sustainability and perspective of the human right to adequate food. The health sector has specific and important functions that contribute to the set of government policies directed toward the guarantee of the SAN the population. Thus, actions that promote SAN should be developed at all levels of attention of the Unified Health System (SUS) and the Primary Health Care through the Family Health Strategy (ESF), an ideal forum for implementing such actions, since it is configured as the preferred port of entry for users in the health system and as the center for directing the support network. This is an exploratory and descriptive study of qualitative boarding that aimed at knowing what the professionals of teams of health of the Family, managers of the federal and municipal levels related to ESF, as well as representatives of civil society organizations working in the field understand on SAN and on practices SAN promoters in ESF. The construction of the information occurred by means of half-structuralized interviews and focal groups. The professionals referred to a SAN as a guarantee of food that meets nutritional requirements and is safe for consumption, while among the representatives of civil society organizations and managers prevailed a broader understanding of SAN. The different actors had identified the ESF with a promotional space of SAN from the survey of developed actions already or that they can come to be developed, but the actions cited are mainly related to nutritional dimension of the SAN. The actors reported a set of structural problems that trigger difficulties in the daily organization of services and practices of professionals and hence the implementation of actions that promote SAN that strategy. This work raised the necessity to spread out the interdependence between health and SAN between on managers and professionals to the ESF so that these can better identify in the actions of the health services promotional elements of the SAN, and in such a way to understand its paper of promotional agents of health and SAN.

Key words: Family Health, Primary Health Care, Food and Nutrition Security.

RÊGO, Ana Lúcia Viégas. *Imagem corporal, estado nutricional e sua associação com autoestima corporal em adolescentes*. 2010. 74 p. Dissertação (Mestrado em Nutrição, Alimentação e Saúde) – Instituto de Nutrição – Universidade do Estado do Rio de Janeiro, Rio de Janeiro, 2010. *Orientadora*: Claudia de Souza Lopes.

In adolescence, biopsychosocial and cultural factors contribute to the occurrence of changes in perception and satisfaction with body image and inappropriate nutritional conditions, and may influence the body esteem of adolescents. The aim of this study is to assess the association between self-perception of body image and nutritional status with body esteem in adolescents, according to sex and age groups. A cross-sectional study conducted with 305 teenage students at a public school in Rio de Janeiro, with 174 males and 131 females, aged between 10 and 18 years was developed. The dependent variable was body esteem, and as independent variable, body image and nutritional status. For the evaluation of body esteem in the domains "appearance", "weight", "attribution" and total body esteem, we used the Body Esteem Scale for Adolescents and Adults (BESSA); and for self-perceived image we used the Contour Drawing Rating Scale, both validated for Brazilian adolescents. The body mass index (BMI) and waist circumference (WC) were used to evaluate nutritional status and as continuous variables. The collection was made in 2009 through the application of a self-administered questionnaire to adolescents and assessment of their anthropometric measurements (weight, height and waist circumference) by trained professionals, according to pre-established norms. We applied the chi-square test (χ^2) to compare frequencies and Student *t* test and ANOVA for comparison of measures (averages and standard deviations) found. We performed a simple linear regression to determine the degree of association between variables. It was considered a significance level of $p < 0.05$ for all tests. All analyses were stratified by sex and age groups. In both sexes and age groups, the higher the silhouettes (current figure) of adolescents, the lower were the scores of body esteem, and these results are more significant in female adolescents aged 14-18 years. BMI and WC were mainly associated with body esteem in the field "weight", while the WC is stronger in male adolescents and BMI in adolescent females from 10 to 13 years. In conclusion, low body self-esteem was associated with body image and with indicators of nutritional status (BMI and WC) in adolescents of both sexes. These findings suggest the importance of assessing body esteem of adolescents, providing health professionals a wider knowledge about the feelings of young people on body value and appearance, thus fostering the development of actions designed to improve self-esteem and help treating, for example, their weight control.

Key words: Adolescents. Body esteem. Body image. Nutritional status

CARNEIRO, Orion Araújo. *Efeito da intervenção dietética individualizada no diagnóstico nutricional e no controle metabólico de diabéticos tipo 2 sedentários*. 2010. 62 p. Dissertação (Mestrado em Alimentação, Nutrição e Saúde) – Instituto de Nutrição – Universidade do Estado do Rio de Janeiro, Rio de Janeiro, 2010. *Orientadora*: Eliane de Abreu Soares. *Coorientadora*: Avany Fernandes Pereira.

Objective: To evaluate the effect of individualized dietary intervention on nutritional diagnosis and metabolic control in sedentary subjects with type 2 diabetes. **Materials and methods:** This controlled clinical trial, investigated 80 adults, of both sexes, with type 2 diabetes. Patients were divided into intervention group (IG: 40 individuals subjected to intervention and hypoglycemic drug) and control group (CG: 40 individuals subjected only hypoglycemic drug). Individualized dietary intervention was conducted, for three months, based on the *American Diabetes Association (2002)*. The anthropometric variables evaluated included: total body mass (TBM) and height to calculate body mass index (BMI), and waist circumference (WC); biochemical variables assessed were: blood glucose, total cholesterol, LDL-cholesterol, HDL-cholesterol, triglycerides (TG), and glycated hemoglobin (HbA1c); In addition, the intake of energy, protein, carbohydrate, lipid, cholesterol, and dietary fibers. For inferential statistics two-way ANOVA was used with significant level of 95%. **Results:** In the intergroup analysis, the CG showed increase in TBM ($\Delta\%=0.78$; $p=0.014$), BMI ($\Delta\%=0.76$; $p=0.012$), WC ($\Delta\%=0.75$; $p=0.019$); whereas IG decreased TBM ($\Delta\%=-3.71$; $p<0.001$), BMI ($\Delta\%=-3.77$; $p<0.001$), WC ($\Delta\%=-3.98$; $p<0.001$). In comparing the mean RI intergroups, there was difference in the variables: energy/day ($p<0.001$), lipids ($p=0.012$), saturated fats ($p<0.001$), cholesterol ($p=0.006$), dietary fibers ($p=0.001$); blood glucose ($p<0.001$), total cholesterol ($p<0.001$), LDL-cholesterol ($p<0.001$), and HbA1c ($p<0.001$). **Conclusions:** The dietary intervention was efficiently the improvement the anthropometric and metabolic control of type 2 sedentary diabetics.

Key words: Type 2 *Diabetes Mellitus*. Dietary Intervention. Metabolic Control. Nutrition