Australasian Institute of Dangerous Goods Consultants

# WHAT'S HAPPENING?

**August 2009**

Welcome to our New Member Jeff. Simpson Victoria

## HAVE YOU REGISTERED???

**ANNUAL CONFERENCE**
**Crowne Plaza Sydney**
**September 18**

**Is Risk Assessment Enough?**

**Guest Speaker:**
**Peter Wilkinson Caltex**
**Case Study on Major Petrol Spill**
**Newport Victoria**

**Full fee paying Members and Associate Members are entitled to attend free of charge. Corporate Members may nominate two complementary attendees.**

## From My Archives

### Gas Tanker Explosion

http://www.youtube.com/watch?v=a049O0EiacE&feature=fvw

- **A gasoline tanker truck overturned, caught fire and exploded forcing at least a six families and a nursing home to be evacuated.**

### Assorted Footage

http://www.youtube.com/watch?v=wcmmLvAYqkI

- **Liquid Petroleum & Propane Gas; Isobutane and Ammonium Perchlorate explosions**

AIDGC DIARY DATES FOR 2009

**Mixed Class Dangerous Goods**

**Sydney** – Date and venue to be advised
**Brisbane** – October AECOM Conference Room

**Fire Videos Film and Discussion Evening**

November 26
Ryedale Room
Ryde Eastwood Leagues Club
West Ryde
Sydney

# Emergency in the Air


**On July 25 a Qantas Boeing 747-400 lost cabin pressure and the pilots made an emergency landing in Manila when a portion of the fuselage broke away from the main frame during the flight. A preliminary investigation indicated that an oxygen cylinder mounted in that area of the baggage compartment was apparently ejected along with the fuselage panel and probably luggage and cargo. Flooring on the main deck also buckled due to the incident. Cabin pressure was lost activating the overhead oxygen masks. The flight crew did a magnificent job in getting the aircraft down to a breathable altitude of 10,000 feet and then diverted the aircraft to Manila for an emergency landing. Qantas inspectors later found remnants of the cylinder's valve in the passenger cabin possibly indicating that the cylinder exploded causing the damage to the fuselage. Qantas' 747-400 aircraft use cylinders of oxygen to supply passengers with oxygen if the passenger cabin loses its pressurization. The cylinders are mounted against the aircraft's lower-deck fuselage and are considered to be part of the aircraft's basic safety equipment and are not considered as cargo. Many other carriers use chemical oxygen generators to handle a similar loss of cabin pressure. Those canisters are mounted in the area of the overhead baggage compartments. In both configurations the oxygen masks for the passengers are automatically deployed when an aircraft loses cabin pressure. Thankfully, there were no serious injuries as a result of this incident. Qantas has inspected all cylinders on other aircraft for any indication of potential problems. As with all compressed gas cylinders, the risk of fragmentation exists due to damage, age, over-filling, failure to test the cylinder before filling, or mishandling. Fragmentation is a violent bursting of the cylinder causing pieces of the cylinder to act somewhat like a hand grenade. Leakage of the gas of course is an imminent danger and with oxygen, the problem is always that a release of oxygen can cause an immediate risk of an intense fire or explosion.**

This month my thanks go to

Scott Young

Tim Dean

Peter Hunt

Frank Mendham

Don Johnston

for their contributions

# Honorary Member – Graham Goodfellow

**Founding Member of the AIDGC, Graham Goodfellow was presented with Honorary Membership and a plaque to recognize his very significant contribution to the formulation and initial operation of the Australasian Institute of Dangerous Goods Consultants. Congratulations Graham!**

# Workplace Safety Essentials

# Alerting Your Customers

**Does your customer use chemicals in the workplace?**
**Tell them about these FREE two-hour WorkCover Workshops to learn simple steps they can take to safely use and store chemicals, hazardous substances and dangerous goods.**

**Business operators who attend this workshop may be eligible for up to $500 cash back for implementing a safety improvement at their workplace.**

**Chester Hill - Tuesday 20 October 2009**
**Morisset - Thursday 10 September 2009**
**Nambucca - Wednesday 28 October 2009**
**Narrabri - Tuesday 8 September 2009**
**Orange - Wednesday 21 October 2009**

