Genetics Disease in Immigrant Populations in Transition: Genetic Epidemiology of Mental Disorders

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Mental disorders are major burden in most population worldwide. The causes of mental illnesses are complex and involve genetics, neurocognitive and biological factors. Meanwhile, the role of genetics in promoting mental health prevention is incontrovertible. This problem brings up the question: Are immigrants bringing high levels of genetic mental diseases into the host countries? Cognitive impairment and Intelligence Quotient (IQ) are of common occurrence in these issues and genetic factors are known to play an important role in regulating these traits. One example dataset that shows this potential problem is a negative Flynn Effect in Finland over the years 1997 to 2009. A study conducted by Edward Dutton and Richard Lynn in 2013 demonstrated that "from 1997 to 2009 there were declines in all three tests averaging 2.0 IQ points a decade (Dutton E. and Lynn R., 2013). It is proposed that the most persuasive explanation is increasing levels of non-European immigrant with lower IQs who settled in Finland. As a conclusion, knowledge of the genetic epidemiology of mental disorders during immigrations not only contribute to an understanding of gene action and the pathophysiology of disease but should also help to direct the search for modifiable environmental risk

Comparison of Anxiolytic Effects of the Homeopathic Complex Vita-C 15 in Compared with Aconitum Napellus in the Acutely Stressed C57BL6 Mice

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Anxiety, phobias and stress are the main mental health problems among the Malaysian population, with global prevalence varying from 8% to 18%. Even so, less than 30% who suffer these disturbances seek treatment (Harvey and Champe, 1998).

The objective of this study is to evaluate and compare the anxiolytic effects of Aconitum napellus and Homeopathic complex Vita-C 15 in the acutely stressed C57BL6 mice by using the fecal corticoid test, open field test (OFT) and c-fos, NMDAR 2B, NPY 1R and NPY 2R activity through the hippocampus.

A double blinded randomized controlled study is conducted at Animal Laboratory of Cyberjaya University College of Medical Sciences (CUCMS). All the animals are acclimatized to constant laboratory conditions for 14 days before starting the experiments. Prior to the experiment, a pilot study is performed to identify the most suitable and ideal potency for the homeopathic remedy of Aconitum napellus. The animals are tested (n=3) per group on the potency of 6 C, 30 C and 200 C. The treatments are carried out over 9 days.

48 male C57BL6 mice (n=6), 4-5 weeks of age are used. They are randomly selected and divided into two groups. Group I is the healthy control group of mice which are not exposed to acute stress. Group II (stress group); comprise of mice expose to acute restraint stress. Prior to restraint stress, the treatments given are Aconitum napellus 30 cH, Homeopathic complex Vita-C 15, Diazepam, and placebo. Then the results are evaluated by fecal CORT test and open field test by comparing the anxiolytics between pre-test and post-test.

Aconitum napellus 30 cH and Homeopathic complex Vita-C 15 are expected to be more effective and can reduce the occurrence of anxiety in the acutely stressed C57BL6 mice. Thus research into prevention and supportive therapies is necessary and beneficial for this disorder.