Compilation of Abstracts

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“Embracing Challenges, Providing Solutions”

19 - 22 August 2015 | Venue: Sheraton Imperial Kuala Lumpur Hotel
ASCAPAP

Plenary Sessions

P1
Advancing Child and Adolescent Psychiatry and Mental Health through Asia
Norbert Skokauskas
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Mental Health is an essential part of children’s and adolescents’ health. It interacts complexly with general physical health and significantly impacts upon ability to succeed in school and society. Furthermore, 70% of mental health disorders have their onset prior to the age of 25 years. Untreated mental health problems in childhood can be transmuted into various psychiatric diseases. Moreover, there are several psychiatric disorders (i.e. early onset neurodevelopmental disorders) that are most often diagnosed in childhood and that require early interventions.

Despite the general consensus on the importance of youth mental health, the scarcity of child and adolescent mental health services is prominent all over the world with some exceptions. Child and adolescent psychiatry (CAP) postgraduate training can play a pivotal role in increasing access to youth mental health services. There seems to be several obstacles to the development of CAP postgraduate training, including stigma towards mental health issues and lack of funding.

In order to investigate CAP needs in Asia, the Consortium on Academic Child and Adolescent Psychiatry in the Far East (CACAP FE) was established in 2011. The Consortium led by Prof. Norbert Skokauskas and supported by the World Psychiatry Association, Section on Child and Adolescent Psychiatry collected data from 17 countries and functionally self-governing or specially administered areas in Asia.

This presentation will report main results of information gathered through this Consortium and discuss potential future implications for CAP in Asia.

P2
Positive Mental Health: What It Is, and Can It Be Achieved
Bruno Falissard
President
International Association for Child and Adolescent Psychiatry and Allied Professions (IACAPAP)

There are many theories of happiness. Several of them insist on the development of positive emotions, traits or behaviors: positive psychology and positive mental health are some scientific updates of these traditions.

Psychiatry is not the science to treat mental disorders but the medical discipline that proposes answers to people who call for some help because they suffer in their mind or from their behaviors. Psychiatric practice does not consist in replacing ill-being with well-being, psychiatry is not dealing only with the questions of suffering and happiness. Psychiatric practice consists in a meeting, which also questioned the existence and the finiteness of both patient and doctor. Psychiatry combines technical aspects, which come to rescue the defective brain and the
suffering subject, with human relationships, which can be extraordinarily complex in nature and goals.

Positive psychology and positive mental health, in their intention to make people happy, could appear somewhat naïve in the context of clinical practice, but they oblige clinicians to think differently, to challenge the interpersonal routines they have worked out with time.

P3 Unavailable

From Research to Clinical Practice: Genetic Validity of Autism and ADHD
Susan Shur Fen Gau
Department of Psychiatry, National Taiwan University Hospital and College of Medicine, Taipei, Taiwan

P4
Managing Adolescents in An Inpatient Setting
Anthony James
Child and Adolescent Psychiatrist, University of Oxford, and Highfield Adolescent Unit, Warneford Hospital, Oxford, UK.

Adolescent inpatient psychiatry is often a complex, demanding and costly provision. This talk will highlight processes around the admission and discharge, while emphasising the need for integrated community services, including alternatives to admission. In the UK there has been a crisis in bed availability. The reasons behind this, and how services can be developed are discussed.

P5
The Good Enough Healer: How Good Enough Parenting Can Inform Our Practice
Andrew Wake
Child and Family Psychiatrist (AUS)

Winnicott’s ideas around “good enough” parenting have been used for decades by child psychiatrists and therapists when working with the relationship between a parent and a child. The hopes, desires, expectations and dependencies between a parent and child can help explain the wide variations in how a child interacts with their parent. When it comes to discomfort and seeking relief, our first healer is our mother who “kisses and makes it better”.

When we consider the doctor-patient relationship, there are many features that echo the parent-child relationship, especially dependence and magical expectations of healing. At an attachment level we can be on the receiving end of a range of helpful and unhelpful hopes and beliefs. Having an understanding of the emotions and behaviours within the parent-child relationship and how to manage them has applicability in understanding and managing similar interactions with our patients and ourselves. The confidence of being a “good enough” healer is as important as the parent’s confidence they are a “good enough” parent.
P6
Children and War: Pathways to Resilience
John Fayyad (LBN)

Children and adolescents in developing countries are exposed to war trauma and conflicts yet there are limited local country resources to provide them with mental health support. Interventions are needed to reach the largest number of children possible, and while many international organizations offer “expertise” in psychosocial and mental health support, the evidence for such programming is, at best, limited. There is an urgent need to promote and conduct research at a local level using sound scientific methods in order to build evidence for what works and what does not. Building resilience while conducting interventions is of paramount importance. The presentation will highlight findings from researching outcomes and interventions in two separate wars in Lebanon, illustrating with data from prospective studies as well as controlled interventions, highlighting challenges encountered and unique opportunities for the advancement of knowledge emanating from real world settings.

P7
Lessons from MH 370 and MH 17
Toh Chin Lee
Senior Consultant Child and Adolescent Psychiatrist, Selayang Hospital.

When disaster strikes, mental health professionals have to be ready to provide mental health and psychosocial response as soon as possible. This means that preparations have to be made way in advance of any occurrence so that rapid mobilization is possible.

The twin tragedies of the disappearance of Malaysia Airlines flight MH 370 and the downing of flight MH 17 in March and July of 2014 respectively were tremendously challenging to manage in every imaginable aspect. The previous experiences in managing other tragedies helped the mental health and psychosocial teams involved to respond rapidly and effectively to the needs of the family members and friends of the victims. Details will be discussed and lessons learned can be used for improving the responses for the future.

P8 Unavailable
Developing Serious Games in Child Psychiatry: A Peep into The Future
Daniel Fung
Chairman Medical Board, Institute of Mental Health Singapore,
Adjunct Associate Professor, Duke-NUS Graduate Medical School and
Yong Loo Lin School of Medicine, NUS, Lee Kong Chian School of Medicine, NTU (SGP)

P9
Early Psychosis
Jean Starling
The Walker Unit, Concord Centre for Mental Health
Clinical Senior Lecturer, Sydney Medical School, University of Sydney

Schizophrenia, and to a lesser extent, other psychotic disorders, are severe mental illnesses with a high burden of disease. While there has been increasing optimism in the field, particularly with the development of the concept of first episode psychosis and the push for early identification,
much less is known about the less common phenomenon of psychotic disorders in children and young adolescents.

This plenary reviews recent literature on early (EOP - under age 18) and very early onset (VEOP - age 12 and under) psychosis, including childhood onset schizophrenia, early onset bipolar disorder and other psychotic disorders. The EOP literature demonstrates widespread abnormalities in neural structures and pathways as well as complex genetic and environmental risk factors suggesting that these disorders are complex with multifactorial antecedents. Integrative theories, particularly those that consider age of onset, will also be reviewed.

The clinical picture of these disorders will then be presented, with insidious onset of disease, pre-existing neurodevelopmental abnormalities, and poor response to treatment being more common, particularly in the VEOP group. Common co-morbidities such as autism spectrum disorder and a history of complex trauma will also be discussed, and what these mean for assessment and treatment.

Finally strategies for treatment will be presented, including evidence based medication strategies and psychological therapies. Cognitive remediation and educational options will be discussed, as will suggestions for working with families and schools.

In summary, while VEOP and EOP are often severe and difficult to treat, there is a rapidly increasing understanding of the psychopathology of these disorders, leading to a wider range of intervention strategies to reduce severity of illness and maximise the chances of maintaining a normal developmental trajectory.

P10 Unavailable

Nurture versus Nature: Maternal Care, Stress and Genes Expression
Michael Meaney (CAN)

Lectures

L1

Sex Education in A School Setting: The Victorian Family Life Experience
Vanessa Kellam
Australia

Family Life Victoria is a not-for-profit, non-government organisation that specialises in sexual and reproductive health. “We are committed to excellence in sexual health education, affirming that all people are sexual throughout life, have a right to information and choice, and that acceptance of sexuality is integral to health”(Family Life Victoria, 2014 Annual Report). As an educator for Family Life it is my privilege to teach children from the ages of 5 to 16 about their bodies and sexuality. The programs I facilitate are carefully designed to be age appropriate and culturally sensitive, but blatantly honest. Parents and teachers recognise that sex education is vital but often don't want to be the people to deliver it. Sex Education is a field fraught with controversy and fear but the benefits of an excellent program are worth fighting for. Sexuality education begins at birth, and continues throughout the lifespan. It should serve the child's needs and development, not the adult's fears or politics. It should be a strong, clear voice calling for
honesty, respect and purity. And it should never shy away from valid questions about morality and faith and the juxtaposition of modern, secular values. A challenge and privilege indeed!

L2
Managing Treatment Resistance in Young People
Jean Starling
Australia

One of the great joys of working with children and teenagers is having the opportunity to intervene early and be able to prevent serious ongoing mental illness. The majority of the disorders we treat, including anxiety disorders, depression, and behavior disorders, respond to early intervention, thus reducing the sequelae of the disorder for both the child and their family. However, even with early intervention there are some disorders where treatment appears to have limited success. Treatment resistance is also more likely when major mental illnesses such as schizophrenia present in childhood or early adolescence.

This presentation will discuss what diagnostic, individual and family factors are associated with treatment resistance, or incomplete recovery, including how to identify these factors early in the course of treatment. The common co-morbidities associated with incomplete recovery including autism spectrum disorder and a history of trauma will also be described.

The final section of this talk will discuss approaches to manage children and teenagers who have made an incomplete recovery from their mental illness. Strategies will include community and inpatient management, including work with both the young person and their family (or carer). Types of therapy and medication options will also be presented. There is now increasing evidence that young people with disorders that are initially difficult to treat can improve significantly with more time and more innovative treatment options.

L3
Hatred the Forgotten Emotions
Andrew Wake
Australia

For an emotion that is so universal and causes so much misery and distress at an individual through to a societal level, it is surprising how little it is a focus of our clinical practice. We work with our depressed and anxious adolescents, but at times miss their seething and rage. It is often dismissed and not volunteered as a problem, and often hidden through passive aggression or self-directed through self-harm or suicidal thinking. Yet to miss it is to miss an emotion that steals energy, is a joy-killer, and poisons positives in life, keeping them stuck in their misery. Klein’s view was that hatred was the core of all personality disturbance.

I will present an approach to understanding and assessing hatred, and a structure to help children and their parents to be able to think about and talk about it, and either act on it or get over and repair it.
Childhood Mental Illness in Asthma, Epilepsy and Diabetes
Benjamin Baig
Department of Child and Adolescent Psychiatry, Institute of Psychiatry, Kings College, London

Children and young people (CYP) with physical illness have higher rates of mental illness. Up to 21% of children with Asthma will have a mental illness. Approximately 30% of children with “uncomplicated” epilepsy and 50% of children with “complicated” epilepsy meet criteria for a mental illness. More than one third of young people with type 1 diabetes have a mental illness and they have twice the odds of poor glycaemic control.

In adults, this comorbidity is known to increase physical symptoms, disease severity, pharmacy costs, hospital admissions and their duration and emergency presentations. Despite this, mental illness in the population goes undetected and untreated in up to 60% of cases. While considerable work exists in adults, less has focused on children.

This presentation will include work from systematic reviews of Asthma and Epilepsy and comorbid mental health problems and a cross sectional case record based study of 10450 patients known to mental health services in London.

While there have been major improvements in service design for adults with physical illness and comorbid depression, evidence for equivalent models in children and adolescents is scarce. This presentation will look at children with a mental health service contact in south London and consider design of new health service models. The Children and Young People Health Partnerships (CYPHP) will be discussed as an innovative paediatric health care model, which can incorporate mental health management.

Managing Strong Emotions in The Classroom
Vanessa Kellam
Australia

As a secondary teacher, strong emotions are my reality, and one of my specialities. Fortunately, my educational approach does not allow them to become my problem. The 3Cs and the 4 Stage Plan (using triune brain theory as a foundation) have been designed to provide parents and teachers with a method of managing strong emotions and enabling young people to self evaluate and modify their own behaviour. It is vital to understand that a curious and co-operative approach underpins the 4 Stage Plan and the 3Cs. It is not just the strategies and methods used to modify behaviour that count but it is also the approach that will encourage long term success and make a teacher's job more satisfying. A plan or strategy implemented in a curious, supportive way by a teacher with their 'human' brain engaged is always going to be more successful long term than the same strategy implemented by a judgemental teacher, whose 'reptilian' brain is quick to surface when threatened. Students with strong emotions require a sense of security even in the midst of being disciplined. The frustrating student, of course, is going to require more discipline than the average, compliant student. It is these insecure students who feel incredibly anxious and unsafe, exhibit frustrating behaviours in the classroom, and consequently require deliberate and careful management. The core intention of the 4 Stage Plan is to cause specific
students to learn how to modify their own behaviour rather than the teacher having to dominate students in the traditional model. The goal is that students will quickly learn the progression of the plan and learn to censure their own behaviour before the last stages even need to be implemented.

L6
Mood Disorders and Psychosis in Children
Anthony James
United Kingdom

Mood disorders- depression and bipolar disorder - have been increasingly recognized. This talk will demonstrate recent findings from epidemiological surveys, particularly focusing on international comparisons, such as those from England and US. In adolescent psychiatry the recognition of psychosis, high-risk states and the transition to psychoses, as part of an early intervention service has become increasingly important. Current findings – from neuroimaging, genetics, and the treatment of adolescent-onset psychoses and schizophrenia will be highlighted with reference to the NICE (UK) guidelines.

L7
Handling Self-harm Behavior in Adolescents
Anthony James
United Kingdom

The prevalence of self-harming behavior has increased. Its management throws up considerable practical and therapeutic problems. The epidemiology and implications of self-harm are interesting and raise issues for practicing mental health practitioners. This talk will focus upon some of the treatment approaches and the results of recent treatment trials such as dialectic behavioural therapy DBT.

Symposia

1A
Nusantara Ballroom 3, Level 2: ASCAPAP Free paper 1: Thursday, 20/08/2015, 1430-1600
Mental health among young prisoners in Cambodia, -a protocol for study
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In Cambodia the prisons are overcrowded with a mean occupancy rate of 170% and about 30% of inmates are adolescents. Lack of access to mental health services and poor conditions within the prisons cause deterioration of mental health. The aim of this study is to measure the prevalence of mental health problems as well as outcome of mental health intervention among young prisoners in Cambodia. Method: 394 out of 944 prisoners between 15 to 24 years from randomly selected three prisons in Cambodia will be the intervention group and the rest from four other prisons will be the control. Instruments for the quantitative study are: Youth Self Report (YSR), Attitudes Towards Suicide (ATTS), and Life Skills Dimension Scale Adolescent Form (LSDS-AF). Intervention group will receive 8 modules each of life skills-education and a
package of stress management and relaxation training, while the control group will receive three sessions of mental health awareness. Baseline and post-intervention data will be compared using effect size statistic. Results: A pilot test field-testing the instruments showed young prisoners having significantly more mental health problems and suicidal expressions than those outside of prisons and this trend will be confirmed in the larger sample. The intervention group will show significant reduction in mental health problems and suicidal expressions than the control group. Discussion: This will be the first ever study to measure the prevalence of mental health problems and suicidal expressions among young prisoners in Cambodia. The expected findings will add substantial knowledge on the prevalence of mental health problems among young people in the prisons and the effectiveness of intervention by mental health para-professionals, vindicating the task-sharing approach in resource-poor settings.

**Child Maltreatment in Taiwan from 2004 to 2013: A Shift in Age Group and Abuse Type**

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The prevalence of child maltreatment is increasing in Taiwan. Efforts to address child maltreatment, including the collection of epidemiological data to develop an effective public-health approach are rare. Hence, this study analyzed substantiated child maltreatment cases in Taiwan over the past decade to determine any new developments. Data for analysis and estimates were based on substantiated cases of child maltreatment from the Department of Statistics in the Ministry of the Interior from 2004 to 2013. Trend analyses were conducted using the joinpoint regression program. The child maltreatment rate in Taiwan was found to have tripled from 2004 to 2013, with an 11.63% average increase per year during that period. A greater increase in the maltreatment of girls than boys and the maltreatment of aboriginal children than non-aboriginal children was noted from 2004 to 2013. Stratified by age group, the increase in maltreatment was most pronounced in children aged 12–17 and girls aged 12–17 experienced the greatest increase in maltreatment. Regarding the distribution of abuse type, child neglect is decreasing in Taiwan, whereas sexual abuse is rapidly increasing and has replaced neglect as the second most common type of child abuse in Taiwan. Furthermore, the mortality rate of children with substantiated maltreatment record is increasing in Taiwan, whereas the mortality rate among children without any substantiated maltreatment record is decreasing. The results of this study highlight the need for policy reform in Taiwan regarding child maltreatment.

**Pattern of management for First Episode Psychosis in Child and Adolescent Psychiatry Outpatient Clinic Cipto Mangunkusumo Hospital Jakarta Indonesia**

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Abundance of data accumulated over the past two decades supports the value of early intervention following the first episode psychosis. Variety of intervention has been studied to ameliorate psychotic symptoms and promoting functional recovery. Cipto Mangunkusumo hospital is the national refferal hospital in Indonesia. No intervention guideline has been
established specifically for management of adolescent with first episode psychosis in Indonesia. Method: Cross-sectional study on pattern of management of first episode psychosis in child and adolescent psychiatry outpatient clinic Cipto Mangunkusumo Hospital, Jakarta Indonesia. Result and Discussion: Intervention that has been provided for first episode psychosis patients includes antipsychotic medication, supportive and cognitive behavioral psychotherapy, family education and support, or educational and vocational rehabilitation. This intervention found to be effective in reducing clinical symptoms (CGI-S and CGI-I) and improving patient function (GAF). Conclusion: First episode psychotic is the crucial to time to give proper management to improve the patient outcome and functionality.

