ANGELMAN SYNDROME ASSOCIATION

www.angelmansyndrome.org

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President's Report

Committee News

The Annual General Meeting of the Association was held in December 2011.

A new committee was elected with some members changing their committee status. I wish to thank the members of the committee for their contributions to the meetings.

Kerri Monaghan is the new SA Vice President in place of Heather James who remains on the committee as a committee member. Leticia Grant is the new Vice President for Western Australia. Thank you Kelli Wild for your contributions. Kelli has also remained on the committee. I welcome Mary Bills who has been elected as a first time committee member. All other committee members remain unchanged.

It is regretted that we have been unable to get representation from Queensland and Victoria.

Contact emails and phone numbers for all committee members will be posted on our website.

President: Liz Stanley

Secretary: Sally Shackcloth and she is the Editor for our National Newsletter

Treasurer: Kevin Kennedy

VP WA: Leticia Grant

VP SA: Kerri Monaghan

VP NSW: Anne Funke

VP Tasmania: Eric Smith

VP Vic: vacant

VP Qld: vacant

Committee members: Lysandra Warren, Heather James, Mary Bills, John Hannaford and Kelli Wild.

Vice Presidents are usually the first person of contact for enquiries in their own State and for new parents.

At the AGM all changes to the Constitution were passed and now remain to be lodged with the relevant Government authority. Hopefully the changes to the Constitution will enable us to qualify for tax deductibility for donations. Once we have been granted this status, we intend to put a "donate" button our website.

FAST Gala Night for the Angels will be held on Friday 23rd March in Sydney. I will be attending representing the Association and I encourage all of you who can to attend to give support to raise funds for research into Angelman syndrome.

Professor Bernard Dan, our international medical patron, has written a clinical summary of the breakthrough research being undertaken by Drs. Philpot and Zylka in North Carolina. A copy of his summary is attached to this newsletter.

Editor's Note: For more information from the AGM please see article by Kevin Kennedy on p.8.

Clinical summary of breakthrough in Angelman syndrome research by Professor Bernard Dan. 7 February 2012

Genetic Mechanisms which can cause Angelman Syndrome

Angelman syndrome is caused by the lack of expression of a small portion of DNA, i.e. the UBE3A gene, in brain cells. This gene is located on chromosome 15. We normally have two intact copies of it in each of our cells, as we inherit two full sets of chromosomes, one from our mother and one from our father. However, the UBE3A gene is expressed (almost) exclusively from the chromosome 15 we received from our mother and the copy that is present on the chromosome 15 we got from our father is (virtually) not expressed at all.

- **Deletion** - Many people with Angelman syndrome have this condition because here the region containing the UBE3A gene on the chromosome 15 they inherited from their mother is missing; this is referred to as a deletion or del 15q11-q13.

- **Uniparental disomy** - Another genetic accident which may cause Angelman syndrome results when both chromosomes come from the father and none from the mother: this is paternal (=from the father) uniparental (=from one parent) disomy (=both chromosomes).

- **Imprinting defect** – another abnormality is not being able to identify the chromosome 15 which is inherited from the mother; this is known as an imprinting defect.

- **UBE3A mutation** - Finally, there may be an abnormality within the sequence of the UBE3A gene; this is a UBE3A mutation.

All these mechanisms give rise to Angelman syndrome, but there may be statistical differences in the severity of the condition according to the underlying genetic mechanism. Some features like intellectual disability, speech impairment and epilepsy tend to be somewhat less severe in individuals who have uniparental disomy or imprinting defect than in those who have a deletion or a UBE3A mutation.

This variability may point to the possibility of residual (if minimal) expression of the gene which is intact, i.e. the copy of UBE3A which doesn't carry the typical 'READ ME' signal that normally marks it as coming from the mother: patients with a deletion or a mutation have one intact (but virtually non-functional) copy of the UBE3A gene, and those with uniparental disomy or imprinting defect have two intact (but virtually non-functional) copies.

For a number of years, several teams have tried to find ways to promote the expression of the intact but non-functional copy of the UBE3A gene. There have been great improvements in the understanding of mechanisms that naturally promote expression of the gene on the chromosome 15 inherited from the mother: This 'READ ME' signal is related to DNA methylation. This has led to various treatment attempts which have all failed to show clearly positive results up until now.

Recent Research breakthrough

Very recently, a team led by **Benjamin Philpot and Mark Zylka** in North Carolina used a different approach. They tested more than 2,000 known drugs on a mouse model of Angelman syndrome to see if some of them could activate the non-functional copy of UBE3A. And indeed, among these drugs, a small family of anti-cancer drugs, which are known to affect a specific process related to DNA, has been shown to activate the normally silenced paternal copy of the gene. The most potent drug in this group was topotecan, alias Topo.

