

# CA<sup>2</sup>RS

## California Association of Accident Reconstruction Specialists

No. 4

DECEMBER 1998

### NEWSLETTER



## LIVE CRASH TESTING!!!

Finally CA<sup>2</sup>RS will be providing training at a quarterly meeting which will include **LIVE CRASH TESTING!!!**

Also included in the training will be a demonstration of a SOKKIA TOTAL STATION. This training should be valuable and exciting for all members, because most everyone likes to be able to witness a live crash test and evaluate the vehicles immediately afterward. Rudy Degger & Associates, Inc. will then demonstrate with the SOKKIA TOTAL STATION how measurements are taken and then downloaded into a computer to generate a diagram. Rudy Degger & Associates, Inc. will be demonstrating the SOKKIA

TOTAL STATION with the help of Associate **ROBERT ALLEN.**

Members are encouraged to bring video cameras and/or 35mm cameras to the test. Please be sure to RSVP to reserve space for this special training!!!

#### RSVP

Duane Tannock - Palo Alto PD  
(650) 617-3192 Voice Mail

#### QUESTIONS

(650) 329-2687 Traffic  
(650) 329-2413 Dispatch  
(925) 284-7739 Alternate (Rudy Degger & Assoc.)

## A SPECIAL THANKS

Thank you to the following individuals who helped to make our POST-certified GRADE CROSSING COLLISION INVESTIGATION training at our last CA<sup>2</sup>RS meeting a success!

Lt. Carolyn Slezak - Amtrak Police Department  
Sam Torres - Union Pacific Railroad Police Department  
Mike Sicone - Amtrak Engineer  
Jamie Lynch - Amtrak Crossing Signal Controller

### NEXT MEETING

Hosted by: Palo Alto Police Department  
Presented by: CA<sup>2</sup>RS Board of Directors  
Phone: (650) 617-3192  
Location: Cubberly Site (former high school)  
Room # H1, north side facing shopping center  
4000 Middlefield Rd.  
Palo Alto, CA 94301  
Date: January 13, 1998  
Time: 8:30 A.M. - 4:30 P.M.

### DIRECTIONS TO CUBBERLY SITE

4000 Middlefield Road

101 (North or South) to San Antonio Rd.  
Go West.  
First light is Charleston Rd., take a right.  
Second light is Middlefield Rd., take a left.  
Cubberly site is just past the Charleston shopping center on the right.  
Parking is at next light.

### Note:

Members are encouraged to bring these items to the next meeting:

Video Camera  
35mm Camera  
Calculator  
Note Paper

New members in good standing may pick up their binders at the next quarterly meeting.

If you already have a binder, please bring it to the next meeting for new information.

### Schedule of Events

#### December 1998

		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

#### January 1999

					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

- 13 CA<sup>2</sup>RS Quarterly Meeting  
Palo Alto Police Department  
8:30 AM - 4:30 PM
- 18-22 Basic Accident Investigation Class by Los Medanos College in Concord. For information call 925-439-2185 ext. 242.
- 25-29 Intermediate Accident Investigation Class by Los Medanos College in Concord. For information call 925-439-2185 ext. 242.

#### February 1999

	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28						

- 1-12 Advanced Accident Investigation Class by Los Medanos College in Concord. For information call 925-439-2185 ext. 242.

#### March 1999

	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

- 1-12 Traffic Accident Reconstruction Class by Los Medanos College in Concord. For information call 925-439-2185 ext. 242.

#### Future Classes

May 3-7, 1999

IPTM Auto-Pedestrian Class at San Jose Police Department. For information call (904) 620-4786.

# Blurbs from the Board

## Board of Directors

### CHAIR

Kevin Cassidy - San Jose Police Department

### VICE CHAIR

Duane Tannock - Palo Alto Police Department

### DIRECTORS AT LARGE

Al Sutcliffe - San Jose Police Department

Jim Willette - Mountain View Police Department

Rudy Degger - Rudy Degger & Associates, Inc.

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I'd like to start off this edition of "Blurbs from the Board" by thanking the Amtrak and Union Pacific RR Police Departments for their assistance in our October training session. I later realized that at least one department had just had the same training class recently. I guess that, since you've now had the class twice, you're just waiting for that 18-wheeler vs. train collision to occur in your city. Good luck. (Of course, it will happen during the last hour of the shift.) I hope that all of the other attending members were able to take home some valuable information for handling the next train collision they come across.