Study on the Prognosis of the Emotional and Behavioral Problems of the Japanese Youth
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Kabuki-Cho Mental Clinic (formerly Kita-no-Maru Clinic)\textsuperscript{b}
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An extensive questionnaire survey was done among members of the JASCAP to investigate how they estimated the prognosis of the emotional and behavioural problems among Japanese youth. The questionnaire was mailed at the end of January 2015 to all the members of the JASCAP, which consisted of 3,454 members. There were 1,633 psychiatrists, 312 pediatricians, 34 other physicians, 942 psychologists, 181 teachers, 23 nurses, and 329 other paraprofessionals, as of 15 October 2014. The questionnaire consisted of the demographic factors (age, gender, occupation, career) and 14 emotional and behavioural problems. The respondents were asked to rate the one year’s treatment outcome of hypothetical 16 years old patients with each problem, assessed at a score of 40 according to the GAF scale \([1-100]\) (=Global Assessment of Functioning; DSM-IV-R) at their first visit.

The response rate was 17.6%. Among occupations, there were 304(18.6%) psychiatrists, 61(19.6%) pediatricians, 6(17.6%) other physicians, 172(18.3%) psychologists and 64(12.0%) others, which made no significant differences. About gender, 312 males and 294 females, a total of 606 answered. With regards to their age, respondents' average age was 47.7 ± 11.8 years [23-85] and their average career was 19.4 ± 11.7 years [1-60].

Emotional and behavioural problems were estimated in order of high ratings of GAF scales; psychological reactions (64.2), neurosis(63.3), depression(62.2), bully victim(58.1), nonattendance at school(57.7), developmental disorders(55.4), self-harm(54.2), schizophrenia(53.9), suicide attempt(53.2), domestic violence(52.7), eating disorders(52.4), delinquency(51.5), social withdrawal(48.7), drug and alcohol abuse(47.6).

A Systemic Model for Improving Mental Health of Children with Developmental Disabilities in Care Settings: A South Australian Perspective
Mohammed Usman*, Wendy Warren
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Children with developmental disabilities are at increased risk of mental health disorders. Australian studies identify that only 10% of these vulnerable children have access to specialized mental health services. Children in Out- of -Home Care settings often present with complex psychopathology with high prevalence of emotional and behavioural disorders. EBL is one of the
accommodation service providers in South Australia. This is a not-for-profit organization that works with parents, government and other service providers to provide a range of accommodation for people with developmental disabilities. We present a model developed by EBL that enhances the mental health of children with developmental disabilities. Model Used Understanding the impact of mental health issues in children with developmental disabilities, EBL in conjunction with Consultant Child and Adolescent Psychiatrist, developed a therapeutic team around the child. The therapeutic team directly reports to the CEO and changes suggested were implemented. The organizational structure and the model used will be presented in detail, using two case examples. Results In the two case examples, significant improvement in mental, physical and social well being were noted. There was significant reduction in the use of psychotropics, restraint and inappropriate presentations to the Emergency Department. The organization also noticed a high staff retention rates. Discussion Psychiatrists and specialized mental health team’s expertise is much needed for children in out of home care placements. This will lead to improvement in the physical, mental and social wellbeing of children with developmental disabilities.

2A
Nusantara Ballroom 1, Level 2: Thursday, 20/08/2015, 1515-1600

Sleep problems in child psychiatric practice: an interface of clinical and cultural aspects
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Sleep disturbances are currently common problems in children and adolescents. It has been estimated that as many as thirty percent of children may have a sleep disorder at some points during their childhood with a higher prevalent in children with developmental disorder, particularly children with autistic spectrum disorder. Although some of the problems can be spontaneously resolved, a significant number of children will still have chronic problems that can negatively affecting their school and social functioning. Unfortunately, many childhood sleep disorders are often unidentified by caregivers, and unrecognized nor undertreated by health care providers. Additionally, cultural belief systems may impact the patterns of children’s sleep as well as complicating the use of children’s sleep screening tools, which are mostly adopted from Western countries. Developing effective and culturally relevant screening tools and methods are essential steps that need to be addressed.

Accordingly, the presentations in this symposium aim to narrow the knowledge gap, raise awareness of sleep disorders in children, and discuss a practical approach for early detection and proper management of the problems. Two presentations will be delivered by child psychiatrists from Thailand to give an outline of common pediatric sleep disorders both in children with autism spectrum disorder and typical development. The results of two brief surveys, regarding sleep ecology and problems of Thai children, from a major pediatric center and a child psychiatric hospital in Thailand will be presented and discussed.
Rate of attention deficit hyperactivity disorder (ADHD) in siblings of probands with ADHD is 7 times higher than in general population and impaired mother-child relationship in ADHD probands had been reported. However, there is sparse research on the mother-child relationship in siblings of ADHD adolescents. This work examined mother-child relationship in affected and unaffected siblings of adolescents with ADHD as compared to that of ADHD adolescents and non-ADHD school controls. We enrolled 122 probands, aged 10-16, with DSM-IV ADHD, 44 affected and 78 non-affected siblings, and 122 non-ADHD. Both participants and their mothers received the K-SADS-E interviews and reported on mother-child relationship and family function. Both reports revealed affected siblings and ADHD adolescents had less affection/care and more authoritarian control than unaffected siblings and non-ADHD adolescents. Meanwhile unaffected siblings and non-ADHD adolescents had less impaired mother-child relationship and fewer problems with parents than ADHD adolescents. However, siblings regardless of affected status and ADHD adolescents had lower perceived family support than non-ADHD adolescents. Both mothers and adolescents had similar views on reports of maternal overprotection and mother-child relationships, yet disagreed on reports of maternal affection and control, problems with parents and perceived family support. The finding suggested that the presence of ADHD had impact on maternal parenting behaviors toward the children themselves; whereas, having a child with ADHD was associated with decreased perceived family support regardless of ADHD status in the same family.

The impact of mood disturbance on the adolescents with ADHD screened by the adult ADHD self-report Scale
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Mood disturbance in adolescents with attention-deficit/hyperactivity disorder (ADHD) is prevalent and associated with poorer psychosocial functioning. This study aimed to screen ADHD in a sample of high school students using the adult ADHD self-report Scale (ASRS) and to evaluate the impact of mood disturbance on their adaptive functioning and quality of life one year later. In the first year, adolescents aged 15-17 from a Taiwanese senior high school (n = 1,080) completed the ASRS, Mood Disorder Questionnaire (MDQ), and Beck Depression Inventory (BDI). A subgroup of respondents (n = 184) picked randomly were interviewed to validate the diagnosis of ADHD. In the second year, the Social Adjustment Inventory for Children and Adolescents (SAICA) and World Health Organization quality of life assessment-
brief (WHOQOL) were applied for the same sample of subjects for measurement of their adaptive functions and quality of life. The Cronbach \( \alpha \) coefficient of the ASRS was 0.863. ASRS score of at least 17 showed good sensitivity (69.0%) and specificity (68.5%) for ADHD. In follow-up evaluation in the second year, ADHD adolescents with MDQ score \( \geq 7 \) had poorer social adjustment compared to those with only ADHD. Additionally, ADHD comorbid with depressive symptoms predicts both worse social adjustment and life quality. Our findings suggest that untreated mood disturbance among adolescents with ADHD leads to impaired social adaptive functioning and poorer quality of life in the next year. Early identification of mood disturbance may help adequate intervention for this population.

3A
Nusantara Ballroom 1, Level 3: Handling Custody Issues: Advocating for Children’s Right, Thursday, 20/08/2015, 1630-1730

Legal parameters surrounding custodial disputes: An overview
Farah Nini Dusuki
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Custodial dispute is but one of the most common and potential consequences of a marital discord, and often a complex one too as children have special needs of their own. Realising the children have special needs and rights of their own, a special Convention is relegated for this purpose – the United Nation’s Convention on the Rights of the Child (UNCRC), accepted by the General Assembly in 1989 and ratified by Malaysia in 1995. This document lays down four main principles underlying the basic rights of children – the best interest principle, principle of non-discrimination, right to survival, protection and development and right to participation. In making any decisions in respect to any child, these four main principles must be the main considerations of any professionals. This paper seeks to outline the legal parameters surrounding the issue of custodial dispute and places the UNCRC as the main backdrop with the existing domestic laws as the actual thresholds for determination and guidance.

Handling custody issues: Advocating for Children’s Rights
Manveen Kaur
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Appearing in Court for child custody cases is a daunting task for any clinician. Child & Adolescent Psychiatrists, however, are often expected to undertake this role, serving as expert witnesses for court. However, they often find themselves ill prepared for this role. As expert witnesses, clinicians are required to present scientific knowledge, and to use research findings along with their clinical expertise, to support their recommendations. The role of treating clinicians is distinctively different from the role of an evaluator of custody. Therefore the definitive role of the Child Psychiatrist in custody assessments needs to be well defined, and clinicians need to be aware of common pitfalls, that they could face in court. The very nature of report writing for court purposes also needs to be understood. Nevertheless, the fact still remains that the best mental health guidance for court, comes not from literature but from a careful and comprehensive clinical assessment of the particular family.
Sports betting – some issues regarding adolescent gambling behavior
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Sports are often very much instrumental in provoking the thrill of victory and the agony of defeat. The young-adolescents, today with these provocations, are getting involved in placing wager on the outcome and adopting newer gambling-specific behavior. Although gambling has been long recognized as an adult past time; but in recent years, it has significantly increased among adolescents. It is observed that – movies, TV shows, and increased access to gambling through the Internet have helped embed gambling in modern youth culture. To, many a mental health-professionals this ‘relatively harmless activities’ may lead to risky or undesirable behavior, and can became a serious life-impeding addiction. This paper, aims at sharing some observation regarding ‘SPORTS BETTING’, from a country like Bangladesh, where poverty, wealth, religion, and consumerism remain intermingled.

IT advancements in therapeutic interventions for Child and Adolescent Mental Health.
Parenting Wisely; Web Parenting Interventions for disruptive behaviour
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Reviews of parenting interventions find that they are effective in Disruptive Behaviour Disorders. This intervention is hard to access due to constraints of a busy lifestyle. Behaviour management is carried out by a variety of caregivers (e.g. grandparents, relatives and domestic helpers). They may not be able to access the clinic. Hence, an accessible approach to the management of disruptive behaviour disorders would help these families.
Web based parenting (Parenting Wisely) has been found to be effective in the National Registry of Evidence Based Programs and Practices. The studies have been done in the US and UK. It is an interactive program that can be access from home at the convenience of carers. It covers specific modules that are generic to parenting and appears to have face validity. Singapore has a high level of Internet usage amongst users/parents. Parents and users may be able to access this more readily that parent behaviour management groups.
Patients with Oppositional Defiant Disorder and Conduct Disorder were recruited to a waiting list controlled trial to determine the utility and effectiveness of Parenting Wisely in the Singapore context. Parents and Children are monitored using the SDQ, SMHWS, PSI, DASS and a user satisfaction questionnaire. The study will focus on both child and parent measures over the period of the intervention/control. We will present provisional information from a study using this application in Patient of the Child Guidance Clinic and our School Partners – REACH.
Supporting families of adolescents with substance abuse
Mohd Fadzli Mohamad Isa
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Family involvement in the planning and delivery of services with practitioners at all levels - community, district, state and country - is beginning to happen and hopefully the substance abuse treatment system will continue to strengthen and support such efforts. Family involvement is necessary to improve the quality of care provided and to insure that all adolescents and their families in need of substance abuse treatment receive accessible, appropriate and quality treatment.

Family members are learning how to speak out, support each other and advocate for their sons and daughters who suffer from the impact of alcohol and other drugs, but concerns remain. Family members must continue to work so that their voices will be heard. Professionals and public officials must continue to form collaborative partnerships with family members. Working together will not only create a substance abuse system that is relevant, responsive and results-driven, but also one that will reduce and ultimately eliminate the shame, stigma, disparities and discrimination associated with the impact of alcohol and drug dependence.

Challenges in treating adolescent with substance abuse
Nozliza Chemi
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Substance abuse among adolescents are increasing and becoming a worrying nation issue. A study by Yusoff F et al, 2014 reported the prevalence of adolescents who used illicit drugs was 1.7%.

Adolescence is a period of a lifecycle when individuals are managing multiple, complex development task. These involve significant changes in biological, psychological and environmental/community related domains.

In this stage, an individual starts to engage in high risk behaviours, experimenting new things in life – sexual activity, criminal/delinquent acts and also trying new encounters in life e.g. illicit substances.

Managing a growing adolescent is a challenging task and it is even more if they have substance abuse problem. Treating those with such problems require a multidimensional approach. This includes biological, psychosocial- involving families, schools and other significant related agencies.

The challenges include the prevalence of adolescent substance used disorder itself, understanding the biological development of adolescent brain and in general there is lack of adolescent specific treatment services for this group in our country.
Most children with Autism Spectrum Disorder have marked difficulties in social interaction and communication skills. As each child’s language abilities are varied, finding the right therapy approaches can be a challenging task. While it is important to identify each child’s individual needs, it is equally important to support the family’s needs in the management of ASD. In this symposium, I will be discussing on the various approaches available in the area of speech and language therapy.

Current Approaches in Managing Children with Autism spectrum disorder
Dr. Farahidah Md.Dai, Child and Adolescent Psychiatrist, Hospital Sultanah Aminah Johor Bahru, Johor, Malaysia

Autism Spectrum Disorder (ASD) is a neurodevelopmental disorder characterised by impairments in communication, behaviour and social functioning beginning in childhood. A feasibility study on the use of Modified Checklist for Autism in Toddlers (M-CHAT) among children of 18 to 36 months of age in child health clinics by Ministry of Health Malaysia, the prevalence of ASD in Malaysia was approximately 1.6 in 1,000. The aetiology of ASD is unclear. It is multi-factorial which includes both genetic vulnerability and environmental factors. Genetic, prematurity, neonatal encephalopathy and advancing parental age are among the important risk factors. Comorbidities are common in ASD and may cause significant clinical impairment and difficulties in these children. CPG on Management of ASD in Children and Adolescents developed by MOH makes several recommendations in managing these children.

Clinical guideline for TS in China
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A working group of the China for the Study of Tourette Syndrome has developed the first Chinese guidelines of Tourette Syndrome (TS). The Detailed clinical assessment guidelines of tic disorders and their comorbidities in both children and adults are presented. Screening methods that might be helpful and necessary for specialists’ differential diagnosis process are suggested in order to further analyse cognitive abilities, emotional functions and motor skills. We present a summary of the current consensus on pharmacological treatment options for TS in Child and world to guide the clinician in daily practice. We also present a comprehensive treatment mode with Chinese characteristics.
**Pharmacotherapy for Tourette syndrome and other tic disorders in Japan**

Yukiko Kano*, Natsumi Matsuda*, Namiko Kaji*, Miyuki Fujio*, Maiko Nonaka*, Toshiaki Kono*

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Clinical guideline for Tourette syndrome (TS) and other tic disorders has been developed in North America and Europe, and demand for the guideline with high evidence is increasing in Asia including Japan. In order to establish the Japanese guideline, we have done a preliminary survey about patients with TS at our hospital, and designed a survey about pharmacotherapy by specialists of tic disorders. We investigated 36 patients with TS (25 males, 11 females; mean age: 24.3 years old, SD: 9.8 years old). As for current comorbid disorders, 7 patients had obsessive-compulsive disorder (OCD), and 5 patients had attention-deficit/hyperactivity disorder (ADHD). Mean total tic severity score of Yale Global Tic Severity Scale (YGTSS) was 19.1 (SD: 11.1). Thirty-four patients of the 36 took psychotropics. Antipsychotics most frequently prescribed for tics were aripiprazole (n=21), followed by risperidone and haloperidol (n=7). Serotonin reuptake inhibitors (SRIs) were prescribed to 14 patients, and most prevalent one was fluvoxamine (n=8). Four patients of the 7 with comorbid OCD took SRIs, and 2 patients of the 5 with comorbid ADHD took atomoxetine. Based on results of this preliminary survey and additional analysis of previous survey about treatment for tic disorders in Japan, we developed a new survey form. After collecting specialists’ experience and opinions about pharmacotherapy by this form, process to reach consensus by Delphi method is expected to contribute to improvement of treatment with establishing guidelines.

5A Unavailable

6A

Nusantara Ballroom 1, Level 2; Saturday, 22/08/2015, 1115-1200: Neurobiological studies on ADHD and ASD 1

**The Psychosocial Functional Improvement of Methylphenidate and Atomoxetine on Drug-naïve Children with ADHD: Focus on YSR, CBCL, SDQ and SAICA**

Hung-Kuang Su, Chi-Yung Shang, Susan Shur-Fen Gau

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Attention deficit/hyperactivity disorder (ADHD) is a worldwide pediatric mental disorder with high prevalence range from 5% to 12%. The primary treating medications are methylphenidate and atomoxetine. Despite comparable efficacy, different dimensions of psychosocial aspect remained a major concern from clinicians, especially the changes of several rating scales after adequate medical intervention of the above 2 medications. The aim of this study is to investigate the improvement of psychosocial function by conducting a head-to-head comparison study to discriminate mean changes in 4 questionnaires, including Youth Self Report (YSR), Child Behavior Checklist (CBCL), Strengths and Difficulties Questionnaire (SDQ) and Social Adjustment Inventory for Children and Adolescents (SAICA) of drug-naïve children with ADHD after long-term pharmacotherapy.
Methods: 160 drug-naïve children with ADHD, aged 7 to 16, were randomized to 24 weeks of treatment with methylphenidate (n = 80) or atomoxetine (n = 80). The outcome measure was the score of YSR, CBCL, SDQ and SAICA at baseline, week 8 and endpoint (week 24). Results: Mean differences from baseline to week 8 and from baseline to endpoint of methylphenidate group and atomoxetine group both reached statistical significance in YSR, CBCL, SDQ and SAICA. No statistically significant differences between the 2 treatment groups were observed. Conclusion: The current findings suggest that both methylphenidate and atomoxetine could cause clinical improvement of psychosocial adjustment behaviors in drug-naïve children with ADHD.

