

ASD groups using design-corrected F tests and multivariate logistic analyses.

**Results** Compared with the ASD-now group, the no-longer-ASD group was more likely to be minority (40.6 vs. 18.3%,  $p < 0.01$ ), have parents with high school education or lower (45.6 vs. 28.3%,  $p < 0.05$ ), and less likely to be of Hispanic ethnicity (8.0 vs 18.5%,  $p < 0.05$ ). The no-longer ASD group was more likely to have had hearing problems (although not currently) (21 vs 10.5%,  $p < 0.05$ ), and less likely to have had epilepsy and seizures (6.2 vs 13.1%,  $p < 0.05$ ), developmental delays (55.6 vs 72.8%,  $p < 0.05$ ) or learning disabilities (56.6 vs 80.3%,  $p < 0.01$ ). Retaining the ASD diagnosis dramatically increased with income levels among minority children, while declining for the most affluent children.

**Conclusions** In a nationally representative US sample, we found evidence that the groups most likely to be told they have ASD when they do not are minority, low-income children, particularly those with hearing problems.

## Primary Care General I

### PS-352a CHILDREN'S RIGHTS IN PRIMARY PAEDIATRIC CARE: EUROPEAN STUDY

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10.1136/archdischild-2014-307384.651

**Background and aims** UN Convention on the Rights of the Child (UNCRC) is an essential part of child health promoting policies. Several studies were carried out on the implementation of UNCRC in secondary and tertiary health care levels but not in primary paediatric care (PPC) settings.

PPC model heterogeneity in Europe is related to socioeconomic/demographic factors, paediatric education/training and child health care policies. PPC is either provided by paediatricians or family doctors/GPs. The study aim was to assess under a social paediatrics perspective UNCRC knowledge/implementation in European PPC settings.

**Methods** As to profile UNCRC in PPC, a questionnaire (Q1) was designed including 23 specific questions regarding rights of protection, provision and participation. The questionnaire was launched as a "monkey survey" to individual paediatricians practicing in PPC settings through the Council of PPC European national societies participating in the study. Specific country data (Excel table) and total merge data were analysed using SPSS tool.

**Results** 1342 responses received from 10 participating European PPC societies:

-Not enough knowledge: 52%–71%.

**-Implementation** Partly implemented 30%–67%, fully implemented 33–66%

-Equal access to health care: Provided 84%–99,5%

-Right to information: Available 90%.

**Conclusions** The knowledge/implementation of UNCRC in PPC varies significantly among European countries. Deep gaps on

UNCRC knowledge were found. Equal access to health care is provided in urban areas. UNCRC should be included in paediatric education as well as addressed in PPC planning policies. Further research on UNCRC.

## Primary Care General II

### PS-353 COVERAGE OF ANTENATAL APPOINTMENT OF PREGNANT WOMEN ADMITTED TO THE MATERNITY TEACHING HOSPITAL ALCIDES CARNEIRO, PETRÓPOLIS, RIO DE JANEIRO, RJ, BRAZIL

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10.1136/archdischild-2014-307384.652

**Introduction** The Brazil is encouraging actions and campaigns to ensure prenatal care quality to all pregnant women. Recognising the importance of public health policies, it is necessary to know the consequences of these actions on pregnant women in our maternity hospital, which are exclusive to users of the Public Health System.

**Objective** To quantitatively identify the coverage of antenatal consultations among pregnant women admitted to the maternity HEAC, according to technical guidelines of the Ministry of Health

**Method** A descriptive, cross-sectional study was conducted between 01/08/2013 to 31/01/2014. Through a structured questionnaire and review of medical records.

**Results** We studied 1061 pregnant women, these feature: mean age  $24.98 \pm 6.47$  years;  $9.1 \pm 2.9$  years of education; 69.4% live with a partner; and 40.26% paid work. Concerning the adequacy of prenatal care, we found: Missing: 0.38%; inappropriate: 8.09%; Intermediate: 12.14%; and appropriate: 75.72%. Totalling 24.28% of queries considered inadequate. The mean gestational age of entry into prenatal care was  $14.8 \pm 7.1$  weeks among all pregnant women. Stratifying pregnant in teenagers and adults, we observed an average of  $15.8 \pm 7.4$  ticket and  $14.55 \pm 7.02$  weeks, respectively, with statistical significance ( $p$  value 0.02).

**Conclusion** Although prenatal be available in the public health of the city, there is still a considerable number of women with absence or inadequate realisation of prenatal care. In addition to observing a delayed uptake, especially among pregnant adolescents. Strategies must be implemented for early identification of pregnant women, resulting in positive effects for children, women and society.

### PS-354 ASSISTED REPRODUCTION AND SOMATIC MORBIDITY IN CHILDHOOD – A SYSTEMATIC REVIEW

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10.1136/archdischild-2014-307384.653

**Background** Worldwide, more than five million babies have been born as a result of assisted reproduction technology. Safety aspects are therefore crucial to consider.

**Aim** By review of the literature to assess if children conceived by assisted reproduction technology are at increased risk of somatic morbidity after the newborn period compared with spontaneously conceived children.