For those of you who were unable to attend due to the location of the meeting, we've got some relief in sight. Although those of us at the San Jose PD have enjoyed our short commute to the past meetings, starting in January, CA<sup>2</sup>RS is going to be moving the meeting sites each quarter. To truly be a "California" association, we must begin trying to accommodate all of our members. The first move won't be far (Palo Alto), but the second meeting for 1999 will be in the Central Valley (likely in the Stockton area). We are anticipating a meeting in the Southern California area early in 2000. I thank our growing membership there for their patience.

Our January meeting will be a learning experience as it will be the first live vehicle crash test conducted by CA<sup>2</sup>RS. Hopefully the weather will cooperate but we do have some alternate plans in store if it turns nasty. Feel free to bring video or 35mm cameras to record the show and assist in the reconstruction.

As always, the Board welcomes any suggestions regarding future training topics or how to improve the organization. Happy holidays and I hope to see you all in Palo Alto in January!

Kevin Cassidy  
Chairperson

P.S. Be sure to tell your associates about membership in CA<sup>2</sup>RS. Remember that there's only a short time left to have a CA<sup>2</sup>RS membership qualify for your 1997 tax deductions!



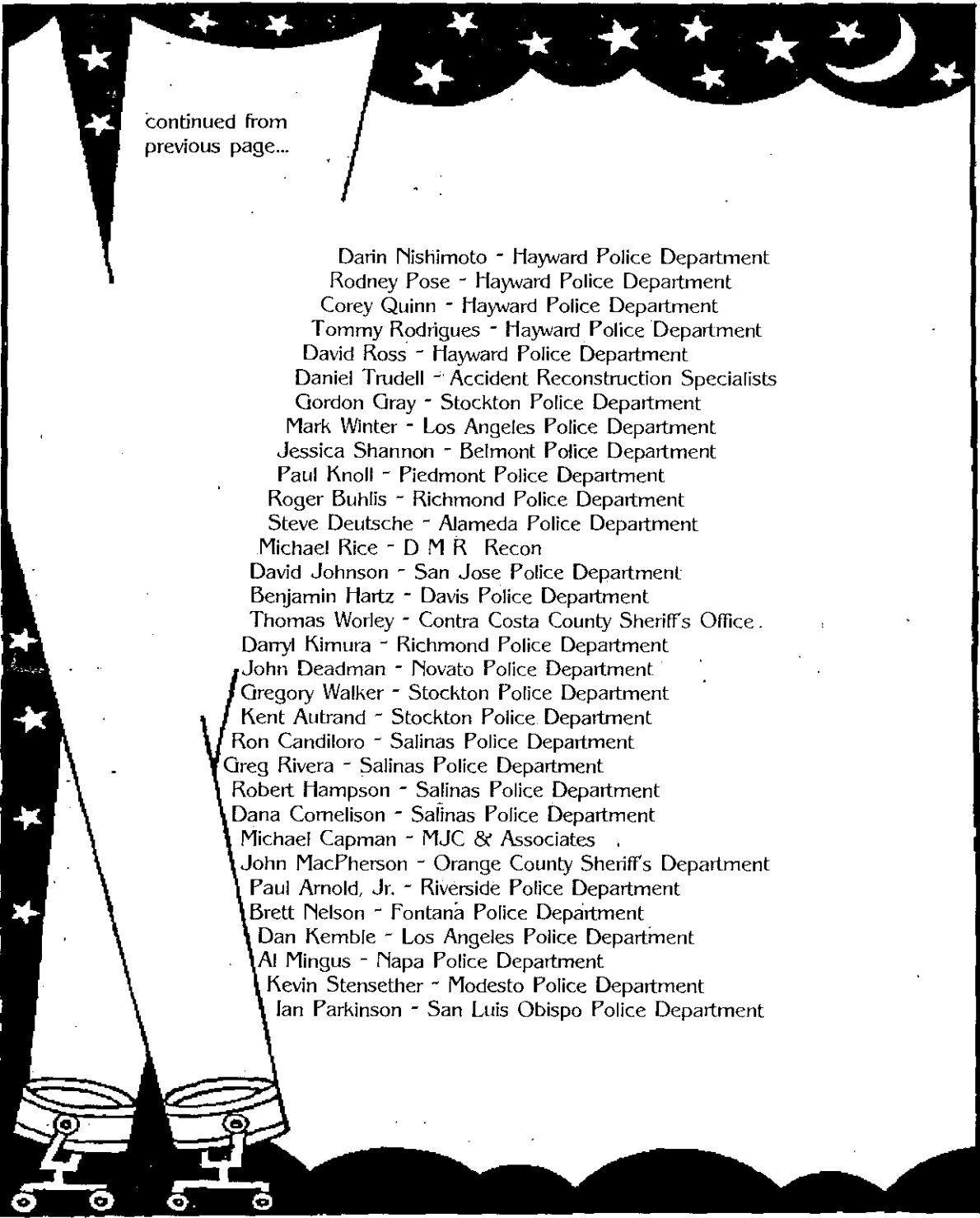
# NEW MEMBER SPOTLIGHT



Please welcome our newest members to CA<sup>2</sup>RS

Frank Iszak - Independent Reconstructionist  
David Gibeault - Fresno Police Department  
Ray Boutin - Yreka Police Department  
Todd Barrett - Sunnyvale Department of Public Safety  
Richard Bartlett - Walnut Creek Police Department  
J. Scott McCartney - Roseville Police Department  
Michael Allison - Roseville Police Department  
Richard Woodworth, Jr. - Daly City Police Department  
Eric Ahrens - Roseville Police Department  
Stephen Sprengelmeyer - Napa Sheriff's Department  
Darrel D. Graham - Concord Police Department  
Ray McEdward - California Highway Patrol  
Richard Rodriguez - Santa Clara Police Department  
Donald Kranz - Daly City Police Department  
L. Perry Birch, Jr. - Daly City Police Department  
Karen Haverkamp - Riverside Police Department  
Stephen Haverkamp - Riverside Police Department  
William Föcha - Sonoma County Sheriff's Office  
Rodney Krewson - Morgan Hill Police Department  