Differential Chronic Therapeutic Effects of Atomoxetine and Methylphenidate on Drug-naïve Children with ADHD: A Counting Stroop Functional MRI Study
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Methylphenidate and atomoxetine are two primary medications approved for treating attention-deficit/hyperactivity disorder (ADHD). Despite comparable efficacy, clinical studies revealed a differential response of these medications, probably due to underlying distinct pharmacological mechanisms. To relate neural mechanisms to clinical efficacy, the authors conducted a head-to-head comparison study to discriminate changes in brain activation of drug-naïve children with ADHD when performing neuropsychological tasks after long-term pharmacotherapy. Methods: Fifty drug-naïve children with ADHD, aged 7 to 17, were randomized to 12 weeks of treatment with methylphenidate (n = 25) or atomoxetine (n = 25). They were scanned twice using functional magnetic resonance imaging (fMRI) during the counting Stroop task, before and after treatment. Their focused attention and impulsivity were also evaluated twice by the Conner’s Continuous Performance Test (CCPT). The final sample for fMRI analysis consisted 20 and 22 in the methylphenidate and atomoxetine groups, respectively. Results: Atomoxetine down-regulated activations in the dorsal anterior cingulate cortex and dorsolateral prefrontal cortex, which were correlated with the improvement in focused attention assessed by the CCPT. In contrast, methylphenidate up-regulated activations in the inferior frontal gyrus, which were correlated with the decreasing severity of impulsivity assessed by the CCPT. Conclusion: The current findings suggest that differential chronic therapeutic effects on neuronal changes induced by atomoxetine and methylphenidate may contribute to clinical improvement.

6B
Penang Room, Level 3: Saturday, 22/08/2015, 1115-1200
IT advancements in therapeutic interventions for Child and Adolescent Mental Health.
Oon Jit Hui¹, Pearl Lock², Jillian Boon³
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Children with high functioning ASD typically has average to above average cognitive abilities; however their social skills difficulties are fairly noticeable in comparison. They experience social interactional difficulties with peers and these problems become more evident over time. As a result, children with ASD experience higher levels of psychological distress (e.g., depressive
symptoms). Distinguishing and executing evidence-based treatments for these social difficulties is of utmost importance for such children. Ideally, treatments should address both increasing skills for foreseeable social engagement as well as improving the ability for emerging long-term, quality social relationships. The clinical use of robot-assisted therapy offers remarkable potential in the treatment for children with ASD. It has been shown that the children with ASD are more responsive to feedback when administered via technology rather than with a human, more interested in treatment when it involves electronic or robotic components, imitate and maintain more frequent eyecontact with robots, increased engagement and levels of attention as well as novel social behaviors with robots. A number of case studies have demonstrated the benefits of robotic interaction on social behaviors and other studies have also shown the efficacy of a group-based social skills training program in children with ASD. Children with Autism Spectrum Disorders were recruited to a comparative study trial to determine if the use of socially assistive robotics (Cuddler) enhances social skills learning in ASD children in a group based context. Parents and Children are monitored using the SRS, SSIS, and a specific skills rating questionnaire. The study will focus on both child and parent measures pre and post 8 standard sessions of social skills group and video coding is also conducted to measure the interactions between the children and Cuddler. We will present preliminary observations from our study using Cuddler as a teacher, moderator, practice partner and reinforcer in an eight session’s social skills group program with ASD children at the Child Guidance Clinic.

IT advancements in therapeutic interventions for Child and Adolescent Mental Health. Regna Tales: A Mobile Application for Anger Management
Oon Jit Hui², Pearl Lock², Jillian Boon²
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Technology has created novel and exciting alternative approaches to traditional healthcare delivery models. “Serious games”, a classification of video games with objectives other than entertainment such as learning and performing desirable behaviors and skills have been increasingly explored. Recent studies have shown some of the benefits of serious games and their abilities for building positive therapeutic relationships. Essentially, game technology holds potential promise in delivering skills and knowledge to children using interactive features, simulations, and immersive environments. The department of child and adolescent psychiatry in Singapore has created a prototype for delivery of mental health interventions through a mobile application – “Regnatales”. The main objective of Regnatales is to encourage the player to learn and execute social responsibility through the creation of fun and engaging environments in picking up skills related to anger management and social communication. Through the use of role-playing game (RPG) environments the player is encouraged to learn skills in identification of emotions and feelings, perspective taking, coping skills, empathy, pro-social skills and problem solving. Preliminary playability tests of the web-based version of Regnatales have shown that children enjoyed playing the game and learned skills. The team is proud to present the prototypes of skills embedded in the application and are testing the playability amongst children.
Methylphenidate and atomoxetine are commonly prescribed for treating attention-deficit/hyperactivity disorder (ADHD). However, their therapeutic neural mechanisms remain unclear. Method: After baseline evaluation including cognitive testing of the Cambridge Neuropsychological Test Automated Battery (CANTAB), drug-naive children with ADHD (n = 46), ages 7–16, were randomly assigned to 12-week treatment with methylphenidate (n = 22) or atomoxetine (n = 24). Intrinsic brain activity, including the fractional amplitude of low-frequency fluctuations (fALFF) and regional homogeneity (ReHo), was quantified via resting-state fMRI at baseline and week 12. Results: Reductions in inattentive symptoms were related to increased fALFF in the left superior temporal gyrus and left inferior parietal lobule for children treated with methylphenidate, and in the left lingual gyrus and left inferior occipital gyrus for children treated with atomoxetine. Hyperactivity/impulsivity symptom reductions were differentially related to increased fALFF in the methylphenidate group and decreased fALFF in the atomoxetine group in bilateral precentral and postcentral gyri. Prediction analyses in the atomoxetine group revealed negative correlations between pre-treatment CANTAB simple reaction time and fALFF change in the left lingual gyrus and left inferior occipital gyrus, and positive correlations between pre-treatment CANTAB simple movement time and fALFF change in bilateral precentral and postcentral gyri and left precuneus. No significant results were found for ReHo. Conclusions: Robust symptomatic improvements to methylphenidate and atomoxetine were associated with divergent fALFF changes in distinct brain regions, suggesting possible neurophysiologic mechanisms of drug response.

Disorder-specific alteration in white matter structural property in adults with autism spectrum disorders relative to adults with ADHD and adult controls
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Autism spectrum disorder (ASD) and attention-deficit hyperactivity disorder (ADHD) are not only often comorbid, but also have overlapped behavioral and cognitive abnormalities. A key question is whether these shared phenotypes are based on common or different underlying neuropathologies. Therefore, this study aims to examine the disorder-specific alterations in white matter structural property.
Method: The three comparison groups included 23 male adults with ASD (age: 21.4±3.1), 32
male adults with ADHD (age: 23.4±3.3) and 29 age-matched healthy male controls (age: 22.4±3.3). Their attention performance and executive functions were assessed by computerized neurocognitive testing. After acquisition of the diffusion spectrum imaging (DSI), whole brain tractography was reconstructed by a tract-based automatic analysis, and generalized fractional anisotropy (GFA) values were computed to indicate tract-specific white matter property.

Results: There are significant differences (FDR adjusted p-value < 0.05) in the GFA values among the three groups in six identified fiber tracts: right arcuate fasciculus, right cingulum (hippocampal part), anterior commissure, and three callosal fibers (ventrolateral prefrontal cortex part, precentral part, superior temporal part). Post-hoc analyses revealed that adults with ASD had significant lower GFA in these fiber tracts than adults with ADHD. There was no significant difference in the GFA of any of the fiber tracts between adults with ADHD and healthy controls. The GFA values of some of the fiber tracts were positively associated with attention performance and executive functions, and these three groups showed differential association patterns.

Conclusions: This study highlights the disorder-specific alteration of white matter tracts in ASD and ADHD.

7B Unavailable

7C
Nusantara Ballroom 2 &3, Level 2: ASCAPAP Free paper 2: Saturday, 22/08/2015, 1430-1600
The prevalence of psychosocial dysfunction and its associated factors among out-patients of the Philippine Children’s Medical Center using the Pictorial Pediatric Symptom Checklist-Filipino Version: a cross-sectional study
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The public health significance of psychosocial problems needs to be recognized in pediatric primary care setting. This study aimed to determine the prevalence of psychosocial dysfunction and its associated factors among out-patients of Philippine Children’s Medical Center (PCMC) using the Pictorial Pediatric Symptom Checklist-Filipino version (PPSC-Fil).

One hundred fourteen (114) children and adolescents aged 4-16 who presented for well-child check-up at PCMC were screened for psychosocial dysfunction using the caregiver-completed PPSC-Fil. Pediatricians, blinded to PPSC-Fil results, rated their patients for psychosocial functioning based on their own clinical assessment.

Prevalence of psychosocial dysfunction was 20.2% (23/114). Attention and externalizing problems showed the greatest frequency in item scores. Birth order and paternal age were associated factors with significant P values based on bivariate analysis (P value=0.013, P value=0.044, respectively). Paternal age was the final independent factor on logistic regression, and relationship was inverse, i.e., the older the father, the lower the probability of presence of psychosocial dysfunction in the child (OR=0.91 or 91% less likely). Comparing pediatrician’s rating with PPSC-Fil scores, Spearman’s rank correlation value was significant (P value=0.02); as pediatrician’s rating of psychosocial dysfunction increased, so did PPSC-Fil score.

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The 20.2% prevalence rate of psychosocial dysfunction signifies a higher need for early identification and intervention measures for emotional and behavioral problems in children. Further studies are encouraged to determine risk factors for psychosocial dysfunction in the local setting. The PPSC-Fil is a useful screening tool for the pediatrician in identifying psychosocial problems.

**The effectiveness of art therapy on behavioral and emotional problems among poor caregiver 3-6 (aged) of dormitory resident**

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Maltreated children are associated with severe behavioral and emotional problems. Previous studies indicate art is a helpful tool as an intervention to express feelings, especially in children. The current study investigates the effectiveness of art therapy on behavioral and emotional problems in maltreated children. This research is a quasi-experimental study with pre and post-tests. The 21 subjects were selected from two family canters in Tehran. They were assigned randomly to the control and experimental groups.

Art therapy was conducted with the experimental group during 10 sessions (90 min for each session per week) and the control group did not receive any interventions. Then the Child behavior checklist questionnaire (Achenbach) was administered at post-test and pretest in two groups. Statistical analysis was conducted by using the analysis of variance. The results of analysis of variance showed that there is a significant decrease in internalizing problems including; irritability, anxiety/depression, isolation and physical symptoms, and externalizing problems such as; aggression in experimental groups (p<0.05).

Regarding the findings of present research, it seems that art therapy can be utilized as an effective and efficient therapeutic intervention to diminish the behavioral and emotional problems in maltreated children.

**Diagnosing specific learning disorders in a multilingual and multicultural environment**

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Specific learning disorder is a form of neurodevelopmental disorder that affects children’s attainment of key academic skills during the developmental period. According to the Diagnostic and Statistical Manual of Mental Disorders 5th edition (DSM-5), specific learning disorder affects between 5% and 15% of school-age children. One of the challenges that clinicians and practitioners face in Malaysia is the lack of availability of norm-referenced and/or criterion-referenced diagnostic tools for identifying language and literacy disabilities among school-age children who include English-language learners or learners of English as a second language. Many of the instruments available in the market currently do not have norms that include Malaysian children. In addition, Malaysian practitioners and clinicians have limited access to instruments that can reliably identify the source of the reading disabilities among English-language learners; whether it is a specific learning disorder or whether it is related to the child’s limited proficiency in the English Language. This paper will describe an ongoing research on the development of a comprehensive diagnostic tool for identifying and classifying children at risk.
for language and literacy disabilities including dyslexia. A sample of 865 primary school children from 11 randomly selected government schools in Kuching participated in the study. It is expected that the comprehensive diagnostic tool, which is in Malay and English, will be able to reliably identify reading disabilities among school-age children and, in turn, ensure that suitable forms of early and effective interventions can be provided.

**Prevalence of emotional & behavioral disorder among urban & rural school going children & adolescent in a district of Bangladesh**
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Children in the World are at risk for serious emotional and behavioral disorders because their economic and social environment hinders healthy mental development, and diminishing their potentiality. School children with emotional and behavioral problems have a substantial adverse impact on their families, schools, and their own long term well being. The main objective of the study is to find out the prevalence of emotional and behavioral disorders among school going children and adolescents in the selected district of Bangladesh. This is a cross sectional, descriptive, and analytic study carried out among rural and urban school going children and adolescents in Meherpur District of Bangladesh. The study covered period from January 2007 to December 2009. Total 450 respondents have been interviewed by using structured instrument Development And Well Being Assessment (DAWBA).

The result indicates that a total prevalence of emotional and behavioral disorders is 15.88% in rural area and 14.03% in urban area. The study findings are expected to be useful to academicians, policy makers, researchers, and professionals working in this field. The study findings generate a new insight regarding the psychological issues with causal factors that adds a new knowledge to its present body of knowledge.

**Suicidal Behavior in children and adolescent – Indo-Asian perspective**
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Suicide is a leading cause of death in adolescents. Increased trend of suicidal behavior is a point of concern globally, including Asia and India. Today India has a population of adolescents that is one of largest in the world. The WHO reports about 1 million suicides a year, which would be a rate of about 14 per 100,000 in a global population of 7 billion. By comparison, the U.S. had 37,790 suicides in 2010, or a rate of 12.2 per 100,000, while India's rate under the Lancet's projected suicide tally of 187,000 would be near 16 - far higher than earlier reports and estimates of around 10. Suicide and suicidal behavior is best understood in the context of biopsychosocial model. While numerous risk factors and protective factors have been identified for adolescent suicidality, the impact of such factors is mediated and moderated by socio-cultural factors. Though there is some similarity between such socio-cultural factors within Asian communities, variations cannot be denied. Very few studies are there from India, which has studied the actual prevalence and risk factors in adolescents. The current symposium attempts to discuss adolescent suicide keeping Indian and Asian culture and data in mind.
The findings of a study conducted in India on adolescent suicide will be discussed. Female gender, common psychiatric disorder, history of physical or sexual abuse, relationship problem, and examination failure were common risk factors and commonest method used was pesticides. Risk assessment protocols and treatment approaches will be presented and discussed.

8A
Nusantara Ballroom 1: Saturday, 22/08/2015, 1515-1600
Teenage Pregnancy: Risk Factors and Consequences
Anizah Ali, Ani Amelia Zainuddin,
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Teenage pregnancy is a worldwide issue. Pregnancy among adolescent are mostly unintended, leading to higher rates of abortion. Early sexual activity, poor contraceptive use, substance and alcohol misuse, mental health disorder, poor education attainment are risk factors for teenage pregnancy. Pregnant teenagers face additional obstetrics, medical and social issues compared to pregnant women in their twenties or thirties. Poor antenatal care is due to a higher rate of undiagnosed pregnancies and social stigmatization.

Early diagnosis of pregnancy is still challenging. Commonly encountered obstetrical and medical problems among teenage mothers are anaemia, malnutrition, poor antenatal care, preterm deliveries, low birth weight babies, obstructed labour, instrumental delivery, infant deaths and post-partum depression. Pregnancy and delivery complications are leading causes of death among teenage mothers. Babies of teenage mothers are at increased risk of developmental disabilities, behaviour issues and poorer academic performance.

Teenage pregnancies are high risk pregnancies. It should be handled in a non-judgemental manner, with early multidisciplinary involvement of obstetricians, counsellors, healthcare clinic providers, social workers, social support groups, shelter homes, and parents. Teenage pregnancy management entails thorough pregnancy counselling, early testing for sexually transmitted diseases, early antenatal booking, and initiation of folic acid containing supplements, avoidance of alcohol and harmful substances, evaluation of underlying medical or familial disorders and assessment of social support system. Effective implementation of sexual education strategies, rehabilitation centres, emphasis on religious and good moral practices as well as contraception practices are among efforts to curb teenage pregnancy.

Teenage Pregnancy- Options/Legal Issues
Sheila Marimuthu
Consultant Paediatrician and Adolescent Specialist of the Kuala Lumpur Hospital

Unplanned teenage pregnancy is on the rise in Malaysia. Malaysia has an excellent Maternal and Child Health service. The majority of teen pregnancies are handled by primary care givers. However there is an increase in the referrals to tertiary centres for young mothers –to –be who need further evaluation, protection and social support. What are the options in Unplanned Teen pregnancies in Malaysia? This symposium will address some legal aspects and options for teenagers with unplanned pregnancies in accordance to the socio-cultural and legal aspects of the country.
POSTERS

PO1
PANDAS presenting with multiple neuropsychiatric symptoms and its management: Case series
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PANDAS (Paediatric autoimmune neuropsychiatric disorders associated with streptococcal infections) is characterized by multiple neuropsychiatric symptoms. The aetiology is autoimmune mediated following group - A beta-haemolytic streptococci infections. It is rarely reported and has clinical implications.

Case description: Case 1: A 10 year old boy had abrupt onset fluctuating symptoms from one year precipitated by upper respiratory tract infection. There was family history of OCD in grandmother and depression in father. He had Obsessive thinking, Obsessive doubt, hoarding and compulsive behaviour besides motor and vocal tics. Throat swab was positive for streptococcal infection and ASO titre was 424 IU/ml. He was diagnosed with PANDAS and managed with Fluoxetine, Risperidone and behaviour therapy. There was 60% improvement in symptoms over one year.

Case 2: A 9-year-old boy presented with acute symptoms following upper respiratory tract infections from one year. He had Obsessive doubt, hoarding, hyperactivity, deteriorating handwriting, learning difficulty, compulsive behaviour besides motor and vocal tics. ASO titre was 410 IU/ml and serum antibodies were positive for CaM Kinase II, Dopamine receptor D1 and beta tubulin. He was diagnosed with PANDAS and managed with Fluoxetine, Risperidone, Methylphenidate and behaviour therapy. There was improvement in hyperactivity, tics and learning difficulty without any improvement in OC symptoms. Family refused for IVIG treatment.

Discussion: High index of suspicion is needed for diagnosis of PANDAS. The approach includes clinical and lab diagnosis. Immunomodulatory therapies and antibiotics prophylaxis may have limited options for treatment other than symptomatic management.

PO2
Kluver-Bucy syndrome (KBS) associated with Intellectual disability and Autistic features: A case report
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Kluver-Bucy syndrome is a neurobehavioral syndrome associated with a variety of neurological disorders. It is rarely reported and had variable clinical presentations.