**Methods** Medline/Pubmed, Embase and The Cochrane Library were searched on May 20, 2013. Studies on assisted reproduction technology and post-neonatal somatic diseases were included in the systematic review. Furthermore, health care contacts, chronic illnesses, surgery, medication and mortality were considered. Cohort and case-control studies were included. To assess the risk of bias in the individual studies, quality of all studies were evaluated independently by two of the authors, using the Newcastle-Ottawa Scale. The PRISMA statement for systematic reviews was followed.

**Results** Thirty-eight studies, out of 819 identified studies, were included. Results indicate that children conceived by assisted reproduction technology are at increased risk of leukaemia and retinoblastoma, asthma and obstructive bronchitis, genitourinary diseases, and epilepsy or convulsions when compared with spontaneously conceived children. Furthermore, it appears that children conceived by assisted reproduction technology are hospitalised longer per admission, compared with spontaneously conceived children.

**Conclusion** Children conceived by assisted reproduction technology may be at increased risk of various somatic diseases in childhood compared with spontaneously conceived children.

**PS-355 THE DIFFERENT CONTRIBUTIONS OF BODY MASS INDEX AND HEIGHT DURING THE LIFE CYCLE IN PREDICTING ADULT HYPERTENSION**

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10.1136/archdischild-2014-307384.654

**Background and aims** Birthweight and weight gain have been associated with high adult blood pressure (BP). Less well known is the association between height gain across the life cycle and hypertension (HT). The objective of the present study is to assess the independent association of body mass index (BMI) and length at birth and BMI and height gains from birth to childhood, and from childhood to adulthood with adult blood pressure and HT.

**Methods** A prospective cohort of all living born in Ribeirão Preto, Brazil, was assessed at birth (1978/79), school-age (1987/89) and adulthood (2002/04). Data on neonatal variables, socioeconomic position and anthropometry of all three moments as well as adult risk factors for HT were present for 1141 subjects. Conditional weight analysis was performed to assess the independent association of BMI and height repeated-in-time measurements on adult HT.

**Results** After adjustments BMI at birth (inversely: RR = 0.58; 95% CI 0.35–0.96), BMI gain in adolescence (RR = 3.39; 95% CI 1.87–6.16) and height gain in childhood (RR = 1.95; 95% CI 1.12–3.38) were associated with adult HT. Adult systolic BP was associated with BMI at birth, BMI and height gains in

childhood and adolescence. Diastolic BP was associated with BMI at birth, BMI gain in childhood and adolescence, and with height gain in childhood.

**Conclusion** Lower BMI at birth, higher height gain between birth and school age and higher BMI gain during the second decade of life were associated with adult HT. BMI and height also predict both systolic and diastolic blood pressure.

**Supported** CNPq, FAPESP, FAEPA.

**PS-356 ASSOCIATION BETWEEN MATERNAL PRE-PREGNANCY BODY MASS INDEX AND SIZE AT BIRTH IN RIBEIRÃO PRETO, SÃO PAULO, BRAZIL**

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10.1136/archdischild-2014-307384.655

**Background and aims** Fetal growth is determined partially by maternal characteristics such as pre-pregnancy weight. Maternal pre-pregnancy anthropometry is useful to estimate birth weight and the risk of various adverse perinatal outcomes. We studied the relationship between pre-pregnancy anthropometry and newborn size. We estimated the risk of low birth weight (LBW, <2,500 g) or high birth weight (HBW, ≥4,000 g), preterm (PT), small (SGA) or large (LGA) for gestational age in a birth cohort from Ribeirão Preto, Brazil, in 2010, according to maternal pre-pregnancy body mass index (BMI).

**Methods** A convenience cohort of 1370 pregnant women living in the city was evaluated between 22–25 weeks of gestation, and their respective newborns. Standardised questionnaires were applied during pregnancy and soon after birth. The dependent variables were LBW/HBW, PT and SGA/LGA. The independent variable was maternal pre-pregnancy BMI, classified as overweight (BMI between 25 and 29.9 kg/m<sup>2</sup>) and obese (BMI ≥30 kg/m<sup>2</sup>). Logistic regression models were adjusted for biological, sociodemographic and pregnancy-related variables.

**Results** A high prevalence of overweight-obesity (39.6%) was observed and gestational weight gain was above international recommendations, especially among obese mothers. Overweight and obesity before pregnancy, according to pre-pregnancy BMI showed high risk of HBW (RR 2.1, 95% CI 1.09–3.68 and RR 2.58, 95% CI 1.36–4.91, respectively) and LGA infants (RR 1.96, 95% CI 1:10–3:49 and 3:47 RR, 95% CI 1.95–6.16, respectively), but not with LBW, SGA or PT.

**Conclusions** In this population, frequencies of overweight and obesity were elevated and were independently associated with HBW and LGA.

**Supported** by FAPESP and FAEPA.

**PS-357 FIRST YEAR GROWTH IN RELATION TO PRENATAL EXPOSURE TO ENDOCRINE DISRUPTORS – A DUTCH PROSPECTIVE COHORT STUDY**

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10.1136/archdischild-2014-307384.656