**http://www.workcover.nsw.gov.au/safebusiness/WorkShops_and_Events**

## Sulphuric Acid Spill

**New South Wales fire crews have neutralised an acid spill near Sydney's north shore. Crews were called after a 10 000 Litre tank was discovered leaking late in the afternoon. The acid was used by a firm for the production of motion picture film. The tank was located within a 20 000 Litre concrete bund, designed to safely contain the tank in the event of such a leak.**

**Fire Brigade Hazmat Crews attended and confirmed that the bund has successfully contained the acid after it leaked from a small crack in the tank. At the time of the leak the tank contained approximately 8 000 Litres of acid, with further investigation showing that the crack was located at the 6000 Litre fill level. Due to the design of the tank and the safety bund it was deemed that there was no risk to people or the surrounding homes and evacuation was not required.**

**Fire Brigade and Police secured the area and Ambulance Crews stood by as a tanker emptied the contents of the tank. After this the Fire Brigade used protective clothing and breathing apparatus to remove any residual acid in the bund.**

## Oxyacetylene Explosion

**A 20-year-old worker has been severely burned on the arms and face after an oxyacetylene explosion at a Hunter region factory in NSW. The incident occurred on 18 August 2009.**
**Police closed the nearby Tomago Road following the explosion at the Laverick Street factory, establishing a 200m exclusion zone. WorkCover NSW and the fire brigade are investigating the circumstances of the explosion. According to The Herald initial police investigations found the man might have been changing the bottle when it exploded in his hands. His co-workers allegedly plunged the bottle into water, but there were fears it might explode again.**

## Continuing Professional Development

**Members are advised that in line with the AIDGC Rules, a CPD audit will be held about September this year for full Members only. Might be time to ensure that your records are up to date?**

## Corporate Members

Our Corporate Members provide a range of products and services to the Dangerous Goods Industry. Their contact details are:

AECOM
Tim Dean
(07) 3858 6700
M +61 421 407 633

AJM Environmental
Adrian Minshull
02) 9542 2366

Store-Safe Pty Ltd
Grant Breeze
02) 9569 2122

Vanguard Solutions
Tony Davies
08) 9420 5322

# Changes to Medical Oxygen Cylinders

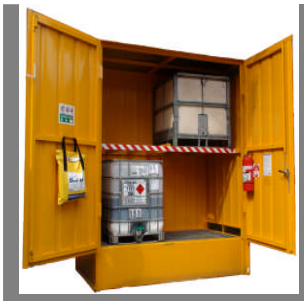
**In 2003 a baby girl died in NT. The coroner's findings included hypoxic brain damage, caused or contributed by (inter alia) "the administration of carbon dioxide during resuscitation causing the deceased to be deprived of oxygen for an indeterminate period". Among many factors contributing to the mistaken use of CO2, the coroner commented "The administration of the carbon dioxide to the deceased was accidental. The CO2 cylinder was thought to be an oxygen cylinder because it was located in the room where the resuscitation was performed and apparently had tubing and a face mask already attached to it."**

**The coroner's recommendations included:**

- **The issue of labelling medical gas cylinders be reviewed.**
- **That the configuration of medical gas cylinders be reviewed to ensure that inappropriate gases such as carbon dioxide cannot be connected to equipment used for resuscitation such as face masks.**

**The Australia New Zealand Industrial Gas Association (ANZIGA) is coordinating a changeover program for medical oxygen valve outlets and the cylinder colour change for all medical gases across Australia as required by AS 2473.3 and AS 4484. The program starts in the Northern Territory in September 2009, with South Australia, West Australia and Queensland during 2010, NSW/ACT in February 2011 and finally Victoria/Tasmania in June 2011.**

**The threaded valve outlet on D, E and G cylinders, including bundles will be replaced with a pin indexed valve outlet (C and smaller are already fitted with pin indexed outlets). Regulators will need to be replaced as will manifold connections. The new colour scheme is a white cylinder body (for all medical gases) with a white shoulder/top (oxygen) with a letter "N" marked in 2 places on opposite sides of the shoulder.**