Case description: An 11yrs old boy, 2nd class dropout presented with symptoms of insidious onset from last 3 years. Patient was born of a non-consanguineous marriage and perinatal period
was uneventful. With adequate motor development, he lagged in language and social domains. He had stereotypic interests besides poor eye-to-eye contact and emotional reciprocity. He was fidgety and hyperactive with poor peer relation and communication. In addition, from last three years he developed symptoms of hyperorality like licking inedible objects, hyperphagia with increased appetite and hypersexuality in form of touching genitals and breasts of familiar and unfamiliar adults, sneakily touching adults and demanding touching of self. He developed social disinhibition in form of urinating in public places. There was facial dysmorphism and IQ score was 53. Though metabolic workup, infectious etiology and genetic screening were negative, MRI brain showed altered signal intensity in right globus pallidum and posterior corona radiate. He was managed with Methylphenidate and behaviour intervention. There was 50% improvement in hyperactivity but other symptoms showed limited improvement.

Discussion: Kluver-Bucy syndrome results from damage to limbic system and its circuitry. It should be suspected in cases of children presenting with intellectual impairment and or autistic features. As in our case, such symptoms may be the initial presentation before classical typical symptoms of Kluver-Bucy syndrome become apparent.

**PO3**

**Specific learning disorder and its impact on family: A qualitative study**

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Children with Specific Learning Disorder (SLD) often find learning as difficult and painful process. Though, over the last decade, awareness about SLD has grown in India. However, there is less awareness among the teachers and parents. In addition, there is sparse data from India regarding challenging issues related to learning, emotional problems and overall impact of SLD on families. The aim of the study is to explore the reactions, concerns and wellbeing of families having a child with SLD. Five focus group discussions were conducted, including thirty parents of children with SLD. The themes of FGD examined various aspects of parental reaction i.e. parents’ responses towards child’s diagnosis, concerns related to child, and parental wellbeing e.g. personal, social and emotional perspective. Overall it appeared that in the initial phase, parents had difficulty in recognition and acceptance of the problem. They took lot of time in adjusting to the reality, experienced greater stress and higher levels of parental anxiety and were concerned about child’s future and achievements. Thus, SLD affected both child’s scholastic achievement and also their families.

**PO4**

**Road Safety Behaviour in Adults: Observation study in the Klang Valley**

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Road traffic crashes are a major public health issues worldwide and children are an especially vulnerable population. Unrestrained and un-helmeted occupants are at increased risk of severe injury or death in the event of a crash, and there is some evidence that children, particularly in
low and middle income countries, have low seat-belt/child restraint and helmet wearing rates. Despite legislation requiring all vehicle passengers to be restrained and all motorcyclists to wear helmets in Malaysia, wearing rates have been poor in general, and especially amongst young children. Currently there is limited scientific evidence and data available on the prevalence of wearing restraints and helmets and contribution to injury amongst children in Malaysia. Moreover, there is a lack of good understanding of the attitudes to wearing restraints and helmets (including the use of specialised protection for child occupants in the form of capsules, child seats and booster seats). This paper presents the results from the first observational phase of a study examining restraint and helmet wearing behaviour amongst children.

Roadside observations of occupants of passing vehicles (15,149 cars, vans and taxis and 6,837 motorcycles) in nearside lanes were made at ten selected road sites located around the Klang Valley (greater KL) area representing a variety of demographic locations. These resulted in recordings of restraint/helmet wearing of 24,394 vehicle drivers and passengers (of which 5,164 were front seat adults and 948 were children; 2,048 adults and 1,399 rear seat child passengers) and 3,612 motorcycle riders and pillion passengers (of which 167 were children).

The findings revealed an overall low rate of seat-belt wearing in vehicles (front seat drivers: 54.7%; front seat adult passengers: 47.2%; front seat child passengers: 16.7%; rear seat adult passengers: 5.2%; and, rear seat child passengers: 9.2%). Only 76 children were observed in child seats. For motorcyclists, the majority of adult riders and pillions wore helmets (97.4% and 85.7%, respectively), however quite a proportion (20%) did not fasten their helmet properly. Of the children observed on motorcycles as pillion passengers, 58.7% them wore helmets but majority of them (86.5%) did not fasten.

This study clearly shows low seat-belt and helmet wearing rates for all vehicle occupants and motorcyclists, despite enactment of legislation to restrain all vehicle passengers (front and rear) and for all motorcyclists to wear helmets. This was particularly evident for children (front and rear seating positions) and rear seat adult passengers. A number of reasons are suggested for these finding including habitual behaviour of adults/parents (through general lack of awareness of safety and the benefits of restraint/helmet use), unrealistic optimism (part of cognitive process/mental processing), cultural factors, and lack of adequate/appropriate enforcement. The implications of the current findings are discussed in terms of promotion on the use of restraints (all forms) and helmets, enforcement of legislation and implementation of technologies to increase appropriate restraint and helmet use for children hence the needed for further investigations on the contributing factors mentioned above.

PO5
Trends in Pharmacological Treatment for ADHD in Taiwanese Children from 2009 to 2013
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This study examines demographic trends in pharmacological treatment for ADHD in Taiwanese pediatric populations from 2009 to 2013. As a retrospective cohort study, we used the database of claims for National Health Insurance of ambulatory visit in a psychiatric center during 2009 to 2013. Patients who were younger than 18 and diagnosed as ADHD by board-certified child psychiatrists were included. Descriptive analysis was applied for demographic data analysis and
T-test and Chi-square test were used for continuous variables and categorical variables. We also used Cochran-Armitage test to perform time series analysis for evaluation of the change of trends in pharmacological treatment in ADHD. 64724 visits were included into the analysis. Those who received pharmacological treatment were older and boys were more commonly prescribed than girls. The proportion of pharmacological treatment in ADHD children increased from 62.11% to 63.15% during 2009 to 2013. The prescription of short-acting methylphenidate, long-acting methylphenidate and atomoxetine all increased. The daily dose of short-acting methylphenidate increased but no significant changes in the dose of long-acting methylphenidate and atomoxetine. The prescription of medication for the treatment of ADHD is becoming common. Age and gender remained major determinates of medication use. Among various medications, short-acting methylphenidate was used in higher dosage in recent years. The issues of off-label use of medication in ADHD children younger than 6 years remained clinical concern.

PO6
Dopamine Transporter Gene Variation Modulates Intrinsic Brain Activity in Children with Attention-Deficit Hyperactivity Disorder
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The dopamine transporter gene (DAT1) has been consistently reported to be associated with attention-deficit hyperactivity disorder (ADHD). However, studies have not characterized the resting brain alterations in children with ADHD and their correlations with the severity of ADHD symptoms. This study aimed to examine the relationship between DAT1 genotype and resting state functional connectivity in children with ADHD. Methods: Using resting state functional MRI (RS-fMRI) and genetic analysis of the DAT1 gene, we investigated how intrinsic brain activity contributed to ADHD depending on DAT1 genotype in 37 drug-naïve children with ADHD, including 17 subjects with a haplotype of rs27048 (C)/rs429699 (T) and 20 subjects without this C/T haplotype. We analyzed intrinsic functional brain architecture with the fractional amplitude of low-frequency fluctuations (fALFFs). Results: We found an association of ADHD with distinct intrinsic brain activity pattern depending on DAT1 haplotype. A haplotype of rs27048 (C)/rs429699 (T) was associated with fALFF decrease in the left superior temporal gyrus, left cingulate gyrus, and left precentral/postcentral gyri. The severity of ADHD symptom was negatively correlated with fALFF in bilateral middle and inferior occipital gyri. These results remained statistically significant after corrections for multiple comparisons. Conclusions: A novel gene-brain-behavior association was identified in which intrinsic activity alterations in distinct brain regions measured by fALFF was related to DAT1 haplotype and ADHD symptoms in children with ADHD. Our findings could be a key to better understanding the pathway from genotype to phenotype in ADHD.
PO7

Prader-Willi syndrome psychobehavioural profile in a clinic based sample
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Maladaptive behaviours and cognitive impairment can be main problems in patients with Prader–Willi Syndrome (PWS). Understanding difficulties underlying the maladaptive behavior through early diagnosis and management allow tremendous improvement in the whole clinical picture. Prader Willi Syndrome can be misdiagnosed in the list of causes of childhood obesity. Giving no attention to the associated profile of cognito-psycho-behavioral impairments that affect these children since early childhood. We aimed to study the psychobehavioral deviations in a sample of Egyptian children with Prader-Willi syndrome and their possible relation to its different genotypes. We included 15 out of 72 patients of both sexes, aged from 5-15 years old from the National Research Centre. All patients fulfilled the diagnostic threshold of modified list of Prader-Willi criteria. Detailed cytogenetic analysis was done using conventional cytogenetic analysis of peripheral blood lymphocytes and Fluorescent in Situ Hybridization. Cognitive and psychological profile of patients were assessed using (a) standard and semi structured psychiatric sheet and interview (b) Wechsler Intelligence Scale for Children, (c) Child Behavior Checklist for ages 4-18years, (d) Conner’s Parent Rating Scale-Revised; long version, (e) Childhood Autism Rating Scale. The relevant ethical and scientific committee approved this research. 66.7% of the patients were deletion positive and 33.3% were negative. 100% of the samples were mentally subnormal. 26.3% had autistic symptoms, all were deletion negative. High prevalence of inattention, hyperactivity, anxiety, social, cognitive and behavioral problems were evident in the patients, manifested in more frequency and severity in non-deletion patients. Cognitive and psychological challenges were evident in all PWS patients’. There were some clinical differences according to different genotypes. Management plan can be tailored accordingly with emphasis on role of early intervention as prophylactic measures against worse consequences.

PO8

Motor disturbances in autistic children; case control study
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Children with autism have developmental motor profile that differs from other healthy children. About 30 to 75% of autistic individuals have associated motor deficits. This is evident since early childhood, sometime noted by parents and neglected by clinicians. These motor deficits are related to other domains of dysfunction in children with autism as social and language skills. Improving motor deficits can help better prognosis for these children. This study aimed to detect motor deficits in a sample of autistic children and correlate them with the severity of autistic symptoms. We recruited 20 autistic children ranging from 3 to 6 years from the Institute of psychiatry outpatient child psychiatry and rehabilitation clinics of Ain-Shams university hospital. We excluded patients with total intelligence less than 75 or having other developmental disorder. We matched them with healthy controls for age and sex and compared both motor development and self help skills using Brigance scale. We confirmed diagnosis of autism in each patient by applying ICD-10 criteria of autism by a senior psychiatrist and by having a Childhood Autism
Rating Scale (CARS) score above 30. Relation of autism severity and motor deficits was assessed later by Correlation co-efficient test. Compared to controls, autistic children showed statistically significant low Brigance test scores on; gross movement, fine movement and self-help skills subdomain. Motor delay was significantly correlated with the severity of autism. Motor deficits were evident in autistic patients and could indicate severity.

PO9
The long-term psychological consequences of adolescents after a natural disaster: Experiences from the recovery aid project for the Sichuan earthquake.
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The Hyogo Institute for Traumatic Stress engaged in a five-year mental health and psychosocial support project for victims of the Sichuan earthquake conducted by the Japan International Cooperation Agency and All China Women’s Federation. In this project, we focused on the mental health of children and adolescents as it has been believed that they might need more attention after a disaster. However, the long-term psychological consequences they will experience remain unclear. The purpose of this study is to explore mental health problems in adolescents living in Sichuan province six years after the earthquake. This is a secondary data analysis of the cross-sectional survey for the project final assessment. Study participants included 2636 adolescents from 7 middle schools, which are located either in severely affected areas or in mildly or non-affected areas. The relationships between the degree of traumatic experiences by the earthquake and the current mental health problems measured by Symptom Check List-90 were assessed by multivariate analysis of variance, and suicide related events after the earthquake were assessed by multivariate logistic regression. The scores of somatization, obsessive-compulsive, depression, anxiety and fear became higher in participants with more traumatic experiences. Multiple traumatic exposure was also associated with suicide-related events after the earthquake. This is the first study that showed adolescents affected by a natural disaster had more mental health problems even 6 years after the disaster in China. Results may be limited from generalizability because convenient sampling strategy was used.

PO10
Effects of Piracetam as an Adjunctive Therapy in Attention Deficit Hyperactivity Disorder: A Randomized, Double-Blind, Placebo-Controlled Trial
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Objective: To evaluate the effect and safety of piracetam as an adjunctive therapy plus methylphenidate (MPH) in children and adolescents with Attention Deficit Hyperactivity Disorder (ADHD). Method: Thirty six children and adolescents with ADHD (6-16 year old, both genders), who were admitted in three academic outpatient child and adolescents psychiatric clinics in last four months of 2013, were randomly assigned to the “methylphenidate plus 60 mg per day of piracetam” group and the “methylphenidate plus placebo” group, in a double-blind,
placebo-controlled study, for 6 weeks. The “Conners’ Parents’ Rating Scale-Revised (CPRS-R), Children Symptom Inventory-4 (CSI-4) (ADHD section), Clinical Global Impression-Improvement (CGI-I) scale, and Children’ Global Assessment Scale (CGAS) were completed at baseline and at the ends of the 3rd and the 6th week, and the New York state Psychiatric Institute side effect form was completed weekly, as outcome measures. Result: Both groups demonstrated significant improvement in all outcome measures during the study, however; the level of improvement in CPRS-R, CSI-4, and CGI-I scales were significantly higher in the “methylphenidate plus piracetam” group compared to the “methylphenidate plus placebo” group. ADHD in subjects of the “methylphenidate plus piracetam” group could be controlled with significantly lower mean therapeutic dose of methylphenidate in comparison to the other group, and they experienced no mean weight change. Side effects were not remarkable in, or significantly different between two groups. Conclusion: Piracetam as a short-term adjunctive treatment to methylphenidate, can have considerable therapeutic effect and safety profile in children and adolescents with ADHD.

PO11
The effectiveness of a group intervention programme “P.STAR”, Psycho-Somatic treatment for active recovery of children presenting with somatoform disorders in KK Hospital, Singapore
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Psychological distress causes the brain to unconsciously disable or impair bodily functions, which serve to relieve patient’s anxiety. Often children are hospitalized in KK Hospital and referred to Clinical Psychologists for severe complaints of a Somatoform nature as inpatients or outpatients.
Method: KK Hospital Psychology Service will pilot a group in June 2015 with three group sessions for children from nine to twelve years old and one session with parents, using psycho-educational games, CBT techniques and relaxation. Outcome measures, such as anxiety scales and CGAS (Children’s Global Assessment Scale) will be administrated to evaluate the effectiveness of the group programme.
Results: We believe that conducting a fun and educative group programme will reduce re-hospitalization of these children and will be more effective than individual therapy. It is hoped to create an informative flyer to inform patients about somatoform symptoms and illnesses and to facilitate doctors’ communication with patients presenting with somatoform disorders in Emergency Department or on the wards. Similar group interventions will be offered for different age groups like teenagers and women.
Discussion: These bodily pains have no organic explanations but require in depth medical examinations and hospitalizations of patients, which reinforces the psychosomatic pattern as children and their families will regularly present to Children’s Emergency for bodily complaints. Research has shown that group interventions are effective in facilitating changes especially if parents are involved.
PO12
Validity and reliability study of the Chinese version of the Devereux Early Childhood Assessment for Toddlers (DECA-T)
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Objective: The Devereux Early Childhood Assessment for Toddler (DECA-T) is a 36-items, 5-point scales questionnaire of social-emotional assessment for toddler aged 18 to 36 months. This study evaluated the psychometric properties of the Chinese version of DECA for Toddler (DECA-T). Method: We assessed 78 toddlers aged from 18 months to 36 months in northern Taiwan and 59 clinic-based participants recruited in one medical center. Both parents rated the DECA-T respectively to detect the inter-rater reliability. Other information will be collected including demographic data and family support and parents’ mental health. For the test-retest reliability, parents of totally 100 children recruited will rate the DECA again in the following 14 days. Results: The Chinese version of DECA-T demonstrated good test-retest reliability (r= 0.712-0.829 and ICC=0.710-0.824) and high internal consistency (Cronbach α=0.942-0.957, in total score; 0.741-0.921, in three subscales), rated by both parents. Convergent validity with CBCL 11/2-5 total behaviour problem (r= -0.301~ -0.208), internalising behaviour problems (r=-0.205~-0.262) and externalising behaviour problem (r=-0.205~0.344) demonstrated well-accepted psychometric performance. Clinic-based participants reported significantly lower total DECA-T scores compared with community-based subjects. Conclusion: Our findings indicate that the Chinese DECA-T is a reliable and validate instrument for measuring the social-emotional resilience in the ethnic Chinese population in Taiwan.

PO13
Disorder-specific alteration in white matter structural property in adults with autism spectrum disorders relative to adults with ADHD and adult controls
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Autism spectrum disorder (ASD) and attention-deficit hyperactivity disorder (ADHD) are not only often comorbid, but also have overlapped behavioral and cognitive abnormalities. A key question is whether these shared phenotypes are based on common or different underlying neuropathologies. Therefore, this study aims to examine the disorder-specific alterations in white matter structural property. The three comparison groups included 23 male adults with ASD (age:21.4±3.1), 32 male adults with ADHD (age:23.4±3.3) and 29 age-matched healthy male controls (age:22.4±3.3). Their attention performance and executive functions were assessed by computerized neurocognitive testing. After acquisition of the diffusion spectrum imaging (DSI), whole brain tractography was reconstructed by a tract-based automatic analysis, and generalized fractional anisotropy (GFA) values were computed to indicate tract-specific white matter property. There are significant differences (FDR adjusted p-value < 0.05) in the GFA values
among the three groups in six identified fiber tracts: right arcuate fascilucus, right cingulum (hippocampal part), anterior commissure, and three callosal fibers (ventrolateral prefrontal cortex part, precentral part, superior temporal part). Post-hoc analyses revealed that adults with ASD had significant lower GFA in these fiber tracts than adults with ADHD. There was no significant difference in the GFA of any of the fiber tracts between adults with ADHD and healthy controls. The GFA values of some of the fiber tracts were positively associated with attention performance and executive functions, and these three groups showed differential association patterns. This study highlights the disorder-specific alteration of white matter tracts in adults with ASD and ADHD.

