257

SHORT SLEEP DURATION AT NIGHT: GENDER SPECIFICITY MAINLY DUE TO INEFFECTIVELY TREATED HYPERTENSION? *A Stang, N Dragano, S Moebus, S Möhlenkamp, A Schmermund, J Siegrist, R Erbel, K H Jöckel (University of Essen, Essen, Germany)

Background: Only few population-based studies investigated the association between sleep duration and arterial hypertension (NHANES-I, Sleep Heart Health Study, Whitehall II study). According to Whitehall II, sleep 5h per night) appears to be associated with hypertension among≤deprivation (women only. This report examines this association within a German population-based study. Methods: Analyses were based on cross-sectional data of the Heinz Nixdorf Recall Study including 2381 men and 2403 women aged 45–75 years. We calculated age-standardized prevalences with the age distribution of the overall group as the standard. Results: Self-reported sleep duration of 5 hours or less was associated with an increased prevalence of hypertensive blood 9h:≥ 5h: 38%, 6h: 28%, 7h: 31%, 8h: 30%, ≤pressure values among women only (32%). This gender-specificity was mainly due to a considerably higher prevalence 5h:≤of ineffectively treated hypertension among women with sleep deprivation (9h: 13%).≥22%, 6h: 13%, 7h: 12%, 8h: 13%, Conclusions: We were able to corroborate the gender specificity of the association between sleep deprivation and prevalence of hypertension. The gender-specific effect may be mainly due to a higher proportion of ineffective treatment for hypertension among women with short sleep durations.

258-S

SUBCLINICAL MARKERS OF CARDIOVASCULAR DISEASE IN URBAN POLICE OFFICERS AND A GENERAL POPULATION SAMPLE. *P N Joseph, J M Violanti, R Donahue, M Andrew, C Burchfiel, J Dorn (State University of New York at Buffalo, Buffalo, NY 14214)

The Buffalo Cardio-Metabolic Occupational Police Stress (BCOPS) study is designed to assess the impact of police work on subclinical cardiovascular disease (CVD). Our objective was to compare subclinical CVD markers between police officers (n = 312, mean age 42.9 years) and a population sample (n = 318, mean age 55.1 years) of men and women free of clinical CVD. We used B-mode ultrasound to measure carotid artery intima-media thickness (CIMT) and brachial artery flow-mediated dilation (FMD). Adequate overlap in age distributions between groups allowed for age-adjustment in subsequent analyses. Compared to controls, officers had elevated age-adjusted CVD risk factor levels (blood pressure, total cholesterol, smoking prevalence). In multiple linear regression models, officers exhibited more adverse subclinical CVD compared to controls; mean common CIMT (police = 0.66mm, controls = 0.64mm, p = 0.03), mean maximum CIMT (police = 0.85mm, controls = 0.81mm, p = 0.03), and FMD (police = 5.60%, controls = 6.27%, p = 0.15), after adjustment for age, gender, and CVD risk factors (body mass index, education, hypercholesterolemia, hypertension, diabetes, smoking, alcohol, physical inactivity, and depression). Restricting controls to employed participants only, to reduce healthy worker bias, led to similar results. In this study, officers showed increased subclinical CVD compared to a population sample. These differences could not be fully explained by traditional CVD risk factors, and implicate other pathways whereby stressful law enforcement work may increase CVD risk.

259

DAILY SPIRITUAL EXPERIENCES AND BLOOD PRESSURE. *G Fitchett and L Powell (Rush University Medical Center, Chicago, IL 60612)

There is some evidence that religious involvement is protective for blood pressure (BP) and hypertension (HTN). Daily spiritual experiences may be protective via strengthening host resistance to stress. We examined the relationship between the Daily Spiritual Experiences Scale (DSES) and BP and HTN among 1,060 White and 598 Black women (mean age 50 yr, SD 2.7) participating in the Study of Women's Health Across the Nation (SWAN). The 8 DSES items (e.g. "I feel God's presence") assessed the frequency of spiritual experiences. Four groups were created based on average DSES score: some days or less, most days, daily, or many times a day. Using multiple regression, mixed effects regression, and logistic regression equations, we examined the effects of DSES group on the cross-sectional association with SBP and hypertensive status, and their effects on 3-year change in SBP and incident HTN. All models were stratified by race. We found little difference in adjusted mean SBP for either the White or Black women in the highest DSES group compared to those in the lowest (adjusted mean SBP for highest vs lowest DSES group: Whites 114.9 vs 114.3, Blacks 126.9 vs 127.5, p > 0.90). Higher DSES did not protect against 3-year increases in SBP. There was no association between DSES group and hypertensive status or incident HTN. Daily spiritual experiences, as measured by the DSES, do not appear protective for SBP or HTN in midlife women. SWAN has grant support from the National Institutes of Health, DHHS, through the National Institute on Aging, the National Institute of Nursing Research and the NIH Office of Research on Women's Health (Grants NR004061; AG012505, AG012535, AG012531, AG012539, AG012546, AG012553, AG012554, AG012495). This research was also supported by AG020145 (G Fitchett).

260

SELF-REPORT VERSUS MEDICAL RECORDS FOR MONITORING CARDIOVASCULAR CONDITIONS IN PATIENTS WITH HYPERCHOLESTEROLEMIA. *H Englert, J Müller-Nordhorn, S Seewald, F Sonntag, H Völler, W Meyer-Sabellek, K Wegscheider, E Windler, H Katus, S Willich (Institute for Social Medicine, Epidemiology, and Health Economics, Charité University Medical Center, 10117 Berlin, Germany)

Objective: To determine the accuracy of patients' self-reporting of specific cardiovascular diseases as judged by information from medical records and to identify sociodemographic patient characteristics influencing the accuracy. Methods: The study was conducted using the resources of ORBITAL, a double blind, multicentre, randomised, controlled study in Germany from 2002–2005. Self reported questionnaire data of 7571 patients with hypercholesterolemia were compared with information from general practitioners on cardiovascular diseases, using the kappa statistics and binomial logit models. Results: Kappa values ranged from 0.89 for diabetes to 0.04 for angina pectoris. The number of overreporting varied from 1% for diabetes to 17% for angina pectoris, while the number of underreporting varied from less than 0.3% for cardiac arrhythmia to 10% for hypertension. Gender, age, frequency of consultation and the choice of the individual general practitioner were correlated with overreporting for almost all conditions whereas educational status had a relatively low impact on accuracy. Conclusions: High agreement e.g. for diabetes supports the conclusion, that certain diagnoses have excellent validity. However, low agreement observed for other cardiac conditions suggests that patient self-reports are relatively inaccurate. Therefore, additional data validation is recommended for more specific and diagnostically complex conditions.

* = Presenter; S = The work was completed while the presenter was a student

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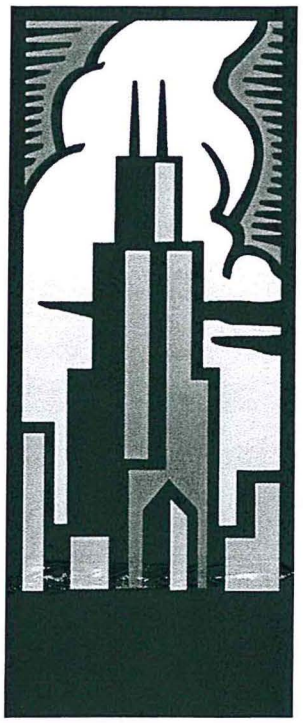

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