Scott Tenney - Vacaville Police Department  
Greg Stelzner - Vacaville Police Department  
Don Ibarra - South San Francisco Police Department  
Bud Crosthwait - Concord Police Department  
Craig Oelrich - Concord Police Department  
John J. Nunes - Concord Police Department  
Darrell Graham - Concord Police Department  
Scott Wagner - Concord Police Department  
Jon S. Rowan - Concord Police Department  
Mark Boettger - Menlo Park Police Department  
Maurice Bircher - AC Transit  
Peter Rast - Independent  
John Tompkins - San Jose Police Department  
Fred Bormann - Hayward Police Department  
James Denholm - Hayward Police Department  
Carlos Ferreyra - Hayward Police Department  
Roger Keener - Hayward Police Department  
Scott Koller - Hayward Police Department

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Darin Nishimoto - Hayward Police Department  
Rodney Pose - Hayward Police Department  
Corey Quinn - Hayward Police Department  
Tommy Rodrigues - Hayward Police Department  
David Ross - Hayward Police Department  
Daniel Trudell - Accident Reconstruction Specialists  
Gordon Gray - Stockton Police Department  
Mark Winter - Los Angeles Police Department  
Jessica Shannon - Belmont Police Department  
Paul Knoll - Piedmont Police Department  
Roger Buhlis - Richmond Police Department  
Steve Deutsche - Alameda Police Department  
Michael Rice - D M R Recon  
David Johnson - San Jose Police Department  
Benjamin Hartz - Davis Police Department  
Thomas Worley - Contra Costa County Sheriff's Office.  
Darryl Kimura - Richmond Police Department  
John Deadman - Novato Police Department  
Gregory Walker - Stockton Police Department  
Kent Autrand - Stockton Police Department  
Ron Candiloro - Salinas Police Department  
Greg Rivera - Salinas Police Department  
Robert Hampson - Salinas Police Department  
Dana Cornelison - Salinas Police Department  
Michael Capman - MJC & Associates  
John MacPherson - Orange County Sheriff's Department  
Paul Arnold, Jr. - Riverside Police Department  
Brett Nelson - Fontana Police Department  
Dan Kemble - Los Angeles Police Department  
Al Mingus - Napa Police Department  
Kevin Stensether - Modesto Police Department  
Ian Parkinson - San Luis Obispo Police Department

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## Note!

One of our very own CA<sup>2</sup>RS members, Sergeant Bud Crosthwait from the Concord Police Department is quoted in this article!