**PO14**
Comparison of pharmacological treatments for Attention deficit hyperactivity disorder: A network meta-analysis
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Attention-deficit/hyperactivity disorder (ADHD) is a common psychiatric disorder that influences people all around the world and through childhood to adulthood. We systematically reviewed the literature available by searching for multiple-treatment-comparison meta-analyses assessing pharmacological interventions for patients with ADHD. Using wide-ranging search terms, we retrieved 233 titles from the PubMed and Cochrane databases. Only studies about the pharmacological treatments of patients with ADHD were included. WinBUGS was used for the multiple-treatment-comparison meta-analysis, or so-called network meta-analysis. Forty-seven studies were included. 9 different medications were put in comparison, include methylphenidate, atomoxetine, bupropion, dexamethasone, clonidine, adderall, MTS (methylphenidate transdermal system), lisdexamphetamine, and placebo. Results from those meta-analyses suggest that stimulants are more efficacious in decreasing ADHD symptoms. Bupropion is superior to placebo but less effective than stimulants. The efficacy of Lisdexamphetamine is the best among all medications. All kinds of medication are superior to placebo in the treatment of ADHD. Stimulants are more effective than non-stimulants.

**PO15**
Omega-3 status and clinical manifestation of attention deficit hyperactivity disorder (ADHD)
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Objective: Attention deficit/hyperactivity disorder (ADHD) is the most common developmental disorder in childhood and characterized by symptoms of inattentiveness, hyperactivity and impulsivity. The etiology for ADHD is multifactorial, while omega-3 polyunsaturated fatty acids (PUFAs), an essential fatty acid (EFA), deficiency has been hypothesized as one of plausible mechanisms. Lower PUFAs status has been associated with ADHD symptoms, while omega-3 supplement has been shown to improve ADHD symptoms. The aim of the study is to investigate omega-3 PUFAs status and its relation to ADHD symptoms.
Methods: We recruited 21 children diagnosed with DSM-IV ADHD, and 21 non-ADHD controls. We assessed the severity of their ADHD symptoms with SNPA-IV, and evaluated their omega-3 dietary intake level and EFA deficit symptom severity.

Results: We found children with ADHD had higher scores of inattention and hyperactivity than non-ADHD group. There is also a trend for ADHD group to have lower dietary intake of omega-3 than non-ADHD group. Moreover, Children with ADHD had higher essential fatty acid (EFA) deficit scores (p=0.024) when compared with non-ADHD group, and EFA deficit scores had positive correlation to scores of ADHD symptoms (p=0.21) in ADHD group but not in non-ADHD group.

Conclusion: Children with ADHD had higher deficiency of EFA in this study, and EFA deficiency was shown to have positive association with ADHD symptoms. Hence, EFA deficiency may play a role in the clinical manifestation of ADHD symptoms.

PO16 Unavailable

Novel rare missense variations and risk of autism spectrum disorder: whole-exome sequencing in two families with affected siblings and a two-stage follow-up study in a Japanese population

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PO17

Epidemiology of Autism Spectrum Disorder and Attention Deficit Hyperactivity Disorder in a community-based Japanese population sample of five-year-old children

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The purpose of this study is to investigate the prevalence of Autism Spectrum Disorder (ASD), Attention Deficit Hyperactivity Disorder (ADHD) and other developmental disorders in a community-based Japanese population sample of five-year-old children. We also clarify the difference of clinical data between children with ASD and/or ADHD and healthy controls. Japanese local governments usually conduct infants’ health check-up as a fundamental maternal-and-child-health service. However, it cannot completely pick up developmental disabilities. Subjects are 1310 children who become 5 year old between April 2013 and March 2014 in Hirosaki city. After primary screening was performed, 159 children and their parents participated the developmental health check-up. Psychiatrists diagnosed neurodevelopmental disorder using DSM-5 criteria. We calculated the prevalence and comorbidities. In addition, clinical data were statistically analyzed by multiple comparisons between groups of ASD, ADHD and healthy
This study was approved by the Ethics Committee of Hirosaki Graduate School of Medicine. 29 children were diagnosed as ASD. The prevalence of ASD was 3.27%. The prevalence of ADHD was 5.52%. ASD children had the comorbidities of ADHD (65.5%), DCD (62.1%) and ID (44.8%). Mean birth weight of ASDs was significantly lower than ADHD and control groups. Mean age of mother at birth of ADHDS was significantly younger than control group. Sleep duration of ADHDS was significantly lower than control group. Anxiety symptom of ASDs and ADHDS was significantly higher than control group respectively. Depressive symptom of ADHDS was significantly higher than control group.

PO18
Explore the association between Reaction Time Variability and Temporal Information Processing among Attention Deficit/ Hyperactivity Disorder (ADHD)
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Reaction time variability (RTV) is one ubiquitous finding in Attention Deficit/ Hyperactivity Disorder (ADHD), and impairment of temporal information processing (TIP) may be a possible explanation for this phenomenon. Current study examine whether there are association between TIP performance and RTV, and explore which component in TIP have a better prediction on the RTV in Conners’ continuous performance test (CCPT-II) task. Methods: Participants included 121 children and adolescents with DSM-IV ADHD (male, 84.3%) and 101 typically developing (TD) participants (male, 75.2%), age 9 to 16 years old, in Taipei. The DSM-IV diagnose of ADHD and other psychiatric comorbid conditions were made by clinical assessments and confirmed by the psychiatric interviews of both parents and participants using Chinese Kiddie Epidemiologic version of the Schedule for Affective Disorders and Schizophrenia. The participants were also assessed by using the Wechsler Intelligence Scale for Children-3rd edition (WISC-III), CCPT-II and TIP task (time estimation, time discrimination and time reproduction). Results: Participants with ADHD had higher temporal discrimination threshold, tend to overestimate the length of the interval and less precise in reproducing time interval than TD individuals. There were significantly positive association between time reproduction performance and RTV parameters (RTSD and τ) after controlling for age, gender and performance IQ (PIQ). Discussion: The positive association between time reproduction and RTV suggest that variable response time in ADHD may be accounted for one’s cognitive ability such as working memory and attentional resources rather than the deficit in pure intrinsic timing.
PO19
Cyberbullying: its nature and impact in secondary school pupils
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Cyberbullying describes bullying using mobile phones and the internet. Most previous studies have focused on the prevalence of text message and email bullying. Two surveys with pupils aged 11-16 years: 90 pupils from 1 school, supplemented by focus groups; 300 pupils from 2 schools, to assess the generalisability of findings from the first study, and investigate relationships of cyberbullying to general internet use. Both studies differentiated cyberbullying inside and outside of school. Both studies found cyberbullying less frequent than traditional bullying, but appreciable, and reported more outside of school than inside. Phone call and text message bullying were most prevalent, with instant messaging bullying in the second study; their impact was perceived as comparable to traditional bullying. Mobile phone/video clip bullying, while rarer, was perceived to have more negative impact. Age and gender differences varied between the two studies. Study 1 found that most cyberbullying was done by one or a few students, usually from the same year group. It often just lasted about a week, but sometimes much longer. The second study found that being a cybervictim, but not a cyberbully, correlated with internet use; many cybervictims were traditional 'bully-victims'. Pupils recommended blocking/avoiding messages, and telling someone, as the best coping strategies; but many cybervictims had told nobody about it. Cyberbullying is an important new kind of bullying, with some different characteristics from traditional bullying. Much happens outside school. Implications for research and practical action are discussed.

PO20
Comparing coaching and bibliotherapy for the adults with ADHD
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The objective of this study was to examine whether the coaching and/or the bibliotherapy have effect on the difficulties of daily lives, self-esteem and mood states for adults with ADHD. Coaching and bibliotherapy were implemented to 4 Japanese adults who range from 25 to 34 years old. Our coaching program mainly focused on the time management and organization which was based on the coaching manual by Sleeper-Triplett. An hour and half program were implemented once a month and the subjects report their progress through the text messages. This study chose the book which shows how to organize rooms and time, which essentially deals with the same topics as the coaching program. This book was written by Japanese experienced psychiatrist in this field. Subjects were asked to check their progress and write it down on the record sheet. This employed Weiss functional impairment rating scale, Organization Scale, Rosenberg Self-Esteem Scale, and Profile of Mood States-Brief Form to examine the effect of these two approaches. These self-rating scales were filled out by subjects pre and post coaching and after bibliotherapy. Among the subjects who improved their difficulties of their daily lives, self-esteem and mood states by coaching, they showed no change and/or exacerbation in these areas by bibliotherapy, whereas a subject who showed no better changes by coaching,
improvement in the difficulties of the daily lives by bibliotheraoy. Bibliotheraoy may be the alternative approach for the people with ADHD, in case the coaching might not fit to them.

**PO21**

**Psychiatric Disorders among New Child and Adolescent Clients in an Outpatient Setting of a General Hospital in Sungai Petani: A cross sectional study from January 2014 to December 2014**

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The principle of there is "no health without mental health” is widely accepted and is supported by WHO (1948) powerful statement of: “Health is a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity “.

However in many individuals and even more so in children and adolescents, mental health is often neglected. Children and adolescents requiring psychiatry services are increasing. Locally, child and adolescent psychiatry services began in University Malaya Medical Centre in 1968 where multidisciplinary teams were set up to cater for the increasing needs. Child psychiatry services soon extended to government facilities and currently there is a Child Psychiatry Unit in all regional psychiatry centers.

In 2013, the inception of the Child Psychiatry services in the Sultan Abdul Halim Hospital, Sungai Petani begun. During the study period, there were 160 new cases. The highest numbers of patients were from the primary school age group with a mean age of 9.98 years. The highest incidences of cases were Attention Deficit Hyperactivity Disorder (23.8%), followed by Autism Spectrum Disorder (17.5%) and others at 15.6%. Out of these, 61% of required pharmacological and 39% non-pharmacological treatment.

**Conclusion**: there is a need to enhance and expand services to enable clients and their family to obtain the necessary intervention. With improved screening and empowerment of the family, better outcomes could be achieved for the clients.

**PO22**

**Vitamin D deficiency in childhood onset schizophrenia: a case series.**

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Vitamin D deficiency is increasingly being associated with neurodevelopmental disorders due to its role in brain development. Association with schizophrenia is being speculated, although exact mechanism not clear.

**Aim**: To present two cases of childhood onset schizophrenia (COS) with vitamin D deficiency.

**Methodology** (Case I): A 12 year girl presented with illness of 2 years characterized by irritability, anger outbursts, social withdrawal, academic decline, suspiciousness, muttering, smiling to self, visual & auditory hallucinations, disorganised behaviour, deteriorating self care and inadequate response to olanzapine. Investigations including neuroimaging were WNL, except low vitamin D levels (6.8 ng/ml). Diagnosed as having COS and vitamin D deficiency; treated with clozapine (75 mg/d) and vitamin D supplementation. Improved within 2 weeks. Case II- A 14 year old boy presented with 3 years history of social withdrawal, muttering &
smiling to self, inappropriate masturbatory practice, suspiciousness, deteriorating bio-functions and self care with inadequate response to olanzapine, aripiprazole, risperidone; diagnosed as COS. Investigations revealed vitamin D deficiency (7.9 ng/ml). Treated with clozapine (212.5 mg/d) & vitamin D supplementation. Clinically improved within 4 weeks. Conclusion: COS is severe form of schizophrenia with poorer course, outcome, greater psychopathology & neurocognitive deficits with poorer response to treatment. Cause and/or effect relationship between Vitamin D deficiency and schizophrenia is unclear, but studies report that hypovitaminosis D during antenatal period, childhood & puberty may influence brain development and thus course & outcome of schizophrenia. Therefore, adequate treatment of coexistent vitamin D deficiency becomes important in management of COS.

PO23
Student Behaviors Teachers Struggle to Deal With: A Comparison of Japan and Mongolia
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Educators within school systems often experience difficulty in coping with their students’ problematic behaviors, and schools sometimes seek advice from experts. To consider response strategies for problematic behavior, the influences of culture and environment must be taken into account. Therefore, we conducted an international comparative study of student behaviors that are problematic for teachers. We asked homeroom teachers in Japan and Mongolia (in regular classes, schools for special needs education, etc.) to complete the 26-item “Survey on Student Behaviors Teachers Struggle to Deal With” and to provide freeform comments on the topic. We received responses from 68 people in Mongolia and 152 people in Japan. While almost no Mongolian teachers reported difficulty dealing with behavior in regular classes, many responses from Japanese teachers mentioned issues related to emotional regulation and self-centered behaviors. As for difficult behaviors in schools for special needs education, Mongolian teachers frequently reported classwork-related issues (not understanding the material, poor concentration, disruption), while many Japanese teachers reported behavioral problems such as obsessive or violent speech and behavior. Our study found that the behaviors teachers consider difficult to deal with differ between the two countries. The corollary that teachers’ support needs also differ must be factored in when advising schools on these issues.

PO24
Violence Prevention for Adolescents at School through Life-skills Education Program
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Adolescent as the next generation of leaders in the future, have the right to get opportunity to grow and development optimally. Emotional turmoil experienced by adolescents lead them susceptible to a wide variety of behavior problems as well as become victim of such as negative brawl, juvenile delinquency, dropouts from school, drugs abuse, pre-marital sex, sexual or physical abuse. School should provide not only academic knowledge but also education for the
students to be competent to face many problems in life. These education modules aimed at improving mental resilience to be able to prevent negative influences of environment in particular of handling peer pressure and to prevent violence at school.

Method: Overview of the program

Result: Division of Child and Adolescent Psychiatry through its community engagement activity develop adolescent mental health service to adolescent through program of violence prevention among teenagers. This model has promotion and prevention aspects of mental health problems at six junior high schools in Jakarta. Teachers are involved in Training of the Trainer for life-skills and violence prevention training, whereas the students become the trainee. Video and other media education have been developed to increase awareness and understanding to prevent violence among teenagers.

Conclusion: School is an ideal place to set up promotion and prevention program of mental health problems among adolescents, in particular violence prevention program.

PO25

Sibling rivalry presenting with psychotic like symptoms: a clinical case report

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Psychotic symptoms such as hallucinations are known to occur in childhood illnesses like dissociative disorders. However, these symptoms have not been reported in presentation of sibling rivalry disorder. Our aim is to describe a case of sibling rivalry disorder presenting with psychotic symptoms.

Methodology: An eight-year female, with normal development, slow to warm up temperament with overprotective parenting, maintained relatively well till 6 years of age when her younger sibling was born. After the birth of sibling, behaviour changes were noticed in form of excessive clinging to mother, irritability, hitting people. She reported that people would stare at her when she would go to school and social gatherings; would complaint that children bully her at school (which was not true) because of which she started spitting and using abusive language. She would be observed to be talking and smiling to self. She was diagnosed to have psychosis and started on antipsychotics in a previous consultation. Detailed history and repeated MSEs revealed evidence of sibling rivalry and symptoms served function of gaining attention. Parents were explained about diagnostic possibilities, anti-psychotics were stopped, play therapy components and behaviour therapy were initiated.

Results: Significant and sustained improvement within a 3-month period was noticed. Discussion

We have discussed the diagnostic pointers and process in the index case and reviewed literature regarding the same.

Conclusion: Emotional disorders in childhood can present with psychotic symptoms. High index of suspicion with good history and examination helps in the diagnostic process.
PO26
Self-Injurious Behaviours in Autism treated successfully with Tab Risperidone: A Case Study
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Self-injurious behavior is a frequent and serious problem for children with autism. Children can range from severe, life threatening injuries to less damaging cases. The most common forms of these behaviors include head-banging, hand biting, excessive self rubbing and scratching. Children with autism and mental retardation may display more self-injurious behavior due to an inability to process emotion or cope with sensory stimulation which lead to more frustrations due to unsuccessful communication, they frequently injure themselves. We reviewed a case of a 6 year old Siamese girl who had been diagnosed with low functioning autism at the age of 3. She would often bite her wrist and arms enough to cause bruises. At times she punched her face above her eyes. Calming her down was very difficult. She was referred to Occupational Therapy and other treatments such as ADL training, multisensory stimulation to improve sensory integration, cognitive activity, behavior modification approach and play therapy. Her self-injurious behavior was under control whenever she attended these activities but unfortunately her mother frequently defaults these treatment activities. Her self-injurious behavior worsen the time she missed almost 1 month of treatment activity. Her mother was having difficulty in arranging transport to attend these appointments. The reason she was started on antipsychotics to control her self-injurious behavior was considered due to worsening condition of her behavior. She was on Syrup Risperidone 0.75mg twice daily. No side effects was detected during her treatment. Occupational Therapy appointments was still given and her self injurious behavior was under control.

PO27
Parental agreement on and discrepancies in ratings of infants’ social-emotional and behavioural problems and competencies
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This study examined parental agreement on and discrepancies in ratings of social-emotional and behavioural problems and competencies in 1- to 3-year-old children, using the Japanese version of the Infant-Toddler Social and Emotional Assessment (J-ITSEA). The J-ITSEA is an assessment tool for rating social-emotional problem behaviours (externalizing, internalizing, and dysregulation) as well as areas of competence, such as compliance, attention, and empathy, in 1- to 3-year-old children. Of 110 eligible parents, five subjects were excluded due to the significant number of unanswered items in either the father’s or mother’s ratings; thus, data of 105 parents were analysed (valid response rate: 95.46%). Intraclass correlations (ICC) between fathers’ and mothers’ scores on the J-ITSEA ranged from .51-.60 for problem behaviours, and the ICC for areas of competence was .75.
The ICC for problem behaviours were higher in boys than in girls, although those differences were not significant. In terms of discrepancies, fathers rated boys significantly higher on
externalizing and dysregulation problems than mothers did (p < .01), and those effect sizes were medium to large (r = .48–.54). On the other hand, mothers rated girls significantly higher on internalizing problems than fathers did (p < .01). For areas of competence, mothers gave significantly higher ratings than fathers did, regardless of the child’s gender (p < .05). The findings in this study might underscore that we should keep in mind that it would be ideal to gather information from multiple informants in assessing infants’ social-emotional behavioural problems and competencies.

