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FIREPOINT: IF YOU HAVEN'T PAID YOUR FEES FOR THE CURRENT YEAR, PLEASE DO SO NOW.

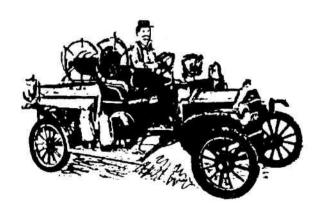
EDITORIAL

In August, Jamie Novak headlined a two day Conference in Queensland, then came to New South Wales for a one day performance. The concept of bringing outstanding overseas speakers to Australia, and utilizing their knowledge and experience in several states makes sense

Why can't we get a speaker to attend all three Australian Chapters on the eastern coast. It saves costs.

We feature an article by Jamie in this issue. To see his photographs in brilliant colour, visit the NSW AFI website (www.nswafi.com.au), and look under "Seminar".

Wal Stern



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GAS EXPLOSIONS

Jamie Novak

Before one can begin to investigate an explosion caused by natural or propane gas, one must first understand the properties of these gases.

Natural gas has a lower explosive limit (the minimum amount of natural gas required to burn) of 5% and an upper explosive limit (the maximum amount of gas that will burn) of 15%. The vapor density of natural gas is 0.6, making it lighter than air. The ignition temperature of natural gas is approximately 900° - 1170° Fahrenheit.

Propane has a lower explosive limit of 2.15% and an upper explosive limit of 9.6%, meaning it takes much less propane gas to reach an explosive limit than natural gas. Propane gas also has a vapor density of 1.5, making it heavier than air with a propensity to settle and is more difficult to disperse than natural gas. Propane gas has an ignition temperature of 920° - 1120°F.

Both natural and propane gas are odorless, so in order to be detected they must be odorized before they reach their lower explosive limit. Generally speaking, some type of mercaptan is used to odorize the fuel gas. Mercaptans are very strong and usually require approximately 1.4 pounds per 10,000 gallons of propane. Factors that can affect the detection of the odorant in propane and natural gas are a person's age, health, colds, allergies, and competing odors in the structure. Some people just cannot detect the smell of the odorant. It can fade or be absorbed by new steel piping or tanks, as well as the soil if a leak occurs underground.

The explosive force of a gas explosion is mainly dependent on the concentration of gas in the air. This concentration is called the stoichiometric concentration. The most violent of explosions usually occur when there is enough air for complete combustion. This is when the gas concentration is approximately twice its lower explosive limit. The stoichiometric concentration of natural gas is approximately 9.5%, while propane is about 4%.

Gas migration tests in Minnesota have been conducted over the past 12 years, simulating various propane and natural gas leaks. Propane gas from a leak in the basement of a structure began collecting at floor level and slowly built up at the upper portions of the room. The leak, which was in piping rather than on a burner, filled to the lower explosive limit in approximately ten minutes. A closed door severely impeded the gas migration throughout the rest of the house. Natural gas from a leak in the basement not only filled the basement but also migrated up the stairwell to other floors of the structure. The direction in which the leak pointed sometimes forced the gas to go in that direction more readily. Outside weather temperatures and wind also affected the buildup of gas, depending on how airtight the structure was. In most of our tests, the highest sensors on any one floor rarely reached the lower explosive limit.

A styrofoam mannequin was moved on a pulley through the basement of a house, (simulating a person walking through the room) noticeably stirring up the gas concentration with the

potential to push the gas to the upper levels of the room where there might be an ignition source.

As natural gas is lighter than air and rises, it was believed that a natural gas leak would blow out the walls at the ceiling. Conversely, as propane gas is heavier than air, it was believed that a propane gas leak would blow out the walls at floor level. Our tests revealed that most walls and doors blew out at their weakest point. In one scenario, one wall blew out at the top and the adjoining wall blew out at the bottom; one door blew out at the top and one blew out at the bottom. Some of the fires occurring after the explosion were not in the area of origin, but were away from the gas leak and ignition source at the opposite end of the house. It was learned that natural gas usually traveled upward from its leak, rarely migrating downward.

Tests were conducted using propane cylinders (20-pound or 9 kg) inside of a structure during a fire. The relief valves operated, causing the fire to extend out the valve 10 feet – 20 feet, greatly affecting fire patterns and potentially misleading investigators into falsely identifying a second point of origin. In most instances the tanks vented but did not BLEVE (Boiling Liquid Expanding Vapor Explosion), leading some of our investigators to conclude that due to the size of the tank it is less likely to occur with smaller tanks but not impossible.

