

The LETTEN SYMPOSIUM on Brain Function and Dysfunction

14 May 2004, Friday (9.00am - 6.30pm)

The Royal Society

6-9 Carlton House Terrace, London, SW1Y 5AG

Tel: 020-7839-5561/Fax: 020-7930-2170

Morning Session

- 9.00 Registration
- 9.30 **Brain Development** - Chair Alex Leaf (Harvard University, Boston, USA)
- Letten Saugstad (Oslo, Norway), 'A new way of thinking about neurological disorders & cerebral excitability: The fundamental property of nervous tissue.'
- 9.50
- Michael Crawford (London Metropolitan University), 'The uniqueness of docosahexaenoic acid for brain development and function: The nutritional determinant of brain evolution.'
- 10.10
- Holm Holmsen (University of Bergen, Norway), 'Nutritional regulation of signaling pathways in the brain and lessons from psychotropic drugs.'
- 11.00 - 11.30 Coffee & Tea
- 11.30 **Indigenous Populations In Transition** - Chair Sir Kenneth Stuart (Barbados)
- Anna Gislen (Cell and Organism Biology), 'Lund, The Moken, Sea Gypsies, the superior vision of sea hunters and gatherers.'
- 11.50
- Laurie Chan, McGill (Canada), 'Fatty acids in the diet of Inuit in the Canadian Arctic: A transition from tradition to modern food and lifestyle.'
- 12.10
- Susumu Ando (Japan), 'Benefits of the Japanese diet to health and the brain, the adversity of the high saturated and high sucrose diets.'
- 12.30 Discussion led by Junshi Chen (China) Yiqun Wang (London Metropolitan University)
- 1.00 - 2.00 Lunch

Afternoon Session

- 2.00 **Cognition, Emotion and Behaviour on Western Diet** - Chair Professor Phil Cowan (University of Oxford)
- Pauline Emmett (Bristol University) & Joe Hibbeln (NIH, USA), 'Maternal nutrition, depression during pregnancy: the follow up of 12,000 children from birth in the ALSPAC study.'
- 2.20
- W.E. Severus (Berlin), 'Omega 3 fatty acids in clinical studies of major depression and bipolar disorder.'
- 2.40
- Bernard Gesch (University of Oxford), 'Nutrition as a modifiable causal factor in antisocial behaviour'
- 3.30 - 4.00 Coffee & Tea
- 4.00 **The Problem At Its Roots, The Size And Cost** - Chair Bjorn Osterud (University of Tromso, Norway)
- Dr Mary Rutherford (Imperial College), 'Tackling the roots in fetal and neonatal development. Imaging of human brain development, methods to quantify regional brain maturation and monitor prevention of early disadvantage.'
- 4.20
- Torger Borresen (SeaFoodPlus, Denmark) - 'Pollution, dead zones & destruction of the marine food chain and the food chain for neural development.'
- 4.40 Discussion led by Michel Khrestathisky (France)
- 5.00 - 5.15 Break
- 5.15 - 6.30 **Discussion: Chair** - Stephen Cunnane (Canada). Led by Mike Rayner (Oxford), 'An audit of the cost to the nation.'
- Concluding remarks by Jack Winkler (London), 'Implications for food policy.'
- 6.30 Aperitifs and dinner for informal discussion on the way forward.