PO28
Smoking and smokeless tobacco use in children & adolescents: clinical profile and comparison
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Source of Support: This study was funded and supported by Drug De-addiction and Treatment Centre, Department of Psychiatry, PGIMER, Chandigarh under Tobacco Cessation Centre
Background: Evidence suggests that tobacco use starts at an earlier age. However, cursory attention has been paid to determine the profile of child and adolescent tobacco users.
Aims: This study aimed to find out the socio-demographic and clinical profile of adolescent tobacco users attending a specialized clinic in a tertiary care hospital and those seeking treatment in community camps.
Methods: This is a cross-sectional study of consecutive subjects enrolled in Tobacco Cessation Centre (TCC). The medical-surgical departments of the hospital, and attending community outreach camps referred majority of these subjects. TCC-Intake Form (WHO) was modified and administered for the purpose of the research. A comparison has been made between smokers and smokeless tobacco users.
Results: Amongst the clinical parameters, peer pressure was the commonest reason (70%) for initiation of tobacco use. The commonest maintaining factor was presence or anticipation of withdrawal symptoms (33%). A substantial majority (92%) did not receive any medication or even treatment prior to that. Most common cause for relapse was peer pressure (43%), followed by craving (31%). Comparison of smoker and smokeless tobacco users showed that most of the smokers belong to nuclear families and are more educated. Also physical harmful effects of smoking are significantly higher than the smokeless tobacco.
Conclusion: This study illustrates some important facts regarding the clinical and socio-demographic profile of various forms of tobacco users. These could help in understanding tobacco use in adolescence and also have showed key areas in which preventive or therapeutic interventions could be planned.
The attention deficits of preschooler at risk for ADHD explored by K-CPT
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Although, the K-CPT holds promise as an effective clinically-available diagnosis tool for assessing attention problems in preschooler, however, few empirical research examined this issues in preschooler at risk for ADHD, either in categorical or in dimensional analyses.

Methods: We recruited 46 preschooler in risk for ADHD from clinical referral (male, 76.1%; age, 4.72±0.50 years), 36 preschooler in risk for ADHD from community (male, 61.6%; age, 4.86±0.56 years), and 89 TD youths (male, 58.4%, age, 4.88±0.69) in Taiwan. The parent and teacher ratings of attention-deficit/hyperactivity disorder and oppositional defiant disorder symptoms on the SNAP-IV scale had been used as diagnostic tool. Neuropsychological functions measured by K-CPT and the reaction times were described by the parameters (mu, sigma, tau) estimated by ex-Gaussian.

Results: The current study showed both preschooler at risk with ADHD had more omission errors, and higher RTSD than TD, and they also had larger tau than TD. We also found RT variability were small correlated with ADHD symptoms reported by parents (Pearson r=.24-.27, p=.05), but were moderately correlated with ADHD symptoms reported by teachers (Pearson r=.38-.40, p=.001).

The current study supported the RT variability time and omission errors would be a useful attention index to differential the preschooler at risk for ADHD. We also found ADHD symptoms reported by teachers might be a more objective measurement than ADHD symptoms reported by parents in preschool period. That implicated the teacher’s observation should be emphasized.

Efficacy and tolerability of methylphenidate for ADHD in children with intellectual disability: A comprehensive literature review
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ADHD is frequently co-morbid with sub-average intelligence. Methylphenidate that is known to produce significant improvements in normally developing children with ADHD, has been grossly under-studied in children with intellectual disability (ID).

Aims and objectives: We aimed to conduct a comprehensive literature review of studies evaluating efficacy and tolerability of methylphenidate in children with ADHD and ID. Methods: An extensive literature search was conducted across several databases using the keywords mental retardation, attention deficit hyperactivity disorder, ADHD, intellectual disability, methylphenidate, stimulants. Only randomised controlled trials were included in the review.
Results: Nine RCTs with or without a cross-over design, with sample size varying from 2 to 122 participants, conducted from 1990 to 2013 were found. All except one study employed low fixed-dose regimens of MPH; doses ranging from 0.3 to 0.6 mg/kg.

The main outcome measures were rating on parent, teacher and clinician rated scales and cognitive measures. All studies unequivocally showed that MPH is superior to placebo in these children. However, most studies indicated the response rate was lower and side effects were more than that seen in normally-abled children.

Conclusion: Methylphenidate is efficacious in treating ADHD in children with ID, though the response rate and tolerability seem to be lesser. There is need for large scale efficacy and effectiveness studies. Also, there is need for direct comparison with children without ID

PO31
Persistent Cavum Septum pellucidum and Psychosis: Case Series
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The Cavum Septum Pellucidum (CSP) is a thin, triangular, vertical membrane separating the anterior horns of the left and right ventricles of the brain. The persistence of space between the two leaflets reflects neurodevelopmental anomaly of the midline structures and predisposes an individual to neuropsychiatric sequelae.
Methodology: Case 1: A 13 year male, with history of global developmental delay, presented with one year history of symptoms of irritability and anger. It was associated with symptoms of suspiciousness, fearfulness, smiling and muttering to self, visual hallucinations, cognitive decline and decline in self care. IQ was 65. MRI Brain revealed persistent CSP. Patient was managed with Olanzapine 5mg and behavior therapy.
Case 2: A 14 year male with history of global developmental delay presented with 2 year history of remaining withdrawn. This was associated with symptoms of talking to self, irritability, unprovoked anger outbursts, delusion of reference and delusion of persecution. IQ revealed a score of 53. MRI Brain revealed Persistent CSP. He was managed with Risperidone and Behavior therapy.
Result: Both the above cases with intellectual disability and psychosis were associated with persistent Cavum Septum Pellucidum. Discussion: We shall discuss about the neuroanatomical correlates of septum pellucidum, the alteration of neurodevelopmental trajectory in cases where it persists and a review of literature of various neuroimaging studies evaluating the same.
Conclusion: The prevalence of CSP predisposes an individual to the risk of psychosis. This finding suggests that neurodevelopmental origins may be implicated in the pathogenesis of psychosis
PO32
The effectiveness eight steps moduls of mindfulness to increase self regulation teenagers with conduct disorder in junior high school, Jakarta Indonesia
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The description of the symptoms conduct disorder in Indonesia is actually quite ubiquitous, including bullying and aggression in schools and student brawls. In 2010, there were 128 cases of student brawls, while in 2011, there were 330 cases which resulted in 82 student deaths, during period of January – June there were 139 student brawls that resulted in 12 student deaths. The data suggested that violence exists among junior high school students as manifestation of conduct disorder symptoms. At the last studies, has been reported the incidence of conduct disorder 26.1%.

The objective of this study is to assess the effectiveness eight steps moduls of mindfulness was conducted by school counselor to increase self-regulation conduct disorder in junior high school.

Method: Subjects were randomly assigned into the treatment as usual (with school counselors) and into eight steps moduls of mindfulness training by counselors was supervised by a psychiatrist. Difficulties in emotion regulation scale (DERS) and teenage conduct disorder assessment model (TCD-AM) was checked before and after treatment. Data outcome was analized using by Chi-square and the General Linear Model Repeated Measures.

Results and conclusion: 103 students completed the study (intervention n=53 control n=50) after 8 weeks, showing the effectiveness of eight steps moduls of mindfulness to increase DERS level (p<0,001) and decrease behavior problem with TCD-AM (p<0,001) compared to the control group.

Eight steps moduls of mindfulness recommended to manage conduct disorder in adolescent in junior high school.

PO33
Examination of the Strengths and Difficulties Questionnaire (SDQ) with item response theory
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The aim of the present study was to analyze the items on the Strengths and Difficulties Questionnaire (SDQ) with Item Response Theory (IRT). The SDQ, which was developed by Goodman (1997), is a screening questionnaire that provides balanced coverage of children and young people’s emotions, behaviors, hyperactivity / attention-deficit, relationships, and prosocial self-perception. The SDQ was designed to meet the needs of researchers, clinicians, and educators. According to the total score in each area, the necessity of support can be classified into High need, Some need, or Low need. However, the following problems remain in the judgment of the total score. The same total score does not necessarily mean the same state in children, and the scores between each area cannot be simply compared. In this study, a survey was conducted among all elementary school students in a town of approximately 37,000 people in Aichi prefecture. Each classroom teacher answered a questionnaire for 1,578 children who were aged 6–12 years. The difficulty (b) and discrimination (a) of each item were calculated
from the data with the IRT model because the factor analysis cleared that each subscale had an one-factor structure. Enough test information was provided on all of the subscales. Each SDQ item was weighted by calculating difficulty and discrimination. These findings suggest that a current clinical estimation can be corrected by the total score, which is more exquisite. In addition, the IRT can be used to re-examine the SDQ cutoff point for the characteristic values of respondents.

PO34
Improvements in Emotional Facial Affect Recognition after Intranasal Oxytocin Administration in Autism Spectrum Disorders
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Neuropsychological studies suggest that intranasal oxytocin is beneficial in emotional facial affect recognition. However, it remains unclear whether the effect is specific to a certain category of facial emotions or not.

Materials and Methods: High-functioning males with autism spectrum disorders (n=7; 18-23 years) were tested by (1) the labeling task of emotional facial expressions, (2) the matching task of unfamiliar faces, and (3) the two-way forced-choice selection task in categorization of morphed facial expressions that blended anger-happy, anger-sad, or anger-fear. They were also tested by the same set of tasks after oxytocin administration (24 unit at a time, twice a day, more than six weeks). This study protocol was approved by Ethical Review Board of Nagoya University Graduate School of Medicine.

Results: In the emotion labeling task, participants had significantly larger number of correct responses in recognizing fearful, disgusted and angry faces after oxytocin administration (all ps <0.05). In matching task of unfamiliar faces, the scores did not improve after the oxytocin administration. In categorizing morphed facial expression, there were no differences between pre- and post-administration of oxytocin.

Conclusion: There results suggest that oxytocin specifically improves emotional facial recognition. However, it is not possibly specific to category of emotions. The improvement in recognizing fearful, disgusted and angry faces may be derived from the differences in difficulty in recognizing specific facial expression.

Limitations: Small number of patients were enrolled. Learning effect may be related. There remains unsolved between the improvements of emotional facial expressions and clinical symptoms.

PO35
The relationship between mental health and family functioning in parents of adolescents with high-functioning autism spectrum disorder: comparing mothers and fathers
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In Japan, the number of children diagnosed with high-functioning autism spectrum disorder (HFASD) is increasing; however, family support particularly to the parents is less than that to children with HFASD.
Therefore, the purpose of this study was to investigate the relationship between mental health and family functioning in the parents of adolescents with HFASD by comparing fundamental data obtained from them.

A total of 46 parents (24 mothers, 22 fathers) of adolescents (aged 13–15 yrs) with HFASD participated in this study in two ordinance-designated cities in Japan. A questionnaire survey was carried out to investigate the mental health of parents by using CES-D scale and family functioning by using the Feetham Family Functioning Survey (FFFS) Japanese-language Version I. Mann–Whitney U test was carried out for comparison between mothers and fathers.

This study found that 32.6% (mothers: 41.7%, fathers: 22.7 %) of the parents had a risk for depression. The mothers had a significantly higher risk (p = 0.006). Using FFFS, the mothers significantly had higher points in scales relating to an instrument discrepant score (overall [p = 0.004], family-family member [p = 0.013]) and an important score (family-subsystem [p = 0.001]).

These findings implied that we need not only support the parents, but we also need to adjust their environment for raising children. Particularly, to support the mothers, it is suggested that we pay attention to the relationships between the mother and other family members and adjust the family subsystem.

PO36
Acquired autistic behaviors in one siblings with mucopolysaccharidosis type IIIA
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Clinical observations and parent reports indicate that many children with mucopolysaccharidosis (MPS) IIIA have behaviors commonly associated with autism spectrum disorder (ASD), a pervasive developmental disorder characterized by impaired social communication, restricted interests, and repetitive behaviors. Although identifiable genetic etiologies are found in 10%-20% of individuals with ASD, rare of them could be potential treatable. With the advance in enzyme replace therapy, several lysosomal storage diseases including mucopolysaccharidosis will become treatable in the future. Therefore, screening for metabolic disorders, in particular MPS, among ASD children is important.

Case report: One 5 year old boy came to our clinics due to developmental delay, poor eye contact and hyperactivity. Restricted interests, repetitive and aggressive behaviors were noted. The physical exam did not reveal coarse face but only extensive mongolian spots over back. Chest X ray showed widening of anterior ribs (oar shaped / paddle ribs). Besides, his 10 month old brother showed mild coarse face and developmental delay (crawl: negative). Extensive mongolian spots were also found over back.

Results: Evaluation of the elder brother met the Chinese version of Autism Spectrum Rating Scales (ASRS) -short form (2-5 years) criteria for ASD. Bayley Scales of Infant Development-Third Edition revealed DQ=36. Both siblings documented enzyme deficiency and SGSH gene mutation and MPS type IIIA were diagnosed definitely.

Conclusion: MPS type IIIA, one of these potential treatable diseases has shared clinical manifestations of ASD. Clinicians must be aware that when a child acquires ASD-like behaviors, MPS should be included in the differential diagnosis and give family accurate genetic consultation.
PO37
Self-Esteem and its correlates among adolescents with Attention-Deficit/Hyperactivity Disorder
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The aim of this study was to examine the level of self-esteem and its correlations with demographic and attention-deficit/hyperactivity disorder (ADHD) characteristics, reinforcement sensitivity, social relationships, and psychiatric comorbidities among adolescents with ADHD in Taiwan. A total of 287 adolescents aged 11 to 18 years and diagnosed with ADHD participated in this study. Their level of self-esteem was assessed by applying the Rosenberg Self-Esteem Scale. Multiple regression analysis was used to examine the correlates of self-esteem. ADHD adolescents who reported more severe inattention symptoms, higher level of BIS and fun seeking on the BAS, a lower level of reward responsiveness on the BAS, lower satisfaction to peer and family relationship, and more severe depressive symptoms reported a lower level of self-esteem. Multiple dimensions of factors, including inattention symptoms, reinforcement sensitivity, social relationship, and depression were significantly associated with self-esteem in the adolescents with ADHD.

MCPM
Free Paper Presentation

M1
Hopelessness and coping strategies in suicide attempters
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Background: The feeling of hopelessness when experiencing life events may increase the likelihood to attempt suicide. Nevertheless, not all individuals show suicidal tendency, which suggest these people have capabilities which lacks in attempters. Identifying these is crucial in the better management of suicide attempters.

Objective: This study aims to determine types of coping strategies in suicide attempters and its relationship with hopelessness level.

Methods: A case-control study assessed suicide attempters consecutively admitted to the wards in University Malaya Medical Center from February to May 2015. Suicide attempters (N=66) were matched with control groups (N=66) for gender, age and race. The participants were compared using socio-demographic profiles, clinical and suicide history, Beck Hopelessness Scale and Brief COPE.

Results: There was significant difference in the level of hopelessness (p<0.01) between suicide attempters and controls. There were also significant difference in coping skills, suicide
attempters tending to use avoidance coping as opposed to problem- and active emotion-focused coping. Problem-focused and active emotion-focused were inversely correlated with hopelessness that were statistically significant (p < 0.01). Those who used avoidance as their coping strategy were more likely to be hopeless (p < 0.01).

**Conclusion:** Consistent with international studies, maladaptive coping skills positively correlated with the level of hopelessness and strongly associated with suicide attempt. Thus, it is strongly recommended to include coping skills in the clinical assessment and management as part of overall suicide intervention strategies.

**M2**

**Psychosocial functioning and its predictors among residents in a Malaysian welfare institution**

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**Background**: Functional recovery has become the main outcome of interest in the management of mentally ill population, including among the homeless.

**Objective** : To determine the psychosocial and cognitive functioning among residents in a Malaysian institution for the homeless; and its influencing factors.

**Methodology** : A convenient sampling, cross sectional study conducted on 291 residents assessing psychosocial functioning, symptomatology and cognitive functioning using the Personal and Social Performance Scale (PSP), Positive and Negative Syndrome Scale (PANSS), Trail Making Tests (TMT A and B), and Digit Symbol Substitution Test (DSST). Their socio-demographic and relevant clinical data were also obtained.

**Results** : Majority of the respondents (n=230, 79%) were having impaired psychosocial functioning (PSP <71) and poor cognitive functioning, regardless of their mental illness status. Among the mental illness group, two main PSP domains severely affected were socially useful activities (42.0%) and social and personal relationships (35.8%). There was high rate of remission (96.3%) in symptomatology (PANSS- Cumulative <75) and those who were previously unemployed significantly had lower PSP score (p< 0.05). PSP score was found to be positively correlated to cognitive functioning (TMT A p=0.04, TMT B p=0.01, DSST p=0.01) and negatively correlated to entire domains of PANSS (p=0.01). The main predictors for psychosocial functioning among this group via regression analysis were PANSS-P (p=0.04), PANSS-N (p=0.01) and PANSS-G (p=0.02).

**Conclusion** : This study highlights the low functioning level of residents detained in this institution and serves as an evidence based for the policy maker to develop specific interventions to improve the residents’ psychosocial and cognitive functioning.
M3
An audit of work environment and quality of life in clients on The Supported Employment Programme in Hospital Permai
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Background: Rates of unemployment for people with severe mental illness ranged from 30-90%. In Malaysia alone, according to National Mental Health Registry 2008, 70% of people with schizophrenia were unemployed on registration, a stark difference when compared to a <3% unemployment rate in April 2013. In Hospital Permai Johor Bahru, vocational rehabilitation can be generally divided into two types namely supported employment using the IPS model and a hybrid model of sheltered employment with elements of supported employment incorporated. There are significant differences between the hybrid model and traditional vocational rehabilitation or prevocational training such as sheltered workshops. The hybrid model uses the ‘place and train concept’ but in a protected environment i.e. HPJB. This is in contrast with IPS model where patients work in an open environment.

Objectives: This study was done to determine the effect of the work environment for clients in the IPS model compared with the Hybrid model. The Work Environment Impact Scale (WEIS) was used to study effect of work environment and WHOQOL was used to study quality of life.

