SLEEP DISTURBANCES AND A RISK OF MYOCARDIAL INFARCTION IN MALES AGED 25–64 YEARS IN RUSSIA (MONICA-PSYCHOSOCIAL)

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Background We aimed to investigate the influence of sleep disturbance on the 10-year risk of myocardial infarction (MI) in men aged 25–64 years in Russia.

Materials and Methods Within the framework of the WHO program “MONICA-psychosocial” a representative sample of men aged 25–64 years was surveyed in 1994 (657 persons). Sleep disturbance were measured at baseline using the MONICA—psychosocial scale. Incidence new MI cases were ascertained using systematic surveillance the 10-year follow-up. Cox—proportional regression model was used for an estimation of RR.

Results Two thirds of the subjects who experienced their first MI referred to their sleep as “sleep disturbances”. The 10-year RR of MI in men aged 25–64 years was 2.5 times higher (p<0.05) in those whose sleep was described as “poor” vs those with “good” sleep. RR of MI in men aged 25–44 years was 9.25 times higher (p<0.0001) in those whose sleep was described as “poor” vs those with “good” sleep. In the 45–64 year age group these differences were insignificant. RR of MI in men with sleep disturbances was higher in widowers, divorced men, with low social support level men, men with only primary education, working class men, and pensioners.

Conclusion The results demonstrate that sleep disturbances present a social problem and contribute to the risk of MI in young men.

EPIDEMIOLOGICAL SURVEILLANCE (ES) OF CONGENITAL SYPHILIS (CS) IN HOSPITALS: THE EXPERIENCE OF THE SANTA CASA DE SAO PAULO (SCSP)

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Introduction The maternity services are essential for ES for CS. SCSP is a university hospital of Sao Paulo City, Brazil. It is, located in the central area of the city. Are seen at SCSP populations at high risk of infection by sexually transmitted diseases (STD), such as sex workers, injecting drug users and homeless.

Objective To analyse the reported cases of congenital syphilis in SCSP, from 1999 to 2010.

Methods Through the surveillance system, data were obtained for all children born between 1999 and 2010 in the SCSP.

Results We reported 555 cases of CS during the study period; considering the number of deliveries we have an average of 46.5 cases SC/year and 2.6 by 100 deliveries CS. The average age of mothers was 29 years old (ranging from 11 to 46 years) and only 6.1% had more than 7 years of schooling, 39% of pregnant women attend prenatal, but these only 49% had seven or more visits, and only 13.8% were diagnosed with syphilis during pregnancy, but the treatment of pregnant women or partners was not considered adequate.

Conclusion The analysis of the data reflects the quality of prenatal care offered; Our Monitoring Service is the most notify CS in Sao Paulo state, probably by the population at risk for STDS that it serves, it is necessary that those responsible for improving maternal health actions for these segments of the population. The ES is very important for the control of CS assisting in planning, control and evaluation of actions.

TOBACCO USE AMONG UAE NATIONALS

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Introduction Tobacco use is a major public health problem worldwide yet it is not well-studied in the UAE. We aimed to study the prevalence and patterns of tobacco consumption among UAE nationals.

Methods We investigated 170409 Nationals aged ≥18 years (46% males, 54% females) in a population-based screening program in Abu Dhabi residents from April 2008 to June 2010.

Results The prevalence of smoking was 24.2% in males and 0.78% in females and highest in males aged 20–29 (27.4%) and 30–39 years (28.2%). Mean age (SD) of smokers was 32.8 (11.1) years, 32.7 (11.1) in males and 35.7 (12.1) in females. The mean age of onset of smoking was 22.2 (7.8) years overall, 22.4 (8.3) in cigarette smokers, 20.9 (6.7) in pipe (midwakh) smokers, 25.9 (3.1) in shisha smokers and 23.5 (3.4) in cigar smokers. Mean duration of smoking for cigarettes, shisha, pipes and cigars was 11, 8, 9 and 11 years, respectively. After controlling for age and gender, smoking was associated with (OR, 95% CI): overweight (0.9, 0.59 to 0.96), obesity (1.1, 1.06 to 1.14), central obesity (1.04, 1.00 to 1.07), diabetes (1.06, 1.01 to 1.14), hypertension (1.1, 1.07 to 1.17), dyslipidemia (OR=1.4, 1.35 to 1.44) and family history of cardiovascular disease (OR=1.7, 1.54 to 1.77) but not pre-diabetes, past history of heart disease or stroke.

Conclusion Smoking is predominant among young males. The relatively young age of onset of smoking (midwakh) is of particular concern. Comprehensive tobacco control laws targeting the young population are needed.

A SCALABLE APPROACH TO IMPROVING DEATH NOTIFICATION IN THE EASTERN MEDITERRANEAN REGION: LESSONS FROM ABU DHABI

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Background Although accurate death notification is critical, data quality is inconsistent in many health systems. There are additional difficulties in countries in the Eastern Mediterranean Region with burial typically within 24 h of death (limiting post-mortem examination). The law in United Arab Emirates (UAE) mandates vital event notification. In 2007, the Health Authority—Abu Dhabi (HAAD) revised death notification in the Emirates. We report the results of these improvements plus the 2009 Abu Dhabi Mortality statistics including historical comparisons.

Methods The death notification system was systematically evaluated using the lean process-engineering model. Issue analysis and process redesign involved consultation with public health experts, forensic specialists, and faculty from UAE University. A novel notification form and a simple quality assurance process were developed. The combination of the form and process interventions were piloted before implementation across Abu Dhabi.