Temperature and pressure was measured during some of the explosions. Temperatures reached approximately 1400° to 1700°F when using natural gas with a psi of approximately 5-1/2 to 6. At 6 psi there was major damage to the structure. In two propane gas explosions, the temperature reached approximately 2400°F for 1/10th of a second and a pressure of approximately 4-1/2 psi, also causing major damage to the structure. Despite suffering major damage, the potential gas leak and its ignition source would have been possible in some of the structures. The more violent explosions threw debris more than 100' and caused broken glass in neighboring structures as far away as 150 feet from the explosion site. There was considerable damage from negative air pressure. Often investigators do not consider negative pressure waves that can cause major damage.

There was very little fire damage in some of the more violent explosions because the gases were at their stoichiometric mixtures. Here the flame did not last long and very few combustibles ignited after the blast. When the gas mixture was "rich" there was more fire after the explosion as the gas continued to burn. There was minor, almost undetectable, scorching to wood members in smaller explosions with minimal singing to clothing.

The damage caused by a gas explosion will not be uniform. Some items may char or ignite, while others would suffer no damage whatsoever. It would be the equivalent to walking around your house with a propane torch holding it on every object in the house for ½ to 1 second. Some items would char, some items would ignite, others would suffer no damage. This would explain the appearance of multiple points of origin from a flame igniting different combustible materials within a structure.

Three floors of a home were filled with propane gas and halogen lights were turned on, using fans to stir up the gases. At the time of the explosion, the house was at approximately 4%. The explosion leveled the structure and left its wooden members resembling toothpicks. The pressure inside the basement reached approximately 18 psi. Neither the fans nor the halogens lights sparked the explosion and the exact leak or ignition would have been difficult

if not impossible to determine from the remaining debris. Because of the extensive damage, an investigator may assume that explosives were used due to the explosion's shattering effect and the extensive damage.

Blast patterns and the location of debris have been looked at in the past in an attempt to determine the cause of an explosion. Although this is useful and at times can prove accurate, our observations upon conducting various simulated gas explosions are that it would be difficult to discern with any degree of certainty where the gas was ignited and in which direction the flame front traveled.

Consideration should be given to the following when investigating a gas explosion:

- Most important, remember spoliation. You may want to inform all potential parties before conducting any tests.
- Look into conditions leading to the fire/explosion.
- What happened?
- Was anyone home and what were they doing?
- You should always try to interview victims as soon as possible due to the fact that many die later.
- Was there any gas or appliance work done lately?
- Were any gas valves turned on or off?
- Was someone trying to light an appliance?
- Was the gas service recently disconnected or reconnected?
- Were any appliances running? Did they have any problems?
- Did anyone smell gas?
- When was the last time the tank was filled?
- Was the tank out of gas at the time of the explosion?
- Did the gas company relight the pilots and check for leaks?
- What were the weather conditions? Was it raining? Snowing? Melting? Freezing temperatures? Flooding? All these can have a factor into gas leaks or regulators.
- Cylinders? Location of the cylinder and when was it last filled?
- When it comes to the scene examination, walk the entire scene 1-1/2 times the distance of the farthest item of fire debris found.
- Follow the entire gas system, including the sources of piping and appliances.

- Look at all gas valves and connections used and unused.
- Examine all appliances and note the position of the controls.
- Measure, sketch, and photograph all equipment and piping before moving or testing.
- Examine the gas system start at the gas meter or tank, then the regulators.
- Note the connections, valves, and piping.
- Document all manufacturer's, models, and serial numbers.
- Look for breaks, holes, tears, etc.
- Check the system for leaks before disturbing.
- Remember that all tests should be at normal room pressure or less. Any higher than normal working pressure can cause new leaks.
- Special propane considerations was this an out-of-service call?
- If the tank is empty, most gas companies are required to check the entire system for leaks before turning the gas back on to the building.
- This includes checking appliances, lines, and valves.
- The gas company is also to relight the pilot light for the homeowner.
- Just as in fires, remember that most leaks are caused by people, something they either did or didn't do. It is very important to conduct interviews.
- Often investigators spend more time looking for an ignition source than they do trying to find out why the gas leaked. More important is why there was a leak of gas inside the building?

