

support was negative correlation and significant to the student stress level with $r=-0.106$ and $p=0.051$

SP-105

The Study on the Effects of the Health Education Group in a Drug Abuser Treatment Center

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Objective: Because the drug abuser treatment center had no correlative education teaching material, this study tried to design group education courses for the problems of body, mind and soul of drug abusers.

Methods: This study adopted descriptive research. the group education courses which lasted for 13 weeks. This study used the self-made assessment chart of awareness of drug education. We collected the data before and after the group education from August 17 to November 16, 2007. And then we proceeded descriptive statistics and inference statistics to analysis these data by the analysis software, SPSS 12.0.

Results: Eventually, we found that these 74 drug abusers were all male, By using the chi-square test, we found that drug abusing behavior could be improved after and before group education accounted for 68.9% and 85.1% ($P=0.017$). In the parts of damage of drugs, awareness of infectious diseases and employment resources ($P=1.0$).

Conclusions: In accordance with the results that mentioned above, conducting group education courses could reach drug abuser' demands and then could improve their abusing behaviors to achieve the effect of drug rehabilitation. Because in the parts of damage of drugs, awareness of infectious diseases and employment resources, there was no significant difference, we should guide correlative knowledge after their admission. In the courses of employment resources, because the abusers could not get employment information in the rehabilitation center, the effects were limited.

SP-106

Alcohol-Associated Excess in Emergency and Injury Service Utilization among Young Adults in Taiwan

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Purpose: This study sought to examine the link between alcohol drinking and emergency and injury service utilization among community-dwelling young adults in Taiwan.

Method: Data were from 2005 National Health Interview Survey (NHIS) and linked National Health Insurance claimed data (NHI). With a focus on sample with age of 18-34 years, information pertaining to individual sociodemographic background and health behaviors was obtained from face-to-face interview in the NHIS ($n=6345$); service utilization records concerning emergency room and healthcare of injury causes

(ICD-9-CM: 800-999) were retrieved from those providing consent to data linkage with NHI ($n=5133$, linkage rate: 81.6%).

Results: Approximately 28.33% wt ($n=1455$) drank less than once a week, and the estimate for once or more per week was 10.38% wt ($n=542$). A dose response relationship appears between frequency of alcohol consumption and the utilization of emergency room and injury-related healthcares (both p -values < 0.001). While simultaneously adjusted for gender, aboriginal ethnicity, household income, religious affiliation, educational attainment, major physical diseases, and mental diseases, once or more per week drinking was associated with 33% increased visits of emergency room (95% CI=1.03-1.72, $p<0.05$), and 25% increased utilization of healthcare of injury causes (95% CI=0.99-1.59, $p=0.06$); the observed alcohol-associated excess was less salient once tobacco smoking and betel nut were statistically adjusted.

Conclusion: Higher frequency of alcohol consumption may be modestly associated with increased utilization of emergency room service and healthcare of injury in young adults. Health education program is needed to raise public awareness for responsible drinking and future research may help delineate possible mechanisms.

SP-107

The Relationship between Heavy Metals (HG, PB, CD, MN) and Maternal Nationality on Children Development

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Background: Developmental delay is a common problem in pediatrics, with an estimated population prevalence as high as 10%. Number of developmental delay children in Taiwan has increased in recent years. Many studies have observed that heavy metals, such as mercury and lead, affect children's cognitive behavior and intelligence. However, evidence is still insufficient to establish this association between heavy metals and developmental delay in children.

Objectives: The aim of this study is to examine the effect of family, nationality, environmental exposure and child characteristics on children development, and to analyze their association with respect to heavy metals detected in their blood sample.

Methods: This cross-sectional study enrolled 118 children in Nantou from Nov. 2008 to Jan. 2009. We used interview questionnaire to collect data and used Denver Developmental Screening Test Chinese Version (DDST-Chinese version) to estimate the stages of children development. Blood levels of mercury, lead, cadmium and manganese were assayed by inductively coupled plasma mass spectrometer (ICP-MS).

