



Associate Professor Chong Siow Ann Vice Chairman, Medical Board (Research)

A Member of the National Healthcare Group



About IMH





- Singapore's only tertiary psychiatric institution
- National centre part of the NHG cluster
- 2010 beds
- Looks after most severe cases
- Provides acute and long-term care



(as of 2011)



Overview of Clinical Services

HOSPITAL-BASED SERVICES

General Psychiatry

Geriatric Psychiatry

Child & Adolescent Psychiatry

Community Psychiatry

Forensic Psychiatry

Rehabilitation Psychiatry

Emergency Psychiatry

Early Psychosis Intervention

Addiction Medicine

Psychotherapy

Allied Health

COMMUNITY-BASED SERVICES



YOUNG REACH CHAT



ADULTS
CMHT
Job Club
GPPartnership



ELDERLY APCATS

National Mental Health Blueprint Programmes



Outpatient Specialist Clinics







Clinic B

NAMS Clinic

Sayang Wellness Clinic



Community Wellness Clinic, Queenstown



Community Wellness Clinic, Geylang



CGC@IMH and HPB



Research





 Carry out scientifically and clinically relevant research that change the way we think about mental health and the way we treat people with mental illness

RESEARCH OFFICE

- Support research at all levels
- Review, oversight and audits
- Provide training and mentoring
- Establishes collaboration with other centres and stakeholders





Key Research Focus

- Psychiatric Epidemiology
- Mental Health Service Research
- Research in Bioethics of Psychiatric Research, Treatment & Policies

Programme for Mental Health Policy Research

- Clinical Phenotyping
- Psychiatric Genomics
- Neuro-imaging
- Neurocognition
- Clinical Trials

Programme for Translational & Clinical Research



Programme for Mental Health Policy Research



Early Psychosis Intervention Programme



GPs and Their Role in Mental Healthcare in Singapore



Screening of NS Enlistees for Psychiatric Morbidity



Psychiatric Morbidity Among Mentally III Inmates in the Singapore Prison Service



Depression & Diabetes Mellitus: Prevalence, Cost & Impact on Treatment



Barriers to Care: Public Perception Towards Mentally Ill in Singapore



Financial Needs of Mentally III Patients and Their Caregivers



Singapore Mental Health Study



Well-being of the Singapore Elderly



Bioethics Research in Mental Health



Singapore Mental Health Study

National study to obtain accurate information about the prevalence and correlates of mental, substance, and behavioural disorders in Singapore

SGD 7-million funding

Collaborating Centres:









Loving Hearts, Beautiful Minds

Largest nationwide survey on mental health 15,000 Singaporean adults to participate

THE Institute of Mental Health is spearheading a nationwide mental health survey to find out how wide-spread various mental disorders among Singaporeans are.

About 15,000 adults have been selected for face-to-face interviews in their homes. Their identities will be kept confidential.



nances if the latter cannot cope.

Worldwide, one in four people have some form of mental illness, but two-thirds of them go without treatment, even in countries with rich resources.

The survey aims to find out if such alarming statistics are mirrored here, said associate profes-

Largest mental-health survey to poll 6,500

BY SIA LING XIN

A SURVIN' on mental health - the largest of fix kind - will be done to find out how common mental disorders are among achit Singaporeaus, and if those with such conditions are seeking help. It will also examine the impact of mental-health disorders on affected individuals and their families.

The Singapore Mental Health Study, which aims to poll at least 6,500 people, will be carried out by the Institute of Mental Health (IMH), Nanyang Technological University, National University of Singapore and Rand Health a divivey in 2004 polled more than 2,900 people, and focused on the prevalence of only depressive and anxiety disorders.

It found that an achilt Singaporean has a 5.6 per cent risk of developing depression and a 3.4 per cent risk of developing an anxiety disorder in his lifetime. The results highlighted the need for

The results highlighted the need for mental-health programmes, and led to the creation of a five-year National Mental Health Bhasprint by the Ministry of Health (MOSI) in 2007.