Due to the fact that there are numerous ignition sources within most buildings, it is very difficult if not impossible to determine the exact source unless ignition was actually witnessed. Although gas explosions can be difficult and challenging, it is not impossible to figure out why the gas leaked and why it was ignited if a thorough investigation is conducted.

Although most gas explosions are usually from small amounts of gas, if inside a structure one can blow out doors and windows with as little as 3-4 ounces of propane if properly mixed and ignited quickly. This was the case with an aerosol can that fell off a shelf, was punctured, leaked, and ignited a gas dryer, blowing out 8 of 10 windows in a duplex structure. Although this is a rare occurrence, it is not impossible.

I want to thank all the people of Australia who I had the opportunity to meet for your hospitality. I had a great time and learned a lot from you folks also! If there is anything I can be of assistance or if you have any information to share or good photos, please don't hesitate to e-mail or call me. My e-mail is james.novak@ci.stpaul.mn.us or Novakinvestigations@frontiernet.net My mobile number is 612-750-9119.



LP Explosion. Note windows blowing out at top, and one door blowing from bottom and one from top.



Propane Explosion

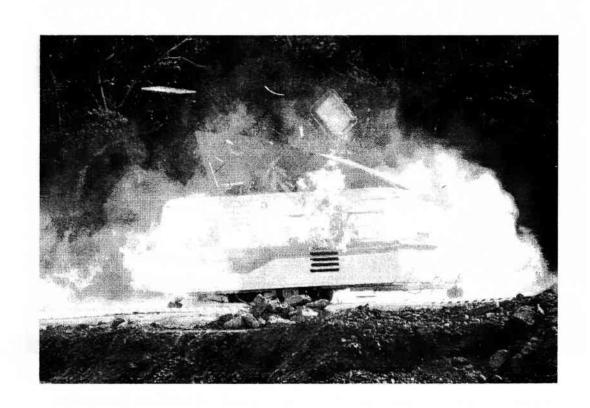


Propane explosion that could be thought to have been high explosives due to splintering

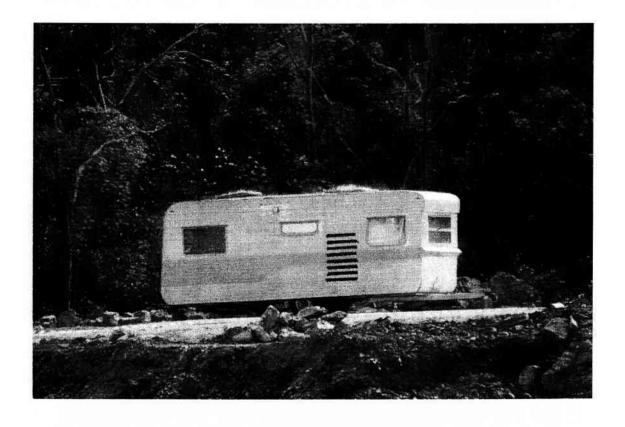


This explosion damage blew out 8 of 10 windows and was caused by a can of silicone lubricant falling to ground and sustaining a puncture and leaking and ignited by dryer.









Explosion series from Queensland Chapter Seminar of caravan filled with propane.

NSW ASSOCIATION OF FIRE INVESTIGATORS INC

(IAAI CHAPTER No.47)

Web: <u>www.nswafi.com.au</u> Email: secretary@nswafi.com.au

President's report

I welcome you all to another edition of "Firepoint".

Since last we spoke there has been a great deal of activity. We held our Annual General Meeting and elected some great new talent, and the committee have organised a successful Educational Conference that was held at the Rural Fire Service Headquarters at Homebush on Tuesday 8th August 2006.

The Conference theme of Gas **Explosions** and Unusual Burn patterns attracted an audience from all facets of the industry. Not only Fire Service and were Police represented but many from the private investigation industry from around Australia made the effort to attend.

Our U.S. speaker for the conference, Mr Jamie Novac, is an investigator with the St Paul Fire Department and has over 20 years experience as a state Fire Marshall.

Jamie was a very animated speaker who kept the crowd entertained for the entire day. He presented his findings from a comprehensive study he conducted on gas migration within structures. His findings have

debunked some of the many misconceptions that surrounded the investigation of gas and vapour explosions.

In the second part of the day Jamie spoke about and showed many examples of burn patterns that can easily be misinterpreted by the untrained eye. All who heard and saw his talk stated that they would never approach an investigation in the same way again.