Results: For every log-unit increased in blood cadmium level, the gross motor skill failure rate was increased by 2.56% ($p=0.010$). Children with low birth weight

(<2500g) had higher failure rate in gross motor skill, langue, social contact, and children development (all categories). Maternal nationality did not have significant effect on children development.

Conclusion: Cadmium affects the gross motor skill performance of children. The development of immigrant children is not worse than those born domestically. Low birth weight is an important factor affecting children development.

SP-108

Possible Age Differences in the Predictors for Incident Use and Long-Term Use of Benzodiazepines (BZDs) in Community-Dwelling Population in Taiwan

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Benzodiazepines are one of the most commonly abused psychoactive medications worldwide. This study sought to understand predictors of incident use and long-term use (LTU) of Benzodiazepines (BZDs) in community-dwelling civilians in Taiwan and probe possible adult-elderly differences in such links. The data were from 2005 National Household Interview Survey (NHIS). Information concerning pharmacological services and medical records in 2004-2006 National Health Insurance Research Database were subsequently retrieved upon consent (linkage rate~70%). Building up 15,508 individuals who had received any BZD prescription in 2004, incident use was defined by having received BZD prescription at least one day in 2005; as to LTU, having 180-or-more BZD prescription days between 2005-06. Complex survey analyses were performed to estimate association strengths. Annual incident rate of BZD use in adults and elderly was 7.26% and 10.98%, respectively. Among BZD new users, roughly one in 6~7 elders develop LTU, significantly higher than 5% in adults. Adult-elderly differences appear in the predictor profile of LTU. For example, higher educational attainment and having more physical disorders in individual characteristics were modestly associated with BZD LTU in adults (aOR=1.4~2.1); whereas for elderly BZD users, only service-provider attributes matter (receiving BZD prescriptions from ≥ 2 specialties, aOR=12.47). Our study found possible adult-elderly differences in not only the occurrence of incident use and LTU of BZD, but also the predictor profile. Future health education and pharmacological policy should integrate age-tailored strategies to reduce BZD LTU related problems.

SP-109

The Effect of Floating in Seawater on Physical and Psychological States- Evaluation of Anxiety

Psychological State in Subjective Perspective by Using Stai and Vas-

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Purpose: The purpose of this study was to examine the effects of floating in seawater on physical and psychological states.

Subject and Methods: The study was performed with a randomized, nonblinded, crossover design. The eighteen subjects aged 19-29 (21.0 ± 2.2 y) who had no medical treatment and agreed to the informed consent are selected as participate. The subjects were randomly assigned to either an intervention of floating in sea-water (FS) or to a control group of lying on a bed (LB), and performed both trials after 48h washout periods in Thalassotherapy health-spa facilities, Okinawa, Japan in May, 2006. To evaluate the effect of trials on physical and psychological state, STAI (State-Trait Anxiety Inventory) and VAS (Visual Analog Scale) were measured at before and after of each trial.

Results: A significant difference was found between SF and LB on the state anxiety scores after the intervention. On the subjective evaluation on the psychological state, the score of will, mood, concentration and appetite state decreased significantly after intervention, while that didn't change significantly in the control.

Conclusions: As a conclusion, the floating in seawater as a thalassotherapy had better effects to decrease anxiety and improve psychological state, and it might be well recommended as it was good to relaxation stresses and improve mental health.

SP-110

The Relationships of Coping Behaviors with Bereavement, Attachment Styles, and Anticipatory Mourning Reactions among Families of Terminal Cancer Patients in Kaoshiung Hospice

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The main purpose of this study was to explore the relationships of coping behaviors with bereavement, attachment styles, and anticipatory mourning reactions among families of terminal cancer patients, and to understand the differences between anticipatory mourning reactions and bereavement-related factors, such as sex, age, religion, health condition and social support. The subjects of this study were 142 families in Kaoshiung Hospice. The subjects were evaluated by Attachment Style Scale, Brief COPE Scale, and RGEI Scale. The data were analyzed by SPSS 12.0. The results were summarized as follows: 1. The anticipatory mourning reactions among subjects were significantly effected by sex, health condition, sources of social support, and relationship quality, such as conflict or dependence. 2. Attachment styles were significantly