## New Outdoor Dangerous Good Store Released by Corporate Member

**Store-Safe, a corporate Member of AIDGC, has announced the release of a redesigned store for the use of 1000 litre IBCs to cater for the increased preference by industry to supply chemicals in one thousand litre IBCs. Grant Breeze, Store-Safe MD, said that credit for the design enhancement of the new range of IBC stores goes to some members of AIDGC, in consultation with WorkCover NSW and government departments.**

**"We worked together using two punctured IBCs as a worst case scenario to fine- tune the store's final design. Our relationship with both the AIDGC and WorkCover NSW is an essential ingredient for any store or cabinet we design and manufacture," said Mr Breeze.**

**Store-Safe's larger IBC cabinets and stores will feature a minimum 2000 litre capacity bunding system for outdoor flammable goods stores. Complying with AS1940 - 2004 (special requirements, section 47 of the standard), the new additions to the Store-Safe range are forklift and pallet `friendly', include construction using strengthened Bluescope plate and OneSteel section, registered key locking system, internal emergency escape handle and weight rated shelving and also feature all safety signage and a specified spill kit is inclusive.**

**For further information, technical specifications and Store-Safe office locations, visit the web site at [www.store-safe.com](http://www.store-safe.com)**

## Your New AIDGC Board

At the Annual General Meeting the following Members were elected to the Board:

Peter Hunt – President

Richard Hall – Vice President and Technical Chair

Ross Underwood – Vice President and Competency Assessor

Christopher Flannery – Secretary/Treasurer and Public Officer

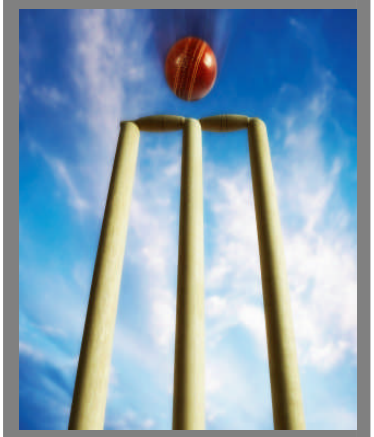
Terry Grainger – Committee Member and Membership Officer

Committee Members - Philip Turner and Leonard Gawecki

## Petrol Tanker Explodes Near Parkes

**Police are investigating the circumstances surrounding a major crash near Parkes, NSW, on August 7th where a petrol tanker exploded and a car was incinerated. Emergency Services were called after following reports of the collision – fortunately the driver of the truck managed to escape, as did the occupants of the incinerated vehicle.**

**[http://www.police.nsw.gov.au/news/media_release_archives](http://www.police.nsw.gov.au/news/media_release_archives)**



## The Oval – London – More than Ashes

**An important recent planning decision for the cricket ground involved the UK Health and Safety Executive. Close to the Oval is a top tier COMAH site (a major hazard facility). This is a gasholder facility. You can see one of the gasholders to the right of the modern pavilion on the TV broadcast. The owners of the ground applied for development approval to build a six storey stand to accommodate an additional 1 830 patrons and an international hotel. The local planning authority, the local council, was required to refer the application to the HSE on account of the proximity to the COMAH site. HSE advised against granting planning permission. The council approved the application. The HSE then asked the application to be called in for a ministerial inquiry. This was the 4th time they had done this in 30 years. Normally, local planning authorities heed the HSE's advice when they advise against a proposal. The government decision has been to support the council's approval of the application. This is a situation that will occur more and more with the demand for developments near Australian major hazard facilities in urban areas. A legacy problem we have from industry developing close to sensitive land use i.e. residential.**

## $3.65 Million Settles Claims for Ammonia Spills

**A pipeline company and two of its former operating firms will jointly pay a civil penalty of $3.65 million to resolve violations of the Clean Water Act resulting from anhydrous ammonia spills in Nebraska and Kansas, the Justice Department and U.S. Environmental Protection Agency announced today. The spills which occurred in 2004 resulted in significant fish kills in surrounding waterways. Magellan Ammonia Pipeline, of Tulsa, Oklahoma; Enterprise Products Operating, of Houston, Texas and Mid-America Pipeline Company, also known as MAPCO, also of Houston, agreed to the settlement in the form of a consent decree filed today in the U.S. District Court in Kansas City. In a complaint filed jointly with the consent decree, the United States alleges that Magellan, which owned the pipeline, along with operating firms Enterprise and MAPCO, were responsible for two anhydrous ammonia spills in 2004. The first spill occurred on Sept. 27, 2004, near Blair, Nebraska, killing an estimated 1,000 fish along North Creek and a golf course**