When used to treat cancer, it is hoped that this drug alters the DNA in such a way that it can't undergo replication, eventually leading to the death of cancer cells. The property on which Topo treatment is based in that context is thus clearly cytotoxicity, or cell poisoning. The fact that this drug can activate UBE3A may have great implications for developing new strategies of chemical management of Angelman syndrome.

A lot of questions need to be answered before we know if and how these early results in animal experiments can impact individuals with Angelman syndrome; for example: Would the effect of such drugs on UBE3A expression be stable over time? What would be the effect on the manifestations of the syndrome in animal models? What doses would be useful and how should they be given? Which side-effects might there be? When should they be administered? And then how safe, useful and feasible would it be to give them in humans? Only then would we start exploring whether (and to what extent) drugs such as Topo might alleviate symptoms in individuals with Angelman syndrome. These are all new questions and the teams, technology, methodology and enthusiasm are already working on them, while keeping in mind that medical science must follow a sound stepwise road and it is obvious that human trials cannot start before we have firm answers to the preliminary questions.

Editor's note: Professor Dan has advised that one could expect a change in all genetic forms including deletion. We thank Professor Dan for the summary in easy to read and understand format.

CLINIC CHAT

with Dr Antonia Milner
Angelman Clinic Co-ordinator

I would like to take this opportunity to wish everyone in the Angelman Syndrome Association a very Happy Christmas and New Year.

The Angelman Syndrome Clinic has been busy with face to face consultations as well as email and phone contact. We have mainly seen young children but have seen one adolescent and one young adult in conjunction with an adult rehabilitation specialist.

I would like to emphasise that we are happy to have contact from new and past clients, and both children and adults. We are still working on the possibility of Video Conferencing to rural and remote areas of NSW at this time and hope to get this up and running next year.

The Clinic email address is AngelmanClinic@sesiahs.health.nsw.gov.au. I will be away from 18th December to 9th January but will respond to your emails upon my return.

Editor's note: Owing to the delay in sending out this newsletter, Antonia's Happy Christmas message seems out of date but the Happy New Year message is still well and truly current!

Looking for families with 2 angels

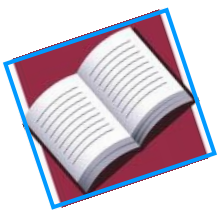
Emily has two angels and is wanting to make contact with other families in Australia who also have two angels.

Emily lives in Brisbane and has two children with AS (ube3a). Her son Alex is turning 6 in April, and her daughter Hannah just turned 4.

Emily says they got the official diagnosis in April 2010, prior to that were told it was unlikely they had AS.

Emily has heard of other Australian families that have 2 children with AS, and would really like to make contact.

Emily can be contacted by email:
eemcinnes@gmail.com



Book Reviews

Please contribute articles about useful or inspiring books, poems, stories etc to the Editor for the next newsletter!

NDIS News:
Victoria to Trial Disability Insurance Scheme

The Victorian Government is set to trial the national disability insurance scheme, the Victorian Minister for Community Services The Hon Mary Wooldridge has announced, but not until 2014.

The Victorian Government has offered to trial the National Disability Insurance Scheme in 2014, to test out the concept ahead of the proposed national roll-out in 2015.

The Minister said the new model would cut waiting times for those eligible for disability support payments. She said this would change the welfare-based disability support system into an entitlement-based support system.

Victorian Premier, Ted Baillieu announced earlier this year the establishment of a taskforce to advise the Government on the establishment of a new National Disability Insurance Scheme, and a National Disability Insurance Scheme (NDIS) Secretariat in the "Department of Premier and Cabinet (DPC) has been set up.

Baillieu said the Victorian Government was committed to a new approach to disability funding, such as an NDIS, which would introduce a no-fault universal safety net – similar to those operated by the Transport Accident Commission and WorkSafe – for people with permanent or severe disabilities.

However the funding of the national scheme, which is expected to cost more than $12billion per annum, and how much will be paid by the federal and state governments is still unclear.

Full article available: Pro Bono Australia 5/05/2011
http://probonoaustralia.com.au/news/2011/05/victoria-trial-disability-insurance-scheme

News from around the world

Firstly, congratulations to the Foundation for Angelman Syndrome Therapeutics (FAST) for winning the Vivint Gives Back project. Together with donations, many coming after Colin Farrell's appearance on the David Letterman show in August, FAST received just over $290,000 to fund their first-ever human clinical trial for a potential therapeutic. For more details go to www.cureangelman.org

You may be interested in the discussion about the current research and the question 'Is there a "cure" for Angelman Syndrome?' in the current issue of the ASSERT newsletter. The website is: www.angelmanuk.org

There is more discussion, 'Thoughts on the word 'cure' by Rebecca Burdine in the recent FAST Australia newsletter. Find it at: www.cureangelman.org.au

"A Night for the Angels"

We are Michaela & Keith Townsend from Sydney and our 3 year old son Jake was diagnosed with AS in September 2010. Since Jake's diagnosis we have been trying to adjust to the new hopes and dreams for our family and in doing so we feel that raising awareness about AS is hugely important. With the help of family and close friends we are hosting a Gala Dinner to raise awareness and funds for FAST (Foundation for Angelman Syndrome Therapeutics). The evening will consist of a guest speaker, live entertainment and an auctioneer for the live and silent auction.