# Motorcyclists skirt helmet law with illegal 'beanies'

▪But police officers and safety experts argue that many of the novelty helmets are unsafe

Taken from the Contra Costa Times

Tuesday, September 22, 1998

By Renita Sandosham

TIMES STAFF WRITER

CONCORD - Chances are you've seen those bowl-shaped helmets on the head of many a motorcycle rider. Barely covering the top of the skull, the novelty helmet known as a "beanie" is popular because it's cool and comfortable.

Some beanies, also known as half-helmets, meet federal safety standards and are legal. But police and safety experts say many are not, and that the flimsy headgear does little to shield the wearer from the impact of a crash.

Just recently, two motorcyclists wearing illegal beanies died of head injuries in separate accidents in Concord.

### Legal obstacles

The pathologist who conducted the autopsies said both riders likely would have survived had they been wearing legal helmets, said Concord police Sgt. Bud Crosthwait.

One rider, who died soon after arriving at the hospital, suffered skull fractures and brain hemorrhaging. The other was in the hospital for a week before family members decided to take him off life support.

The beanie-style helmet gained popularity in 1992 after California's motorcycle helmet

law took effect. They are also sometimes called "German-style" helmets because some models look like the World War II-era military helmets.

Bikers protesting the helmet law took to wearing illegal beanies - which are cereal-bowl shaped and have insufficient padding - as a means to keep police off their backs.

But instead, the helmets drew the attention of officers, who began citing bikers for wearing them. The bikers fought back, taking their case to court and accusing police of violating their constitutional rights.

Much to the disappointment of law enforcement officials, the 9<sup>th</sup> U.S. Circuit Court of Appeals in San Francisco ruled in 1996 that officers cannot ticket bikers who wear unsafe helmets unless they can prove the riders know they are illegal.

That essentially means that before officers can issue a ticket, they have to have warned - and remember having warned - a beanie-wearing biker. They also have to be able to prove the illegal helmet is the same one the rider was wearing when first stopped.

"It's frustrating. You've got a law on the books you can't enforce, in essence," said Crosthwait, adding that he has not cited a biker for an illegal helmet in six years.

While helmets must meet Department of Transportation safety standards, most beanies are manufactured as "novelty helmets." Helmets built to DOT safety standards are identified by a sticker on the back, but phony stickers abound. There is still another, higher safety standard issued by the Snell Memorial Foundation, a nonprofit group that tests helmets, but that standard need not be met for a helmet to be legal.

Illegal beanies can be bought in specialty shops, through mail order catalogs and the Internet.

In an informal poll of eight motorcycle equipment shops around the East Bay, five said they carried beanies, though several stressed they only sell the DOT-certified models and one derided even the legal ones as "skid lids." Two shops said they don't carry beanies at all, and one said they are available by special order. A Web site hawking helmets devotes one section to novelty helmets, which range from \$55 to \$105.

Another Web site sells a variety of novelty helmets for \$34.95, including a kid's size. The site advertised its novelty helmets as made from the "highest quality aircraft resin with three coats of fiberglass matting."

A legal helmet typically has four components: the outer shell, an impact-absorbing liner, comfort padding and a chin strap.

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The shell and liner are designed to absorb the shock of an impact by spreading its force throughout the helmet.

A statewide survey of 2,000 motorcyclists conducted several years ago found that about 10 percent wore nonfederally approved helmets; the percentage increased on weekends. "We found a lot on places where people were riding for pleasure," said Corinne Peek-Asa at the Southern California Injury Research Center at UCLA.

Another research center study based on police and medical reports revealed that riders wearing non-approved helmets were 15 times more likely to suffer head injuries than those wearing approved helmets, Peek-Asa said.

"The bogus helmets are very likely to shatter," she said.

But people who wear them say they know the risks and are skeptical that an approved helmet will protect them in a serious crash.

Rick Luther, who owns R&M Enterprise, a motorcycle shop in Concord, says he wears his beanie occasionally.

Luther, who does not sell non-certified beanies in his shop for liability reasons, said legal helmets tend to tug and choke the wearer.

"It's not only a look issue. It's definitely a comfort thing. Driving on the highway at 65 mph with a visor, it's just like a sail," he said.

Six years after the helmet law took effect, the issue is as contentious as ever. Every year,

legislation has been introduced to repeal the helmet requirement for people 18 and over.

### Opposition to law

The latest attempt, by Assemblywoman Denise Moreno Ducheny, D-San Diego, stalled this year in the state Senate Transportation Committee after it did not appear to advance to the full Senate.