Following the conference we held the Annual General Meeting for the NSW Chapter. Prior to the election of officers a motion was presented to the committee for the altering of a number of the clauses of the constitution.

Whilst most of the changes were purely cosmetic, two alterations require specific mention. Firstly the term for the President was increased by one year to a maximum of three (3) years. This was done as it was considered that the previous maximum of two years did not allow the incumbent to follow through with their initiatives.

The other change was to allow a maximum of 3 months of non-payment of the annual membership fee before the individual is removed

as an active member of the association. A full copy of the new constitution and the changes made is available on request to myself.

The results of the elections for the committee are as follows:

Position	Name
President	Paul Bailey
Senior VP	Roger Bucholtz
Junior VP	Sonia Casamento
Treasurer	Val Ansett
Secretary	Vacant
Committee	Steve Apps
Committee	Mark Black
Committee	Mark Cavanough
Committee	Jen Dainer
Committee	Kate Grimwood
Committee	BJ Jones
Committee	John Paull
Committee	Peter Rudens
ImmediatePastPr	Richard Woods
IAAI Liason	Ross Brogan
Firepoint Editor	Wal Stern

I would like to take this opportunity to welcome our new members of the committee. Mr Mark Black, Ms Kate Grimwood, and MrJohn Paull.

Mark and John are both members of the NSW Fire Brigades and bring a wealth of operational firefighting experience to the committee.

Kate is an accomplished academic who has completed some extremely interesting research into fire behaviour in modern dwellings and is currently undertaking PhD studies. We are very lucky to have individuals of such calibre who are prepared to give of their time to promote the science of Fire Investigation.

In closing I am very honoured with being elected as President for a third term. With the new committee I will endeavour to continue bring all members as many education opportunities in this fascinating science as I can.

Paul Bailey NSW AFI President

(Editor's Note: This year saw the retirement from the Committee of three long serving members;

- Trent Tosh, who has acted as Treasurer for a large number of years,
- Carl Cameron, who was in the Police Force prior to his retirement, and had a wealth of fire investigation experience, and
- Jim Munday, who brought U.K. knowledge, experience and contacts. They were three very well respected members, to whom we all owe a debt.

On the other hand, it is good to see new members, hopefully with new ideas and enthusiasm, joining the Committee. Welcome aboard).



Victorian Association of Fire Investigators Inc. (IAAI Chapter 58) Website www.vicfire.com

AGM 2006 IN BRIEF

The Annual General Meeting for the Victoria Chapter was held at the Earl of Lincoln Hotel corner of Church and Lincoln Streets Richmond on Friday 21st July 2006.

Bob Hetherington presented his President's report, thanking the current committee for their support and that of the Chapter Members

Rod East presented the Treasurer's Report showing that the Chapter is financial and that the success of the OH&S Seminar has increased our situation.

There is a considerable amount of merchandise on hand which has been selling well. John Lording presented a brief overview of the Merchandising Officers Report showing the current standing of the Chapter's merchandise and displayed the new grey polo shirt.

Membership officer Alex Conway reported membership had risen to 171 for 2005/2006 with membership in New Zealand (1), Western Australia (11) and Tasmania (1).

Currently 59 members are financial for 2006/2007. The current Membership subscription is \$40.00. It was also reported that over the last ten years the Chapter has had 257 members.

Elections for the committee were conducted with the following results:

Vice President Brian Neal CFA

Treasurer Rod East MFB

Committee

Karen Ireland FSC John Kelleher FSC Norm Jackson ESV George Cooney Vic Pol

Notice of Motion

Bob Hetherington presented a Notice of Motion to the meeting

regarding update of the Chapter Constitution. There were 23 Proposals to update the constitution in the areas of Name and Objectives, membership. subscriptions, Annual General Meeting, Meetings, Officer Bearers, Elections, Committee. **Funds** and recognition of current Application Form.

These proposals were put to the meeting and accepted.

The subject of Training sessions was discussed with the suggestions of live burns, photo workshop and wildfire investigations.

Bob Hetherington thanked the Hotel proprietor for the use of the Hotel. Minutes of the AGM will be available on request from

Following the AGM were two presentations:

the Secretary.

Session 1. CLANDESTINE LABORATORIES

The session on Clandestine Labs was presented by Acting Snr. Sgt. Stephen Abrehart, OIC Chemical Diversion Desk, Clandestine Lab. Unit, Major Drug Squad Victoria Police.