We would love to see as many of the AS community on the night as possible, so please join us if you can. You can find further information and purchase tickets via our website: www.anightfortheangels.org

In order to make the night a success we are relying on generous donations of items to be auctioned on the night. To discuss donations or sponsorship please email me at michaelat@live.com.au.

Event:	"A Night for the Angels"
Date:	Friday 23rd March 2012
Time:	7pm
Venue:	Miramare Gardens, Terrey Hills NSW
Price:	$125 per person (includes canapés, 3 course meals and beverages)

Newsletter by email

If you would like your newsletter emailed (PDF format) to you instead of being posted send a note to Kevin Kennedy at kevin.kennedy@bosco.nsw.edu.au requesting that your future newsletters be emailed to you. This is not only cheaper for the association but faster for our current Treasurer who volunteers his time while, like us all, juggling work, family and life with an angel.

A Tasmanian Holiday Story

I've just had the experience of spending six days away on holiday in Launceston as a volunteer accompanying my daughter, Hannah, now 22 years old. She lives in a local L'Arche Community in Hobart. Each year 'core members' decide where they would like to visit so some people holidayed in Melbourne, others in Launceston and the Gold Coast. Although the week was quite exhausting mentally and physically, I learnt so much from it. I was able to see Hannah in a different way, interacting with others. I was also able to get to know the other community members.

When I reflect on the trip these significant words popped into my head: patience, respect, independence, kindness and 'a good life'. I was able to see hundreds of examples of the *patience* needed to get through a day happily with people of very varied personalities and abilities. I witnessed both the core members and the assistants having to be so patient in many different ways.

I saw the *respect* people gave one another in choices provided and in the way people were spoken to. I saw how everyone valued their *independence* and were proud of what they could do whether it was getting dressed smartly, paying for their own items at the shop or choosing from the restaurant menu. I saw the *kindness* of strangers as well. Hannah smiles at people all the time wanting them to interact with her. She often tries to reach her hand out to people as we walk along. I wasn't quick enough one afternoon and she had taken hold of a stranger's hand. This woman continued to hold her hand for quite a few metres until she got to her car and then waved goodbye to Hannah. There were the usual stares from people but there was also kindness – from the captain and office lady at the cruise boat, the people at the Platypus World, the volunteers at the Tamar Wetlands Visitors Centre and the driver of the Thomas the Tank train in the City Park. He gave us a free ride!

A good life involves *more* than the physical health side of healthy food and conscientious personal care. A good life revolves around attitude and choice and opportunity. There was a desire for core members to have the opportunities in life that non-disabled people expect such as travel and recreation. Despite the many difficulties faced, such as mobility, the general attitude of the whole group was…" We will have a fun holiday!"

Sally Shackcloth.

Association AGM, December 6 2011 Report

by Kevin Kennedy.

The AGM was attended by only a few dedicated members, as is often the case in our off-conference years. Besides the normal proceedings of the AGM – apologies, minutes of the previous AGM, President's report, Treasurer's report, and election of Office Bearers, there were a number of General Business items.

There was unanimous support for the proposed amendments to the Constitution, and many members sent in their proxy votes in support. The amendments simplify sections of the constitution, remedy some errors, eliminate the need and expense of having our accounts audited (changes to the Associations Act in NSW no longer require audits for associations our size), and enable the association to apply for and gain Tax Deductibility status. The necessary documents are currently being prepared for our application for Tax Deductibility.

Unfortunately the association was unable to have a biennial conference in 2011. However, we look forward to our 20th Anniversary Conference in Sydney in 2013. The Association was formed after our first meeting on March 20 of 1993, and our first conference was on October 30 and 31 in Kogarah later that same year.

At the AGM there was an update of progress at the Angelman Syndrome Clinic in Kogarah, and recognition of the work that Dr. Robert Leitner, Dr. Ellie Smith, Dr. Rani Sachdev and Dr. Antonia Milner are doing in carrying forward the work of the Clinic. There have been many new referrals to the Clinic, as well as current members contacting the clinic for support with ongoing issues.

The AGM also recognised the work of our President, Liz Stanley, in leading our Association and Committee over the past 12 months, and the work and time spent by the committee in our lengthy email meetings throughout the year.

We look forward to another busy year in 2012, particularly as early preparations are made for the 2013 Conference.

Correspondence to **President**
16 Kirkcolm Way WARWICK WA 6024
Payments to **Treasurer**
PO Box 554 SUTHERLAND NSW 2232
Newsletter articles to
sallyshackcloth@live.com.au
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