The new study will be more comprehensive, acreening for anxiety, mood and substance-shase disorders, including munia, gambling addiction and nico-



Well-being of Singapore Elderly (WiSE) Survey



The WiSE survey aims to obtain accurate national information about the prevalence and correlates of depression and dementia among

the elderly in Singapore

Duration:

Apr 2011 – Mar 2014

THE STRAITS TIMES STUDY INCOMES AT DESCRIPTION OF DESCRIPTION OF



Funding:

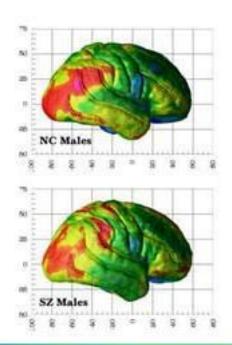
Ministry of Health: \$ 3.2 mil

Singapore Millennium Foundation, Temasek Trust: \$ 1.2 mil



Programme for Translational & Clinical Research

- Clinical Phenotyping & Neurocognition
- Pharmacogenetics of Tardive Dyskinesia
- Neuroimaging Studies of Patients with Psychosis
- Lipidomics of Psychosis
- Clinical Trials
- TCR in Neuroscience Flagship Programme





Landmark Translational Clinical Research in Neuroscience

\$25 million awarded to IMH for

- A Comprehensive Genetic Study of Schizophrenia and Neurocognitive Impairments
- Prospective Observational Study of Young Adults at Ultra High Risk for Psychotic Disorders
- Evaluation of a putative neurocognitive enhancing agent

THE STRAITS TIMES WEDNESDAY, MAY 14 2008

\$25m each for blindness, schizophrenia research

2 projects aim to pool expertise and resources, develop treatments fast

> By CHANG AI-LIEN Science Correspondent

A WHOPPING \$25 million each has been awarded to two ambitious research projects here to tackle blindness and schizophrenia.

The projects - Singapore's largest - will involve about 50 researchers here and abroad, comprising doctors and scientists from hospitals, tertiary and research institutes and disease centres.

The aim is to get people from different disciplines to pool their expertise and resources and get treatments to patients fast.

The money for the

The money for the projects comes from the Translational and Clinical Research Flagship Programme.

The programme has a five-year budget of \$125 million, and is funded by the high-level National Research Foundation, which steers Singapore's research efforts.

Last year, it also doled out \$25 million for research into stomach cancer.

Schizophrenia, the psychotic illness that can cause hallucinations and delusions, will be put under the microscope by a team headed by Associate Professor Chong Siow Ann, vice-chairman of the medical board (research) of the Institute of Mental Health, one of the world's largest mental health facili-



FIGHTING SCHIZOPHRENIA: Prof Chong Siow Ann of the Institute of Mental Health.

His team will look at tens of thousands of young people—the illness tends to strike those aged between 15 and 35 -- to track down those at risk and see who actually gets the illness.

Singapore's compact size and organised health, education and military systems will make patient tracking and follow-up easier than in larger countries where patients tend to be more mobile, said Prof. Chong.

In Singapore, schizophrenia ranks ninth, together with breast cancer, in terms of disease burden, a measure that combines years of life lost through premature death and disability.

"At the end of the day, we hope we will be able to transform the way people perceive the illness, and the way we treat our patients and their families," Prof Chong said.

The eye disease programme, led by Singapore Eye Research Institute direc-



FIGHTING BLINDNESS: Prof Donald Tan of the Singapore

tor Donald Tan, will delve into the two major causes of blindness: glaucoma, a disease of the optic nerve, and corneal disorders such as eye infections.

The Singapore National Eye Centre alone treats over 34,000 cases of glaucoma and more than 15,000 cases of corneal disease each year. In many cases, the treat-

In many cases, the treatment is surgery, but for some reason, this also affects Asian eyes, leaving many with scars, which also affects vision.

"We want to be able to

"We want to be able to control scarring and induce wound healing," said Professor Tan, who is also the eye centre's director.

Breakthroughs could be expanded within the field and beyond.

They could help eyes heal after Lasik surgery to correct poor vision, for instance, and also help in healing other parts of the body damaged by disease or operations.

ailien@sph.com.sg

Focused in approach, wide in scope

BATTLING BLINDNESS

The main aim of the programme is to develop better anti-scarring and wound-healing treatments for glaucoma and comeal diseases, two of the major causes of blindness. Among the goals:

» New drug treatments to control healing after surgery to treat inflammation and infection, and new ways to deliver drugs to

different parts of the eye
New biological tissue "glue" for
surgery as an alternative to

Developing ultra-high resolution imaging technologies to look at wound-healing at a cellular level

 New corneal transplantation surgeries using special lasers and new stem cell transplantation methods

Research into the Asian form of glaucoma, imaging devices to screen for glaucoma and preventing nerve damage in the disease

Identifying Asian genes responsible for it

BATTLING SCHIZOPHRENIA

The programme aims to identify key genetic, biological, cognitive, clinical and social risk factors for psychotic disorders, and test new treatments for schizophrenie.