Methods & Results: A total of 120 clients were recruited, 64 in IPS and 56 in HM. In both groups, most clients were males (IPS had 58 (90%) males, HM had 34 (61%) males). Almost 80% were Malays, majority had previous work experience (IPS 78% vs HM 66%). More IPS clients had secondary school education (89%) compared to HM (71%). The mean age for IPS was 42.17(±9.43) while HM was 39.79(±9.13). As regards the WHOQOL, IPS group differed significantly in energy and mobility. IPS group was also significantly better in the psychological, social and environment domain. In the Work environment, IPS was better in Occupational Form but not social group, physical space or objects.

Conclusion: The IPS group had better QOL but not much difference noted in work environment. IPS is a better model but HM can be a feasible alternative.

M4
A study on the psychological effects among Ministry of Health care workers during flood disaster in Kelantan 2014/2015
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Objectives: 1) To assess the level of psychological distress among MOH health-care workers during flood disaster in Kelantan between December 2014-February 2015 2) To determine the associated factors related to the psychological distress.
**Methods:** The study was a cross sectional study done from December 2014 until February 2015. The psychological assessment of the health staff was conducted by the well-trained rescue team members. 21-item Depression, Anxiety and Stress Scale (DASS-21) was utilised for all health-care workers from all districts in Kelantan. Simple Logistic and Multiple Logistic Regression analysis were done by using SPSS version 20.

**Results:** The percentage of health-care workers experienced severe stress, anxiety and depression according to DASS-21 assessment was 2.5%, 10.7% and 2.6% respectively. Using multiple regression analysis, Work Place i.e. hospital-based staff showed significant result in DASS Anxiety score as compared to the clinic-based staff (p=0.027, 95%CI=1.054-2.355). The other analysis were not significant.

**Conclusions:** The analysis revealed hospital-based staff who worked in the flood-laden areas in Kelantan experienced significant anxiety level.

### M5
**The role of psychosocial factors and borderline personality disorder in predicting past self-harm behaviours among prisoners in Malaysia**

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Prisoners are more likely to engage in self-harming behaviours than those in the general population. This study aimed to examine the prevalence of prisoners engaging in self-harm behaviours and to identify the extent of psychosocial factors (i.e. self-esteem, social support and religiosity) and Borderline traits in predicting past self-harm behaviours. The present cross-sectional study was conducted at one of the prisons in Peninsular Malaysia. The convenience sample consisted of 156, 18 to 21 year-old male detainees from the juvenile-detention-centre. Outcome measures were psychosocial factors, borderline personality disorder screening and self-harming behaviours. Seventy-five men (48.1%) had a history of self-harm and Borderline Personality Disorder was seen as a significant predictor for past self-harm behaviours (p<.001). This study confirmed the prevalence of mental disorder symptomology and self-harm in young adult prisoners in Malaysia. The results also highlight the importance of giving special attention to inmates that display self-harming tendencies and borderline traits.

### M6
**Does A Suicide Gatekeeper Training Work in Malaysian University Setting? A Pilot Randomized Controlled Trial**

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The Malaysian youth aged 16 to 24 years have been reported having highest suicidality. This is a significant mental health problem in Malaysia that requires evidence-based preventive intervention. Gatekeeper training is one of the promising suicide prevention strategies; however it received little attention in Malaysia. This study sought to evaluate the suicide prevention
gatekeeper training among undergraduate students using a randomized controlled trial design. A total of 130 undergraduate students were randomly allocated to a 2-hour gatekeeper training (treatment group; n = 74) or a 2-hour talk covering sexual and reproductive health information (wait-list control group; n = 56). The following outcome variables were measured in the pre-and-post intervention: perceived suicide prevention knowledge, self-efficacy in suicide prevention, suicide inevitability attitudes and willingness of helping suicidal people. Treatment group and wait-list control group did not differ significantly in all baseline measurements. Intention-to-treat analyses showed significant improvement in perceived suicide prevention knowledge (M = 5.29, SD = 0.43, p<0.01), self-efficacy in suicide prevention (M = 2.38, SD = 0.49, p<0.01), willingness of helping suicidal people (M = 1.93, SD = 0.35, p<0.01) and significant reduction in suicide inevitability attitudes (M = -1.78, SD = 0.8, p<0.01). Significant differences were observed in all outcome variables between treatment group and wait-list control group at p<0.01 level during post-test. This study suggests that brief gatekeeper training is an effective approach at increasing knowledge and self-efficacy of suicide prevention, improving attitudes towards suicidal behaviors and willingness to help suicidal people.

M7
Psychometric properties of Malay Neuropsychiatry Unit Cognitive Assessment Tool and the cognitive profile of Alzheimer’s Disease Patients
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Introduction: Neuropsychiatry Unit Cognitive Assessment Tool (NuCOG) is a more extensive dementia screening tools as compared to other brief screening tool such as Mini Mental State Examination (MMSE). NuCOG assessed a wider range of cognitive domains, which is helpful to distinguish between different forms of dementia based on the cognitive profile.

Objective: The main objective of this study is to examine the validity and reliability of Malay NuCOG in clinically diagnosed Alzheimer’s disease patients. We also evaluate the cognitive profile of Alzheimer’s disease patients using the Malay NuCOG.

Method: The English version of NuCOG was translated to Malay language and was then compared with Malay Montreal Cognitive Assessment (MoCA) among 80 individuals; with 40 of them were Alzheimer’s disease patients and 40 as control group.

Results: The Malay NuCOG showed good face validity, content validity, concurrent validity, criterion validity and construct validity. It has good internal consistency (Cronbach’s alpha=0.90). At the cut-off score of 79/100 for detection of dementia, Malay NuCOG has sensitivity of 97.5% and specificity of 87.5%. The Malay NuCOG score is positively correlated with Malay MoCA score (r=0.964, p<0.01). The reduced memory and executive domain scores compared to other cognitive domains in Alzheimer’s disease patients were statistically significant (p<0.001).

Conclusion: The Malay NuCOG has good validity and reliability with high sensitivity and specificity for the detection of dementia. Alzheimer’s disease patients have a distinctive
cognitive profile based on the assessment using Malay NuCOG. Therefore, Malay NuCOG is a useful cognitive screening tool to be use in Malaysia.

M8
Social Support And Quality Of Life Among Patients With Schizophrenia Receiving Modified Assertive Community Treatment (ACT) In Hospital Kuala Lumpur
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Background: Assertive community treatment (ACT) is a team-based approach aiming at keeping person’s with severe mental illness (SMI) in contact with services, improving social functioning, and also to improve the quality of life. Studies has shown that social support is found to be important in keeping mentally ill persons to cope and function well in community. Unfortunately in Malaysia, it is still largely unexplored although it is generally observed to be effective in further enhancing the management of patients with SMI.

Objective: This study examined the type and level of social support and how it influence Quality of life (QOL) among schizophrenia patients receiving modified ACT in the urban city of Kuala Lumpur.

Methodology: A cross sectional study was conducted on 160 patients with schizophrenia who received ACT in Hospital Kuala Lumpur (HKL). The selection was done through simple random sampling. The WHOQOL-BREF used to assess the QOL, Brief Psychiatric Rating Scale (BPRS) to assess the severity of patient’s symptoms and Multidimensional Scale of Perceived Social Support (MSPSS) used to assess social support.

Results: The mean scores of WHOQOL-BREF in Physical, Psychological, Social and environmental domains were, 55.84(8.89), 54.74(11.98), 35.66(18.59) and 55.51(11.91) consecutively. From multiple regression analysis, MSPSS (total), MSPSS (Friends) and MSPSS (Family) were significantly related to Quality of life. Married patients and shorter duration of illness significantly related to Social Domain, while lower BPRS (total) sores and female gender significantly related to Physical and Environmental domain respectively.

Conclusion: This study revealed that patients with schizophrenia under ACT and with good social support especially from friends and family had significantly high QOL in various aspects. Therefore, supporting the patients in some of these modifiable factors in clinical practice is important to achieve their higher QOL.

M9
Depression among chronic pain patients at Hospital Tengku Ampuan Rahimah Klang
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Introduction: Despite the reported high prevalence rate of depression among chronic pain patients, it is often under-recognized and under-treated. Depression frequently complicates the
effective management of pain and is associated with poorer outcome. Objectives of this study are to determine the percentage of depression, the associated factors and high risk groups for depression among those with chronic pain.

Materials and methods: This is a cross sectional study on patients who have been diagnosed with chronic pain attending pain management clinic in Hospital Tengku Ampuan Rahimah over seven months. Their sociodemographic and clinical data were obtained by interviewing the patients and also from the patients’ records. The Depression Anxiety Stress Scale-21 was used for screening and Mini International Neuropsychiatric Interview was used to establish the depression diagnoses among subjects. Numeric pain intensity scale was used to assess the severity of pain.

Results: Eighty three patients with a mean age of 50.4±12.50 years participated in this study. 56.6% of them were female, 85.5% were married and 49.4% were employed. Percentage of depression was 37.4%. Depression was significantly associated with severity of pain (p< 0.001) and duration of pain (p < 0.05) using Mann-Whitney Test.

Conclusion: One third of chronic pain patients attending pain management clinic in Hospital Tengku Ampuan Rahimah have depression. Depression was significantly associated with the severity and duration of pain. Depression should be regularly screened among patient with chronic pain.

M10
Fidelity of the Supported Employment Model in Malaysia
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In 2013 Dartmouth College fidelity scale [DCFS] was used to measure how successful Hospital Permai JB Johor, Hospital Bahagia Perak, Hospital Sentosa Sarawak, Hospital Mesra Sabah and Hospital Alor Star Kedah and Hospital SungeiPetani, Kedah had implemented the supported employment (SE) program. DCFS was a quality assessment utilizing 25 items investigation concerning staffing, organisation and services. The responses from SE providers were in the form of Linkert Scale 5 multiple choice answers. The 2013 background information of the hospitals was collected. Available data on the employment rates and the number of business projects in the surrounding areas of each hospital was obtained. Total DCFS scores for Hospital Permai JB Johor and for Hospital SunegiPetani Kedah were high at 116 and 109 respectively. The high DCFS scores were due to the relatively high potential employment of the areas near Hospital Permai JB Johor (at 73,313) and of the areas near Hospital Alor Star Kedah (at 16,303). The high DCFS scores were also contributed by the fact that Hospital Permai JB Johor and HospitalSungeiPetaniKedah had put emphasis on the critical and key components of the fidelity scale, especially with respect to (a) executive team support for SE, (b) job development: frequency employer contact, (c) job development: quality of employer contact, (d) community based services and (e) assertive engagement and outreach by integrated treatment team. Total fidelity scores for these critical and key components of the fidelity scale for Hospital Permai JB Johor and Hospital Alor Star Kedah were 23 and 20 respectively. While; total fidelity scores for these critical and key components of the fidelity scale for Hospital Bahagia Perak and Hospital
Mesra Sabah were 11 and 11 respectively. Indeed, SE providers were able to implement SE successfully if focused on having employment specialists and emphasis on IPS.

**M11**  
**Alcohol Use Disorder: Issues and Management**  
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**Introduction:** Alcohol use disorder is a significant public health problem in most western societies. It can cause grave consequences to the patient and also community at large. Unlike tobacco, alcohol policies are in its infancy and regulation is minimal. Of late, there have been a number of alcohol related harms reported in the media together with a consistent number of cases seen in hospitals. From the NMHR, Chinese were found to be the largest consumers in the country and Bumiputeras having the highest problem with binge drinking. Malaysian Indians unfortunately were unrepresented, however, were clinically seen utilizing the healthcare system the most. Treatment opportunities unfortunately are often missed at multiple stages as a result of limited awareness on the dangers of alcohol and treatment availability by the patient, carers and healthcare providers. This case report highlights a journey to recovery for an individual with alcohol use disorder accessing a specialized healthcare facility in Malaysia.

**Method& Results:** A case report

**Discussion:** This case highlights the significant harm that alcohol can cause both the patient and his community. Through awareness campaigns within local communities and within the healthcare service, help is available and effective. Malaysia despite its limited resources for alcohol use disorder can offer first world service and treatment as it has the expertise and medications to treat this condition.

**Conclusion:**  
Alcohol use disorder is a problem in Malaysia and treatment is available and effective. Accessibility and awareness is needed to ensure that Malaysians with this problem can find help.

**M12**  
**The Reliability and Validity of the Malay Version of Self-Rated Montgomery-Asberg Depression Rating Scale (MADRS-BM) Among Patients on Methadone Maintenance Therapy**  
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**Background:** Depression among patients on methadone maintenance therapy has been well-documented. Screening for depressive among this group of patients may help to identify those with depressive disorders and subsequently assess their need for treatment.

**Objective:** This study aimed to assess the reliability and validity of the Malay version of the self-rated Montgomery-Asberg Depression Rating Scale(MADRS-BM) among patients on methadone maintenance therapy.
Methods: Male patients who were on methadone maintenance therapy at the University Malaya Medical Centre outpatient psychiatry clinic were invited to participate in the study. A total of 207 patients were interviewed to obtain their sociodemographic profile and clinical background. They were assessed for depressive disorders using M.I.N.I. International Neuropsychiatric Interview (M.I.N.I. 5.0.0) and given the MADRS-BM to be completed.

Results: Out of the 207 patients, 10% fulfilled the criteria for a current major depressive disorder when assessed using the M.I.N.I. International Neuropsychiatric Interview. MADRS-S showed good internal consistency, with Cronbach’s alpha of 0.82. Factor analysis performed generated two factors. Following item-reduction, it was found that the sleep item was not reflective of depression. Based on the Receiver Operating Characteristic (ROC) curve, sensitivity was 76% and specificity was 80% at a cut-off point of 5. Area under the curve was 0.83.

Conclusion: The findings suggest that MADRS-BM is useful to screen for depressive symptoms among patients undergoing methadone maintenance therapy with good reliability and validity.

M13 Cognitive Effects of Supported Employment in Patients with Schizophrenia in Hospital Permai.
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Background: Employment has become one of the major goals in psychiatric rehabilitation of patients with schizophrenia. While it has been shown that cognition plays a part in the outcome of employment, there has been little data regarding the effect of employment on cognitive function in schizophrenia. Patients with schizophrenia have deficits in various cognitive domains and it is postulated that employment may have beneficial effect. The aim of this study was to examine the effect of employment on cognitive function as well as the difference in types of employment.

Methods: This was a prospective study. All participants who fulfilled the requirements of the study according to the inclusion and exclusion criteria were enrolled. One hundred and nine (n=109) participants who were referred to the supported employment program in Hospital Permai were recruited and assessed with nine cognitive tests based on the MATRICS Consensus Cognitive Battery. The participants were then enrolled in supported employment either in the community or in sheltered employment. The neurocognitive tests were repeated three months after commencement of work.

Results: A total of 109 participants were enrolled in the study. From the participants (n=109), eighty six (n=86) obtained employment while twenty-three (n=23) remained unemployed at the end of the study. Fifty-three (n=53) were in sheltered employment while thirty-three (n=33) were in community employment. An analysis of cognitive domain at baseline showed deficits in all domains of cognitive function (t score <50) for all participants. Baseline Cognitive domains were not significantly different in those who found employment and those who failed to place. There were significant improvement when comparing the pre-employment cognitive function with post-employment cognitive function in the domains of Speed of processing (p=0.049),...
Verbal Learning ($p < 0.001$) and Visual Learning ($p < 0.000$). The domains of Working Memory, Reasoning and Problem Solving and Social Cognition did not show significant improvement. Analysis of the improvement based on the two types of employment showed more significant improvement in the Sheltered Employment group. There was no correlation between cognitive improvement and number of days worked.

**Conclusion:** Employment has a positive effect in three of the six neurocognitive domains (Speed of Processing, Verbal learning, Visual learning) tested. Sheltered employment produce more significant improvement than community employment. Further studies with longer durations and accounting for confounders are needed to explore this area of research.

**M14**

**Job Refusal among Patients with Schizophrenia in Hospital Permai, Johor Bahru.**

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**Background:** The goals for treating patients with schizophrenia are now not only limited to symptoms reduction and relapse prevention. Functional recovery is equally, if not the most, important in treating patients with schizophrenia. Functional recovery encompassed: symptoms stability, independent living, work functioning and social functioning. To date, limited local studies look into reasons why people with schizophrenia refused to work.

**Method:** Mixed-method approach was used in this study. It involved both quantitative and qualitative statistical analysis. In the first part, the quantitative approach, patients with schizophrenia referred to Hospital Permai’s Occupational Therapy Unit was assessed quantitatively for Self-esteem, anticipated discrimination, psychopathology and medication side effects. Later in the second part, thematic analysis of from the focus groups interview was done. The results from these two analyses would then be triangulated and analysed.

**Result:** Preliminary results from the first part of the study, showed that only 23.9% of the referral are able to sustain job, while 25.4% refused to work without trying. The mean for the ‘Self-esteem scale’ for the group refusing to work and those able to sustain work are 27.6 and 26.6 respectively. As for ‘Anticipated discrimination’, those able to sustain job scored 20.4 compared to those refusing to work scoring 15.7. The study also noted that those who are able to sustain work experienced more side effects with score of 13.5 compared to those refusing to work 11.8. When assessing for positive and negative symptoms of schizophrenia, those refusing to work experienced higher total score of 51.9 with negative domain scoring 16.6 which are higher than the group working with total score of 47.9 and the negative domain score of 12.8.

**Conclusion:** The preliminary result of the first part of the study suggested that negative symptoms experienced by the patient with schizophrenia maybe the main reason for patient refusing to work. Despite anticipating more stigma or discrimination as well as experiencing more medications’ side effects, about 24% of the patients were still able to sustain working whilst 25% was not even willing to try to work. These results would then be brought to the second part of the study to explore other reasons for job refusal via focus group interviews and thematic analysis.
M15
A Randomized Controlled Trial of a Supported Employment Program in Hospital Permai Johor Bahru for Persons with Schizophrenia.

