

sizes from national data are often used by researchers while actual portions are often much larger, and therefore include more calories. Finally, data on the food sources of nutrients are not publicly available. Current data describes food item sales yet nutrient quantities are not available for each item, preventing determination of company and food item sources of nutrient intake. To successfully improve the food environment and promote health through diet, measurement of dietary intake quality and supply must be improved.

P1-127 SPATIAL AND TEMPORAL DYNAMICS OF DENGUE FEVER CASES IN ARARAQUARA CITY, BRAZIL

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Background Dengue fever represents a serious public health issue in Brazil. Araraquara is a city, in state of São Paulo that has been having serious outbreaks of dengue fever in the last decade, in spite of its relatively good social and economical conditions. This study mapped and analysed spatial and time distribution of the cases of dengue fever in Araraquara.

Methods Registered and confirmed cases of years 2007 and 2008 from the National System of Diseases Notification (SINAN) were geo-referenced using a street based map and a Geographic Information System (GIS). To analyse spatial temporal distribution pattern of dengue fever cases, density Kernel were used on the events according to epidemiological week.

Results In 2007, 335 cases were confirmed, and in 2008, 1233 new cases. Spatial analysis presented occurrence of dengue fever cases almost all around the urban area of the municipality of Araraquara. Important spatial variations on the distribution pattern along the epidemiological weeks were identified. In the two analysed years, most areas that presented high concentration of cases in a specific week tended to have fewer cases on the following week. However, in some areas of the city were identified clusters of dengue fever that remained in the same place.

Conclusion The results showed that, at a local intra urban level, the analysis of cases per epidemiological week can be an way to identify spatial and time important differences on the incidence of the disease and possible factors associated.

P1-128 A SYSTEMATIC REVIEW OF SEXUAL RISK FACTORS FOR HIV IN INDIA

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Introduction India's large HIV epidemic and the potential for epidemic HIV spread in some areas demands a full understanding of HIV transmission. Factors associated with HIV infection in India include: commercial sex work, sexually transmitted infections (STI), numbers of sex partners and male circumcision. We wished to quantify effects of the above risk factors, roughly estimating their size, for each gender and in high- and low-HIV risk populations.

Methods Meta-analysis of risk factors for HIV from 34 studies identified through literature search of multiple on-line databases. Risk factors were: male circumcision/religion, biologically confirmed infection with Herpes Simplex Virus 2, syphilis or gonorrhoea, self-reported genital ulcer, multiple sexual partners and paid sex work. Random-effects meta-analysis of effects was conducted.

Results Each of the seven risk factors were significantly associated with HIV status in both men and women. The strongest effect size

among men was HSV-2 infection (OR: 4.68; 95% CI 2.40 to 5.43) while the strongest effect among women was ever being paid for sex (OR: 5.06; 95% CI 3.69 to 6.95). The effect of multiple sexual partners was similar among men (2.80; 95% CI 2.09 to 3.77,) and women (3.00; 95% CI 1.88 to 4.79) and was similar when further stratified by HIV-risk group. Syphilis and multiple sexual partners as risk factors for HIV were significantly associated with lower HIV-risk study populations.

Conclusions The risk factors examined in our analysis should remain targets of HIV prevention programs. Our results confirm that sexual risk factors for HIV infection remain an important part of the HIV epidemic in India.

P1-129 THE IMPORTANCE OF REPRODUCTIVE HEALTH AND HIV/AIDS EDUCATION PROGRAM FOR YOUNG PEOPLE IN PAPUA AND WEST PAPUA PROVINCES, INDONESIA

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Introduction Papua and West Papua Provinces have the highest HIV/AIDS prevalence in Indonesia. In 2009, 94.4% HIV/AIDS cases in Papua Province were transmitted through heterosexual intercourse and the cases among 15–19 years age group were in the fourth rank. A study in 2007 revealed 46.9% Junior High School students had misconception on HIV/AIDS transmission and prevention. These features motivated the author to carry out the 2009 Reducing the Risk of HIV/AIDS: Intervention Trial for Young Papuans Study. The aim of this study was to evaluate of the reproductive health and HIV/AIDS education program in changing young people's knowledge, attitudes and behaviour intention associated with HIV/AIDS and sexuality.

Materials and Methods Sixteen senior high schools were randomly selected to either receive the program or to act as a control group. Students of Year 11 from the selected schools (n=1082) took a pre-intervention test and 2 months later, a post-intervention test. Changes in knowledge, attitude and behavioural intentions between the two groups were compared using a mixed model.

Results Findings showed that the intervention was associated with 0.11 points higher knowledge (95% CI 0.08 to 0.12), 0.13 points higher attitude (95% CI 0.09 to 0.22) and 0.18 points higher behavioural intentions (95% CI 0.11 to 0.33) after adjusting for age, gender, previous sexual experience, ethnicity and pre test mean score.

Conclusions Our reproductive health and HIV/AIDS education program was effective in changing knowledge, attitude and behavioural intentions of students. It is important to promote its inclusion in the school curricula.

P1-130 CREUTZFELDT-JAKOB DISEASE: REPORT OF CASES

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Introduction Creutzfeldt-Jakob disease (CJD) is an infectious disease attributed to a proteinaceous infectious particle (prion), which attacks the central nervous system. The form of acquisition is still unknown and may occur by four known mechanisms of transmission: sporadic, hereditary, iatrogenic and variant (vCJD), which occurs by eating contaminated beef carrier of mad cow disease.

Methods Reporting of cases of CJD has occurred in Bahia between August 2007 and December 2010.

Results There have been 14 suspected cases of sporadic CJD, eight confirmed, two probable (WHO criteria), one discarded and three