The session started with the description of the drug scene within Victoria and the two main drugs at risk being Ecstacy and GHB and the increase in both rural and urban labs. Noted that trained chemists are being involved.

The Clandestine Lab. Squad has three crews, who complete a safety course and are medically reviewed each 12 months. Safety is always the first consideration.

Subjects discussed included the danger of labs., manufacturing processes and chemicals involved.

For fire investigators the danger is that they can be involved. Signing of a lab. are: glassware. scientific drums/bags of chemicals. heating source, vacuum pumps, pill press, may be small or large operation and can be any where.

Dangers include: fire and explosion, toxic chemicals and vapours, re-ignition of process, presence of solvents, acids, alkaline, ether, caustic soda. Usually associated are arms and ammunition and possible bobby traps.

Note: SAFETY was emphasised for all personnel. Most of these labs are unstable and materials used are not marked or identified.

An important message was if you find yourself involved in this type of situation, DO NOT touch or move anything, GET OUT and STAY OUT. This incudes not turning on or off any power as this may be part of the process which when stopped may cause explosions.

Session 2.

ELECTRICAL ISSUES WITH CLANDESTINE LABS.

The session was presented by Darren Margerison from Energy Safe Victoria (ESV). This was a brief session on the electrical hazards to be aware of with Clandestine Labs.

Electrical issues for fire investigators were the safety of the scene where electrical wiring may have been modified or tampered with to assist in the manufacture of drugs this included by passes normal bypass connection), illegal connections and wiring.

Be aware that removal of electrical power to a clandestine lab may be hazardous.

ESV investigate scenes for method of connection, compliance with regulations, work performed, history of irregularities and other electrical related issues.

They produce brief reports on investigations. When calling ESV either Gas or Electrical need to identify the reason for the call and what is required of ESV. Note in Victoria this can be requested via radio support procedures.

Removal of supply should be undertaken by the local Power Supplier. In Victoria there are several suppliers: Citipower, PowerCo, SP Insnet, Agility and Alinta. Attached to the Victoria Chapter section is the new support arrangements for ESV

The Committee wishes to thank both the presenters for their efforts and presentations.

MEMBERSHIP

memberships have New and reviewed been Douglas approved from Rennie (ESV), Alan Rankin (CFA), Brian Davis (MFB), John Millar (CFA) and John Horton (RACV), Mark De Tubman, Silva. William Paul Aaron Rosscapes, three and Marshall members of the WA Police Arson Squad. Welcome to the Chapter.

As of July 1st Membership subscriptions were due at a cost of \$40.00. Any member not sure of their status can contact Membership Officer Alex Conway on 9420 3883.

CHAPTER MERCHANDISE

Any member needing any of the Chapter merchandise can contact John Lording though the Website and arrange purchase of any of the items for sale. There are white polo shirts at reduced price of \$20.00 and new items stubby holders \$5.00 and new design grey polo shirts for \$25.00.

NAME CHANGE - ARSON SQUAD

The Victoria Police have made a name change from the "ARSON SQUAD" to the "ARSON AND EXPLOSIVES SQUAD".

Also the Asron & Explosives Squad will be holding an ARSON FORUM on Tuesday 24th October 2006 at the Windsor Hotel Spring Street Melbourne.

Anyone interested needs to contact Andrew Kerr or Glenn Weaver on 9865 2687 or email phillip.mccabe@police.vic.gov.au.

RSVP by 1 September but may be extended.

WEBSITE

All members need to check Chapter Website as information regarding future training session and other information will be posted for your information.

www.vicfire.com

ENERGY SAFE VICTORIA ANNOUNCES NEW RESPONSE ARRANGEMENTS

Following the merger of the Office of Gas Safety and the Office of the Chief **Flectrical** Inspector into Energy Safe Victoria (ESV), a new Investigations & Prosecutions unit has been created. Changes involving requests for assistance at serious incidents have also been made.

Electricity-involved incidents

ESV provides a 24/7 response to Priority 1 emergency electrical incidents.

A Priority 1 incident includes:

- Fatality due to electrocution or associated with an electrical incident.
- Serious injury requiring attendance at hospital for treatment.
- Significant property damageover \$50,000
- Serious risk to public safety (includes homes, workplaces etc)
 - when ESV is specifically requested to attend; or

 reverse polarity of an electrical circuit.

Call 1800 000 922 for ESV response to an electricity incident.