A genetic study of schizophrenia and neurocognitive impairments

and neurocognitive impairments

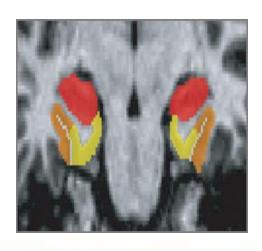
Study of young adults at risk of
psychotic disorders

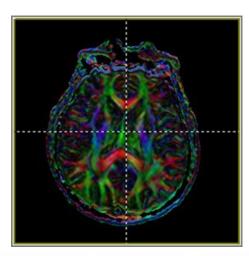
Clinical trial of potential drugs which help treat impairments caused by the disease, including reduced attention span and memory function



Neuroimaging Programme

- (1) Determination of brain white matter changes in schizophrenia and bipolar disorder using structural magnetic resonance imaging (sMRI), diffusion tensor imaging (DTI), resting state fMRI and their relationship to psychotic symptoms.
- (2) Understanding longitudinal changes of these brain white matter changes and their inter-relationships with neurocognitive functioning.
- Elucidation of genetic factors underlying brain neuroanatomical changes and impact on functional outcomes.







Child & Adolescent Psychiatry Research



A nutritional and social skills intervention on conduct disorder and hyperactivity



A Randomised Controlled Trial of a Brain-Computer Interface Based Intervention for the Treatment of ADHD



An Investigation of Gaming Effects & Counselling Strategies for Young Gamers in Singapore



A striatal synaptic dysfunction hypothesis for repetitive behaviours in autism evaluated by re-sequencing of candidate genes



Addiction Medicine Research



Predictors of treatment outcome for pathological gamblers

Epigenetics of Pathological Gambling



Lofexdine Study: A double-blind randomised controlled clinical trial of Lofexidine versus Diazepam in the management of the opioid withdrawal syndrome during inpatient detoxification in Singapore



Neuropsychological functioning among Addiction Patients



Research Collaborations

Local

Genome Institute of Singapore
Singapore Clinical Research Institute
Duke-National University of Singapore (NUS)
Graduate Medical School
Centre for Bioethics, YYL School of Medicine
Dept of Biochemistry, Centre of Life Sciences
Saw Swee Hock School of Public Health
Singapore Armed Forces
Singapore Prison Service
Ministry of Health Singapore
Singapore Bioimaging Consortium
National Neuroscience Institute
Nanyang Technological University
Alexandra Hospital
Singapore Millenium Foundation

International

Duke University Medical Centre, Durham, USA
Harvard School of Public Medicine, USA
University of Melbourne, Australia
University of Hong Kong
RAND Corporation, USA

National Institute of Mental Health (NIMH), USA Hadassah-Hebrew University Medical Center, Israel Nagoya University Graduate School of Medicine,

Japan

Shanghai Jiao tong University, China University of Delhi, India Psychiatric GWAS Consortium, International Schizophrenia Consortium, Molecular Genetics of Schizophrenia



OUR STRENGTHS

- Access to large patient population
- Single Institute with high level of clinical expertise serving at the national level
- Large diverse patient population: Chinese, Malays, Indians
- Intact medical records from first contact with accessibility to families
- Established research infrastructure
- Strong collaboration with other research centres
- Research Performance (2005 to present)
 - Total amount of extramural grants: 56.1million SGD
 - Total number of peer-reviewed papers : 424
 - Total number of patents and copyrights: 3



Contacts of Lead Investigators

Dr Mythily (mythily@imh.com.sg)
Population based research and policy studies

A/Prof Sim Kang (kang_sim@imh.com.sg)
Neuroimaging

Dr Jimmy Lee (jimmy_lee@imh.com.sg)
Neurocognition, genomics

Dr Lim Choon Guan (choon_guan_lim@imh.com.sg)
Child and Adolescence

Dr Guo Song (song_guo@imh.com.sg)
Addiction