Results The proportion of unknown cause of death decreased 39% over 4 years, (2006: 25.1%, and 2009: 15.3%). There were 2917 deaths notified in Abu Dhabi during 2009 (of which 35% were UAE Nationals). Overall crude mortality rate was 1.52 per 1000 and age-standardised death rate (using WHO world standard population) was 47.3 per 100,000.

Conclusions Abu Dhabi mortality data compares favourably with global statistics in terms of quality and completeness. Substantial
improvements in death notification can be achieved in EMRO countries using a clear notification form and simple quality assurance process.

P1-172 CANCER EPIDEMIOLOGY IN THE NORTH OF TUNISIA 1999–2003

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Introduction Tunisia as a developing country is passing through an epidemiologic changing with less infectious diseases and the occurrence of several other chronic diseases. Cancer is becoming a major problem of public health. The registry of cancer in Tunisia started in 1997 by the creation of the cancer registry of Northern Tunisia (CRNT), a population registry involving about half the population. This study aimed to present data of the CRNT including the epidemiologic profile and the evolution of the incidence rate of most cancers sites during a 10 year period (1994–2003) in the north of the country.

Methods Referring to the CRNT data, we were able to determine the repartition of cancer according to sex, to calculate the brut and standardised incidence rate with a direct method on the basis of a world reference population. We could also find the incidence evolution and the cancer number of cases between 1994 and 2003. The results were compared to other registries data.

Results From 1999 to 2003, the CRNT registered the average of 5049 cases per annum of invasive cancers. This average was about 5744 in 1994. The increase was about 36% in a 10 year period. The brut incidence rate was 120.2 in men and 94.8 in women. If standardised on age according to a referent world population, the result stayed the same (133.2 vs 101.4). Lung cancer occurred first in men and then bladder cancer. In women, the increased brut incidences concerned breast cancer and colon cancer, cervical cancer occupied the fourth position after the skin cancer. Over the period (1994–2003), the increase of 36% in cancer occurrence is due in men to the 60% increase of lung, colon and prostate cancer cases and in women the increase of 50% of breast cancer new cases and then 10% of colon cancer cases.

Conclusion It seems that there is a continuous increasing of some cancers in Tunisia: breast cancer in women and lung cancer in men, colon cancer for both.

P1-173 DELAY IN THE FIRST DENTAL VISIT IN A BRAZILIAN COHORT STUDY

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Introduction In Brazil about 55% of 6-yr-old children, even in the highest socioeconomic levels, had never been to a dentist. The aim of this study was to investigate factors associated with the delay in the first dental visit (DDV).

Methods We used data from the follow-up (2004) of the birth cohort study of Ribeirão Preto (1994), including 1/3 of the original sample (n=790). DDV was defined as the age at the first dental visit after 6 yrs-old. Covariates used were maternal age, education and skin colour, marital status, number of siblings and household members and health insurance. Bivariate and stratified analysis was followed by a logistic regression with hierarchical modelling.

Results Overall, 55.5% had not been to a dentist by the age of 6. The final model showed that DDV was negatively associated with private health insurance (OR 0.67; 95% CI 0.46 to 0.97) and with mother’s education. Compared to mothers with university degrees the OR for those with <4 years of schooling was 11.0 (95% CI 4.66 to 26.24) and the OR for those with at least 8 yrs of education was 5.49 (95% CI 2.65 to 11.39). Moreover, DDV was positively associated with mothers age (>20 compared to £ 20 yrs-old) 1.77 (95% CI 1.1 to 2.83) and with the number of household members (>4 compared with <4 members) 1.75 (95% CI 1.09 to 2.75).

Conclusion Considering the universal system studies are necessary to understand the barriers mothers with low educational level to take their children to the dentist. Grant Fapesp 00/09508-7.

P1-174 EPIDEMIOLOGY OF NON-FATAL MACHINE INJURY IN BANGLADESH

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Objective To examine the incidence and characteristics of non-fatalf machine injury in Bangladesh.

Methods A population-based cross-sectional survey was conducted between January and December 2003 in Bangladesh. Nationally representative data were collected from 171366 rural and urban households, with a total sample size of 819429.

Results The incidence of non-fatal machine injury was 41.1 per 100 000 per year. The rate was 6.95 times higher in Male than in females. Those who are age 15 to 19 years are most vulnerable rural people were at more than 2.15 times higher risk of machine injury than urban people. The average number of workdays lost was 262.57 (SD 419.741). The average duration of assistance required in daily living activities was 70.47 days (SD 227.324 days). The hospitalisation rate was 20.87 per 100 000 population per year. The mean duration of hospital stay was 18.49 days. The rate of permanent disability was 6.71 per 100 000 population-years.

Conclusion Machine injury is one of the major causes of morbidity, disability and workday loss Bangladeshi population. Adolescent workers are at highest risk. Factory and agricultural sector are the most common place of machine injury. Home is also third common place for machine related injury. To reduce this devastating health issue, a national strategy and Programme for machine injury prevention must be developed.

P1-175 PREDICTING THE FUTURE BURDEN OF OCCUPATIONAL CANCER

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Introduction Interventions to reduce occupationally related cancers should be evidence based. We have developed a method for forecasting the future burden of occupational cancer given past and projected exposure trends and under targeted reductions in workplace exposure levels.

Methods The method builds on an approach using attributable fractions (AFs) developed to estimate the current burden of occupational cancer. We project risk exposure periods (REPs), accounting for cancer latencies of up to 50 years, forward in time, to estimate AFs for a series of forecast target years given past and projected exposure trends and under targeted reduction scenarios. Adjustment