An alternative number is 9203 9781 (if the 1800 number is not responding).

Gas-involved incidents

ESV also provides a 24/7 response for serious gasinvolved incidents. When an incident occurs that requires the attendance of an ESV Inspector Gas Investigator (as against an incident that should be dealt with by the gas company) National Response the Centre is to be contacted on 9411 3111. NRC will then the ESV Duty contact Inspector or Manager as appropriate.

Contact number

ESV When requesting assistance, a contact phone number should be provided. The situation can then be discussed with ESV's emergency response person to determine the need for immediate attendance or, if the situation does not warrant it, attendance at a later time as agreed between the parties.

If further information or clarification is required, please contact Peter Hester, Executive Manager, Investigations & Prosecutions, on 9203 8750.

The IAAI CFI Program

The CFI Program is an established procedure for identifying and recognizing a fire investigator's expertise. You do not have to belong to the IAAI to become certified.

Certification is based on:

- a) Attaining at least 150 points from your education, training, and experience
- b) Passing a comprehensive examination

CALCULATION OF POINTS

You must attain at least 150 points before you are allowed to challenge the test. A sample of the IAAI point allocation schedule follows:

Education:

10 points
12 points
12 points
20 points
20 points
30 points

Points are also allowed for advanced degrees.

Training:

20 points minimum to 90 points maximum:

Fire Investigation Training 1 pt. per 8 hrs. (not tested)

Fire Investigation Training 1/4 pt. per hr. (tested) Certified Fire Fighter I

10 points 15 points Certified Fire Fighter II 15 points Police Academy Certified

Experience:

You must have provided expert testimony a minimum of two times or completed the Bureau of Alcohol, Tobacco, and Firearms or IAAI testimony course. Been a full-time investigator for four (4) years or a part-time investigator for 8 years, with a minimum of 40 required points attainable as follows:

10 pts. per year Full-time Fire Investigator 5 pts. per year Part-time Fire Investigator

Additional experience points are issued for private investigators, patrolmen, supervisors, evidence technicians, lectures taught, articles published and membership affiliations.

The examination is comprehensive and evaluates the investigator's knowledge in respect of the following topics:

- Chemistry of fire
- Laboratory evaluation of fire scene evidence
- Criminal and Civil Law relations to fire investigation
- Investigation of fatal fires
- Investigation of automotive fires
- Investigation of explosions
- Scene documentation
- Motive of fire setters
- Insurance as it relates to fire investigators
- Interviewing
- Determining origin and cause including electrical and mechanical equipment
- Building construction

REPORT ON IAAI 2006 CONFERENCE

On the 30th April 2006, I attended the IAAI Training Conference in Denver Colorado, where representatives from agencies world wide attended to present. impart and learn about the most current methodologies utilised fire investigations an international from view point

Mγ main role in attending, was to present a part of the findings from a study conducted Sonia bv Casamento from Sydney's University of Technology, in conjunction with the New South Wales Fire Brigades.

The study utilised the Fire Investigation and Research Unit's Accelerant Detection Canine (Ellie) for "the Development and Validation of Accelerant Recovery Techniques at Fire Scenes". The study by Sonia, was conducted over three vears and incorporated Val Ansett and myself as Ellie's handlers.

The study which has been compiled, marked and published was ready to present to an international audience regarding what been found to be the best method for accelerant screening and recovery techniques available.

Mγ presentation highlighted the world's first study utilising an active reward canine. The presentation was met with interest as well as scepticism. I showcased to world, that canines are the most accurate and reliable tool for the method of screening for accelerants in fire scenes.

It also highlighted that the canine was the most expensive tool, however it can be utlised much more than on purpose/capability.

During the study it became apparent that the canine (Ellie) was alerting to accelerants Gas that the Chromatograph was reading. This not became а very interested and greatly debated point during my presentation.

This finding, highlighted during the course of the study, is not and does not imply that canines should be used instead of Scientific Confirmation.

It has highlighted that just because the laboratory result does not give us a positive result, it does not mean that there were no accelerants present at that time. This was an area that some members of my audience were very concerned about.

It has been suggested to me, by a number of people from varying industries, that the lab. GC/MS would always pick up the same low levels as the canine and if it not, then the canine was alerting on something else incorrect inside that scene.

This theory has been scientifically disproved from the study conducted by Sonia Casamento. She tested substances found that the GC was not reading (or not confident enough confirm a reading) when the canine had alerted.