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Objectives: Individual Placement and Support (IPS) is an evidence-based supported employment model. It has been proven consistently in various socioeconomic setting to be more effective in assisting people with schizophrenia to obtain and sustain competitive employment as compared to other vocational rehabilitation. Most of the randomized controlled trials were conducted in North America and Europe. There have been few conducted in East Asia with none in South East Asia or Malaysia. We sought to examine the effectiveness of Individual Placement and Support Model in a Malaysian setting when compared to a local Hybrid Model. Hybrid Model blends elements of supported employment with sheltered employment. Methods: One hundred and forty one participants with schizophrenia who expressed desire for competitive employment were randomly assigned to IPS (n=71) or Hybrid Model (n=70). Participants were followed up for 3 months. In our study, both vocational and non vocational outcomes were assessed. Non vocational outcomes were measured using Positive and Negative Syndrome Scale (PANSS) for schizophrenia, WHO Quality of Life-BREF (WHOQOL-BREF) and modified Global Assessment of Functioning (mGAF). Results: Over the 3 month follow-up period, participants in IPS arm were more likely to achieve competitive employment compared to those in Hybrid Model (52.9% versus 33.8%; p=0.024, RR=1.56, 95% confidence interval=1.05–2.33). IPS arm showed higher hours worked per week, number of weeks worked and more likely to work ≥ 20 hours per week. In terms of non vocational outcome, both groups showed no significant differences. Conclusions: In line with other randomized controlled trials on supported employment findings across the world, IPS is more effective than other vocational rehabilitation comparator in assisting participants with schizophrenia to secure competitive employment. IPS can be implemented in Malaysia socio-economic setting. More resources should be channeled for IPS implementation.

M16
Predictors and reasons for job termination among persons with schizophrenia participating in a supported employment program

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Introduction: Supported employment is proven to improve both vocational and non-vocational domains of people with psychiatric disabilities. However, it has its limitations in terms of job sustainability. Identifying potential predictors and reasons for job termination will highlight problem areas for improvement and likely prolong job tenure.

Aim: The objective of this study was to examine job termination among persons with schizophrenia participating in supported employment. Its aims were to identify the types of job termination, whether satisfactory or unsatisfactory; the predictors for unsatisfactory job
termination; the reasons associated with unsatisfactory job termination; and to explore the desired job accommodations among participants who experience job termination.

Methods: This was a 4-month prospective study on the persons with schizophrenia who participated in the supported employment program in Hospital Permai, Johor Bahru. Baseline socio-demographic, clinical and vocational data were obtained during recruitment. Upon commencement of the first job, initial job satisfaction was assessed using the Job Satisfaction Survey within the first week of work. The participant, employer and job coach were interviewed independently using the Job Termination Interview to ascertain the reasons for job terminations during the first week of job termination. The participants whose jobs ended were also interviewed on desired job accommodations.

Results: A total of 154 patients were recruited and 29 (18.8%) dropped out from the study. From the 125 participants, 102 (81.2%) were successfully employed and 68 (66.7%) had job terminations within the 4-month follow-up period. More than half of the job terminations were unsatisfactory (77.9%), defined as the participant quitting without a ready job or being fired by the employer. Two factors were identified as predictors of unsatisfactory job termination i.e. the Malay ethnicity ($p=0.020$, Adj. OR 4.24, [95%CI:1.25-14.33]) and supported employment as the model of vocational rehabilitation ($p=0.42$, Adj. OR 4.15, [95%CI:1.05-16.43]). Other baseline socio-demographic and clinical characteristics, and initial job satisfaction did not predict unsatisfactory termination. Several job problems related to job dissatisfaction ($p=0.001$), work quality ($p<0.001$), medical illnesses ($p=0.001$), interpersonal functioning ($p=0.001$), and work schedule and environment ($p=0.007$) were associated with unsatisfactory termination. Twenty-seven participants expressed the need for job accommodations and the most common accommodation was for better salary (37%).

Conclusion: In Malaysia, special attention needs to be given to Malay clients with schizophrenia who join the supported employment model. Service providers must also be sensitive to and quick to intervene on difficulties that arise on the job especially dissatisfaction with the job, poor work quality, medical illnesses, interpersonal difficulties, work schedule and environment problems.

POSTERS

POM1
The efficacy of vortioxetine in the treatment of patients with MDD in short-term placebo-controlled studies: a meta-analysis of 11 studies
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Objective: Vortioxetine is recently approved in European Union for the treatment of major depressive episodes (MDE) in adults. This efficacy meta-analysis compared the therapeutic doses of vortioxetine (5-20mg/day) versus placebo from trials that served as the basis for the approval of vortioxetine by the European Medicines Agency. Methods: Data from 12 randomised, double-blind short-term placebo-controlled studies in MDD were analysed [1, 2]. The principal outcome measure was the estimated treatment difference in change from baseline to endpoint in the MADRS total score. Results: In the 11 studies in adults, 1515 patients were
treated with placebo and 2732 with vortioxetine. The mean difference from placebo for vortioxetine in change from baseline to week 6/8 in MADRS total score was -2.3 points (5mg, p=0.007), -3.6 (10mg, p<0.001), -2.6 (15mg, p=0.105) and -4.6 points (20mg, p<0.001) (FAS, MMRM). Vortioxetine showed a broad clinical effect across the MADRS single items and on the HAM-A total score. In the elderly study, vortioxetine (5mg/day) showed a significantly (p<0.001) greater improvement versus placebo (-4.7 MADRS points; FAS, MMRM), and on the other secondary efficacy endpoints.

**Conclusions:** In this meta-analysis, vortioxetine (5-20mg/day) proved to be efficacious with increasing efficacy versus placebo with increasing dose. Robustness and a broad clinical effect are shown by the secondary outcomes and the efficacy in elderly patients.

**POM2**

**The safety and tolerability of vortioxetine in treating adults with major depressive disorder after 52 weeks of open-label treatment**

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**Introduction:** Vortioxetine is approved in U.S for the treatment of adults with major depressive disorder (MDD). This study evaluated the long-term safety and tolerability of vortioxetine (5 to 20 mg/day) in open-label extension (OLE) trials of adult patients with MDD. **Methods:** Patient-level data from 5 OLE studies (NCT00761306, NCT00694304, NCT00707980, NCT01152996, and NCT01323478) were pooled for safety and tolerability assessment. A total of 2405 patients from these 5 studies were treated in their respective 52 week OLE trials. Safety and tolerability assessment was based on the reported treatment-emergent adverse events (TEAEs). **Results:** Of the 2405 patients, 1376 (57.2%) patients completed the 52-week treatment period. TEAEs were reported by 70.3% and 79.5% of the patients receiving flexible dosing of vortioxetine 5-10 mg or 15-20 mg, respectively, with 6.0% (5-10 mg) and 10.8% (15-20 mg) of patients discontinuing due to a TEAE. Serious AEs (SAEs) were reported by 2.9% of all patients. The most common TEAEs (≥10%) reported were nausea (5-10 mg, 15.5%; 15-20 mg, 24.5%), headache (13.0%; 13.1%) and nasopharyngitis (11.2%; 6.7%), which were all transient in nature. **Conclusions:** Vortioxetine (5-20 mg/day) was generally safe and well tolerated in patients with MDD receiving up to 52 weeks of treatment. Nausea was the only TEAE that led to discontinuation in ≥1% of the total population, was transient in nature, and with a higher incidence at higher doses. There were no individual SAEs with ≥1% incidence.

**POM3**

**Vortioxetine, a novel antidepressant with multimodal activity: A review of its preclinical mechanism of action and clinical profile**

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**Introduction:** An overview of vortioxetine’s preclinical profile and the potential contribution of its combined action on serotonin (5-HT) receptors and the 5-HT transporter (SERT) to its clinical
profile. **Methods:** Preclinical studies used cellular systems expressing vortioxetine’s primary biological targets and rodent models assessing its antidepressant and pro-cognitive potential, impact on sexual behavior and sleep architecture. Clinical efficacy in reduction of depressive symptoms and improvement in cognitive function was assessed in adults with major depressive disorder (MDD). Tolerability was based on the incidence of adverse events (AEs) in short-term clinical trials. **Results:** In preclinical studies vortioxetine led to changes in the function of several neurotransmitter systems in the rat brain. These effects likely derive from its interaction with serotonin receptor-mediated negative feedback mechanisms controlling neuronal activity of these brain areas, which is different from the mechanism of action of current antidepressants. In placebo-controlled clinical trials of adults with MDD, vortioxetine (VOR) was efficacious in reducing depressive symptoms and was significantly superior to placebo in pre-defined cognitive outcomes. In a pooled analysis, the incidence of insomnia-related AEs was 2.0-5.1% for VOR vs placebo (4.4%) and sexual dysfunction-related AEs was 1.6-2.6% for VOR vs placebo (1.1%). In a sleep EEG study, VOR at a given SERT occupancy seemed to affect REM sleep less than paroxetine.

**Conclusions:** The unique pharmacological profile of vortioxetine suggests the potential for a differentiated clinical profile that differs from that of SSRIs and SNRIs, with a low incidence of sexual dysfunction and sleep disruption.

**POM4**

**Which cognitive domains are impacted by treatment with vortioxetine?**

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Vortioxetine treatment improved the performance of elderly patients with MDD (NCT00811252) on the Digit Symbol Substitution Test (DSST). In order to determine which cognitive domains vortioxetine affects, we used additional measures in a second study1 (NCT01422213). These post-hoc analyses aim at evaluating the efficacy of treatment with vortioxetine on the cognitive domains “executive function,” “attention/speed of processing” and “memory.” **Methods:** 602 eligible patients aged 18-65 years were randomized (1:1:1) to vortioxetine 10mg/day, vortioxetine 20mg/day, or placebo for 8 weeks of double-blind treatment. Various cognition variables were evaluated at baseline, week 1 and week 8. The cognition variables were standardized and used for constructing composite Z-scores for various cognitive domains. Mixed model was used for analysis. **Results:** At week 1, separation of vortioxetine 20mg/day versus placebo was found for attention/speed of processing (composite Z-score=0.28; p=0.007) and DSST number of correct symbols (Z-score=0.22; p=0.033), and of vortioxetine 10mg/day for executive function (composite Z-score=0.21; p=0.0425). At week 8, vortioxetine 10mg/day and 20 mg/day separated from placebo for executive function and attention/speed of processing (composite Z-score 0.35 – 0.49; all p<0.01). Composite Z-scores for memory were 0.31 (p=0.0036, 10mg/day) and 0.22 (p=0.0349, 20mg/day). Standardized effect sizes for DSST number of correct symbols were 0.51 (p<0.0001, 10mg/day) and 0.52 (p<0.0001, 20mg/day).

**Conclusions:** Vortioxetine (10 and 20mg/day) improves cognitive performance across several domains, including executive function, attention/speed of processing and memory.
POM5
Depression In Association With Binge Eating And Coping Skills Among Patients Attending The Out-patient Obesity Clinic At University Kebangsaan Malaysia Medical Centre
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Background: Malaysia has become the heaviest nation in the South East Asia. Across the globe prevalence of obesity is rapidly increasing. Its association with depression is becoming more apparent where many studies have been done in Europe, North America and Asia looking at prevalence, impact and associations of the two illnesses. Very little information is available locally yet the discrepancies and similarities of the two need to be addressed. Objective: To determine the prevalence of depression among obese patients seeking treatment at the obesity clinic of Universiti Kebangsaan Malaysia Medical Centre (UKMMC). It also examined the associated factors between obesity and depression (socio-economic status, clinical factors, coping strategies and genetic contribution). Methods: A cross-sectional study of obese patients attending the out-patient obesity clinic at UKMMC was conducted between months of January to July 2014. A total of 104 patients participated and were assessed with self-completed questionnaires on demography, Depression, Anxiety and Stress Scale (DASS), Eating Attitude Test (EAT-26), Binge Eating Scale (BES), Brief-COPE (coping scale) and also interviewed using Mini International Neuropsychiatric Interview (MINI) for depressive disorders. 64 buccal swabs were taken for genetic study. Results: The prevalence of obese patients with depressive disorder was 11.5% (n=12). Presence of binge eating (p=0.006, OR=157.22, CI=4.390, 5630) and denial (p=0.049, OR=2.12, CI=1.01, 4.47) were found to be significant. Conclusion: About 1 in 10 of obese patients seeking treatment is found depressed. Those who binged and coped with denial were at higher risk.

POM6
Addressing Challenges in Cognitive Remediation Therapy for Treatment Resistant Schizophrenia
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Mr. A is a 41 year-old Indian gentleman, single and unemployed who was diagnosed with treatment resistant schizophrenia (TRS) since 2013. He presented with auditory hallucination, persecutory delusion, delusion of perception, delusion of reference, negative symptoms and cognitive impairment. His positive and negative symptoms improved with clozapine 225 mg nocte but his cognitive impairment remained. He is motivated to work but unable to comply with psychosocial rehabilitation programme. Cognitive remediation therapy was integrated as treatment programme to remediate his cognition and enhanced his functional outcome. This case report illustrates clinical challenges in providing effective management for TRS patient as well as determining implementations of cognitive remediation therapy in clinical setting that is still far beyond reach in Malaysia.
### POM7
**Marital Dissatisfaction and Depression are not Risk Factors for Breast Cancer**
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**Background:** Psychosocial risk factors (such as depression, anxiety, personality type, social support etc.) for breast cancer have been studied widely but showed inconsistent findings.

**Objective:** This study aims to determine whether marital dissatisfaction and depression are risk factors for breast cancer among married Malaysian women.

**Methods:** Every consecutive married woman newly presented with breast symptom to the outpatient Breast Clinic in University Malaya Medical Centre (UMMC), was invited to participate in the study. They were not diagnosed with any breast disease yet. The women were given questionnaires to assess their socio-demographic and clinical background, Center for Epidemiological Studies for Depression (CES-D) Scale, State-Trait Anxiety Inventory (STAI) and Golombok-Rust Inventory of Marital State (GRIMS) Questionnaire. Breast cancer was confirmed by the histopathology (HPE) diagnosis and revealed to the women in a later date follow-up.

**Results:** A total of 359 women responded with mean age of 39.8±10.0 years. About 60% were Malays and 85% presented with breast lump. Fifteen percent (n=55) of them had confirmed breast cancer. Of all, 57% had at least poor marital satisfaction (42% had severe problem) and 48% had depression. Breast lump was significantly associated with breast cancer. GRIMS, CES-D and STAI scores were not significantly associated with breast cancer.

**Conclusion:** In this study, marital dissatisfaction and depression are not the risk factors for breast cancer.

### POM8
**Psychosis following traumatic brain injury: A Systematic Review**
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**Background:** There is a knowledge gap regarding risk of psychosis following traumatic brain injury. It is important to identify the core protective and risk factors that precipitate psychosis in order to effectively manage the condition. The objective of this systematic review is to identify risk factors of psychosis following traumatic brain injury (TBI).

**Method:** We performed a literature search of studies using MEDLINE, EBSCOHOST, Cochrane Reviews, PubMed and Google Scholar from January 1992 to December 2014. Both clinical trials and observational studies were included. Only English articles were reviewed.

**Results:** We screened 3093 articles but only 50 eligible papers were included. The risk of psychosis following TBI remains low. Those with strong family history of psychotic illness prior to traumatic brain injury, severity of head injury and younger age pose higher risk of developing psychosis.

**Conclusion:** There is a small but notable portion of patients with TBI who are vulnerable to succumb to psychosis. Further research aiming at this high risk population should improve management and outcome.
**POM9**

**Successful Treatment of Catatonic Schizophrenia with Electroconvulsive Therapy**

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Electroconvulsive therapy is a procedure in which electric currents are passed through the brain, intentionally triggering a brief seizure. It was developed in the 1930s and was used widely during the 1950s and 1960s for a variety of conditions. It is now only used for fewer, more serious conditions. Maintenance Electroconvulsive Therapy (M-ECT) has been found to be efficacious, safe, well tolerated and cost effective in reducing relapse, recurrence and hospitalization particularly in the management of treatment resistant schizophrenia. Studies found that cognitive functions remained largely unaffected with long term M-ECT. We report a 34 year old Siamese gentleman with 25 year history of catatonic schizophrenia. M-ECT was administered due to worsening condition of his illness in recent months despite good adherence to antipsychotic medications. His unresolved psychotic symptoms and frequent hospitalization was decided to be treated with just M-ECT without any psychotropic medication. His psychotic symptoms resolved and his functional capacity improved. No hospitalization was required during his 6 month period of M-ECT.

**POM10**

**Comparison of Pharmacological Treatments for Obsessive Compulsive Disorder: A network Meta-analysis**

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**Objective:** Obsessive compulsive disorder (OCD) is characterized with obsessions and subsequent compulsive behaviors. Numerous studies showed evidence about serotonin reuptake inhibitor (SSRI) therapy and cognitive behavioral therapy. However, a complete comparison of different pharmacotherapy is still lacking. This study aims to systemic review and meta-analyze the role of pharmacological treatments in patients with OCD.

**Methods:** Using wide-ranging search terms of “OCD”, “treatments” and “efficacy” from electronic databases, including PubMed, Cochrane library, MEDLINE and Embase. We selected studies designed as double-blind randomized, placebo-controlled clinical trials. 620 articles were included for further abstract and full article review. To specify the medication effects, studies combined with pharmacological and psychosocial interventions were excluded. Augmentation with another psychotropic agent was acceptable. WinBUGS(version 1.4.3) was used for the multiple-treatment-comparison meta-analysis, or so-called network meta-analysis.

**Results:** Fifty-eight of total included studies were two-arm studies and one article contained three treatment arms. 5 SSRIs (sertraline, fluoxetine, fluvoxamine, paroxetine and citalopram), one traditional antidepressant (clomipramine), ketamine, topiramate and 5 antipsychotics augmented with SSRIs (olanzapine, quetiapine, risperidone, haloperidol and aripiprazole) were included. Results from those meta-analyses suggest that antidepressants were less efficacious in decreasing OCD symptoms. Ketamine is superior to placebo but there was only one study.
presented. The efficacy of augmentation with SSRIs and olanzapine/quetiapine/risperidone was better than SSRIs and augmentation with haloperidol/aripiprazole.

**Discussion** All kinds of medication are inferior to placebo, implying OCD is difficult to treat with medication alone. We need further studies to compare the efficacy of combination of different modalities of therapy.