pond and the second spill occurred on October 27, 2004, near Kingman, Kansas, killing more than 20 000 fish along a 12.5-mile section of Smoots Creek. The rupture of the pipeline near Blair resulted in the hospitalization of one individual and emergency responders evacuated homes within a one mile circumference of the break. The Kingman rupture resulted in a 40 foot high vapour cloud that was one mile long and also resulted in evacuations. The United States further alleges that as operators of the pipeline system, Enterprise and MAPCO violated the Federal Comprehensive Environmental Response, Liability and Compensation Act 9CERCLA) by failing to immediately notify the National Response Centre about the spills. The Acting Assistant Attorney General said that 'this settlement will ultimately result in better training of employees and implementation of prevention systems to reduce the possibility of future discharges of harmful chemicals".

A copy of the consent decree is available on the Department of Justice Web site at:

http://www.usdoj.gov/enrd/Consent_Decrees.html.

Source United States Department of Justice

http://pr-usa.net/index.php?option=com_content&task=view&id=251072&Itemid=28

## Standards Australia News

No new projects have been approved for development in the Manufacturing and Processing Sector between 2 July and 5 August 2009. From 1 July 2009 all new projects, including revisions and amendments, irrespective of pathway, will require stakeholder funding. Costs are negotiated at the outset with a Relationship Manager in alignment with Standards Australia's pricing model. Due to the impacts of the global financial crisis on investment returns, the Standards Australia Driven pathway, previously funded and resourced by Standards Australia has closed.

Standards Australia is actively working on some 350 Standards development projects ranging from furniture stability and wheelchairs to amendments to the Wiring Rules and the Building Code of Australia.

Currently, Standards Australia's Relationship Managers are engaging with government, the professions, industry, business and other stakeholders on new projects relating to: Electric Vehicles; Health Informatics; Timber Products; Cement; Law Enforcement and Security; Smartcard Authentication; Energy Efficiency; Consumer Products; and Management and Business.

For more information go to www.standards.org.au and check out "Bulletin #1 Monday 17 August" and "Sector Updates".

# Chemical Leak Closed Port of Brisbane

**Queensland police declared an emergency situation across the entire Port of Brisbane after a chemical leak on August 11. A highly flammable liquid sparked the emergency. The alarm was raised shortly after 5am AEST when workers reported a chemical leak. The colourless liquid, isopropylamine, had leaked from a shipping container. It is commonly used in herbicides, but authorities say it is noxious and highly flammable. A 300-metre exclusion zone was set up around the container. Emergency Services spokeswoman Chantelle Rule said it was believed to be coming from a 25,000-litre container on one of the wharves. "Firefighters put on protective clothing and went further into the site to investigate where the leak was coming from," she said. A truck driver who inhaled the fumes was taken to hospital after being treated on the side of the Gateway Motorway.**
**A 300-metre exclusion zone was set up around the container.**

**http://www.abc.net.au/news/stories/2009/08/11/2652005.htm**

# New Information On Buncefield

**The recently released report from the UK HSE on the Buncefield explosion mechanism has interesting new information. The ignition source has been confidently identified. After 40 minutes of petrol overflowing the tank, someone or something activated a fire alarm. This started fire water pumps that were within the vapour cloud and that ignited the cloud. This is the first time they have revealed that a fire alarm was activated. Nine witnesses were near the vapour cloud when it exploded. None were seriously injured. Overpressures within the cloud were uniformly high - enough to severely crush cars. Being outside the cloud saved the witnesses. Trees and undergrowth are confidently believed to be the trigger that converted the deflagration emanating from the pump house to a detonation that then spread to a significant part of the cloud.**

# Keep in Touch

**If you have any suggestions or queries, please do not hesitate to contact the AIDGC Executive Officer, Robyn Hogan at: robhogan@tpg.com.au or via the AIDGC Paging Service on 02) 9430 6739 and I will return your call.**

# Visit Your Website

**http://www.aidgc.com and check out the Members' Only pages.**