Prior to my presentation a demonstration of Canine Capabilities was delivered by Agent Jerry Means and K-9 Erin from the Major Crimes Division of the Colorado Bureau of Investigation. This gave the audience a true indication of what canines can do along with a visual understanding of what I was about to present.

One of the main points of my presentation was proving that a tool that can be utilised for so many roles can be as

accurate if no more sensitive than that of scientific testing. This canine can reduce the time that investigators exposed to a are hazardous environment bγ moving through these scenes quickly, yet still being sensitive enough to select an exact area to take samples from.

Once again this was an area greatly discussed during my presentation. number of members of my audience did not believe that the canine could correctly and accurately distinguish between some ignitable liquids and some burnt furnishings.

They believed that if a negative result would come back from a lab. it meant that the canine had falsely alerted. This was again scientifically disproved during the study.

97% of the time, the canine did distinguish the difference and this has been documented, while the GC/MS did not.

Since my presentation I have organised with three Laboratories in the US to conduct similar studies. Whilst doing this they will use canine teams from their states and compare what they find.

This project will help validate canine teams in those iurisdictions and also validate this study. laboratories The have to perform this study free of charge, neither and the laboratories nor the handler will know what substance they searching testing for.

Hopefully this project will help agencies understand the role that the canine has and how it is not taking anyone's job. It is simply assisting others to achieve the best result practicable.

Mν presentation showed how active reward canines are used in Australia and the vast ways we are their putting capabilities to use. A number of people were keen to understand how to keep the motivation level up for these type of reward based dogs.

As I explained, the handlers own level of

motivation must be as high if not higher than that of the canine and when working together and vou know vour canine's abilitv. "trust dog" and burst into raptures once that canine alerts. The game must be the sole canine's motivation, no matter what time, what scene and environment.

My presentation has sparked some keen interest from other countries wishing to start canines in their services. Thev now actively looking at the prospect of utilising **Active** Reward Accelerant Canines Detection with some help from me in the formation of a structured training program.

Whilst in the US I attended the training centres with ATFE and FBI but I will explain that in the next issue.

Phil Etienne

Canine Handler
Fire Investigation and
Research Unit
NSW Fire Brigades

Phone: 9742 7395 Email: phillip.etienne7002@ fire.nsw.gov.au

ARSON FORUM 2006

The Windsor Hotel Tuesday 24TH October 2006

The Victoria Police Arson & Explosives Squad is proud to present the Arson Forum 2006. The focus of the forum will be *Arson Investigation "from their eyes".*

Arson Forum 2006 is a continuation of the squad's commitment to maintaining positive relationships with its investigative partners. The aim of the Forum is to foster a better understanding of other agencies (non investigative) and a victims perspective involved in a major fire / explosion incident.

Guest speakers have been invited to outline "from their eyes", the possible outcomes in response to a mass casualty fire / explosion incident, in Central Melbourne and how this impacts on any subsequent investigation.

The Arson Forum 2006 will be fully funded by the Victoria Police and there will be no cost to attending guests. The Forum will commence with registration at 12.45p.m and conclude at 5:00p.m with presentations to guest speakers.

Arson Forum 2006 Program

1445 Afternoon Tea

1500 3rd Speakers

12:45 Registration	*
13:00 Official Opening	Detective Superintendent John WHITMORE
1315 1 st Speaker	Inspector Graeme SPRAUGE London bombings experience
1400 2 nd Speaker	Donna CARSON Burns survivor

Master of Ceremonies: Detective Inspector George COONEY

Dianne DIXON
Western Hospital Emergency Management

Alfred Hospital Emergency Management

Louisa ROCK

Susan DAVIE
Royal Children's Hospital
Emergency Management

1600 4th Speaker

Allan MANNING Community impact, cost, Insurance Industry

1645 Conclusion

Detective Senior Sergeant Peter ENDLER

1700 Forum completed

EGISTRATION FORM ARSON FORUM 2006 Arson investigation – "from their eyes"

Name	
	Preferred Name for Badge
	Agency Details
-	Contact Phone Numbers
	E-Mail address
	Signature

For multiple attendees photocopy this section per person
And send to Arson Forum 2006,
Arson & Explosives Squad,
Level 13, 412 St Kilda Road, Melbourne 3004,
fax to 9865 2201, DX: 210094
or email
philip.mccabe@police.vic.gov.au

RSVP 1ST SEPTEMBER 2006