Luther says he supports a law forcing helmets only on young, inexperienced riders. "I've been riding long enough. It's my choice and I'm going to wear what I want to wear," he said.

But Crosthwait, who rides a Harley Davidson while off duty, says forgoing a helmet is foolhardy.

"I've done it in other states where it's not required. It's not safe. I've got a wife and kids who want me to come home in one piece," he said.

Staff writer John Boudreau contributed to this story.

**This "beanie" helmet is considered legal**      **This one is not**

DOT approved      Not DOT approved

**DOT standard for impact absorption**  
A helmet containing a headform must sufficiently dampen a 6-foot drop onto a steel anvil.

**What's the difference?**  
To be considered legal, motorcycle helmets worn on public streets must meet Department of Transportation criteria for protection. DOT approval runs on the honor system: Helmet manufacturers themselves decide whether their helmets meet criteria and whether they carry the DOT sticker.

**A more stringent standard**  
The Snell Memorial Foundation, a private not-for-profit organization, tests helmets for the following:

<b>Impact absorption</b>	<b>Penetration</b>	<b>Strap strength</b>	<b>Roll-off</b>	If a helmet meets Snell safety criteria, it also meets the DOT standard.
10-foot drop	Penetration	Strap strength	Roll-off	

For full-face helmets, the chin bars and face shields are also tested.

Sources: Department of Transportation, Snell Memorial Foundation      LEE McCORMACK, JON MANLOVE/STAFF

## Funnies From the Net



Confucius says:

“Man who run in front of car get tired”

“Man who run behind car get exhausted”

### *Just a reminder...*

If there is any information you would like changed, added, or deleted from your mailing address, please contact CA<sup>2</sup>RS Headquarters immediately.

If you would like information to appear in our newsletters you must submit your materials to Jennifer. For deadlines please call (925) 284-7739 or e-mail at CAARS@hotmail.com.

### Mark Your Calendar!

For future reference, we will be having quarterly meetings on April 21, 1999 and July 21, 1999. There is a possibility that we will be hosting our first two-day conference on October 22 & 23 of 1999, followed by an ACTAR exam on Sunday October 24, 1999.

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### CA<sup>2</sup>RS ADMINISTRATIVE CONTACTS

Jennifer Johnson or Nancy Degger

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Bus. (925) 284-7739

Fax (925) 283-8916

E-mail: CAARS@hotmail.com

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## ACTAR's history a testament to excellence in reconstruction

By William Brandt Michigan State Police, Member of ACTAR Governing Board of Directors

excerpts from N.A.T.A.R.I. Newsletter, Fourth Quarter - 1997

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There has been much discussion in the world of traffic crash reconstruction about the Accreditation Commission for Traffic Accident Reconstruction (ACTAR) since its creation in 1990.

That discussion has varied from positive to negative and everywhere in between. The purpose in writing this article is to inform accident investigators and reconstructionists that ACTAR is out there, to give you some history of the organization and to let you make up your own mind whether or not to pursue certification.

### HISTORY

In 1985, the National Highway Traffic Safety Administration (NHTSA) provided a grant to develop national guidelines for the standardization of training in the field of traffic accident reconstruction. A committee of accident reconstructionists, engineers, educators and attorneys met and offered a Minimum Training Criteria for Police Traffic Accident Reconstructionists. In their report, the Committee addressed the "ultimate certification of individuals" in the field and recommended that a "certification board be formed" to certify accident reconstructionists.

In 1986, the Illinois Local Governmental Law Enforcement Officers Training Board created a State Certified Accident Reconstruction Specialist program known as the "Illinois program." However this program was limited to participation only by active, sworn police officers.

In 1989 and 1990, the "Commission on Accreditation for Police Traffic Accident Reconstructionists (CAPTAR) was formed in the interests of creating a certification or accreditation

program. CAPTAR delegates decided that "any accreditation program created would be extended to those in the private sector as well as police officers; the Accreditation Commission for Traffic Accident Reconstruction (ACTAR) would be inclusive rather than exclusive.

As stated in the Commission's Bylaws, the purpose of ACTAR is:

"...the organization and implementation of a comprehensive program of accreditation and certification of individuals, accident investigation and reconstruction curricula and related programs leading to degrees and/or certification in the field and to assist individuals and academic institutions in planning their education programs.

...The purpose of accreditation of individuals and educational programs is to identify and recognize those individuals or programs worthy of recognition as such..."

### THE EXAMINATION

The examination is an eight-hour, two-part comprehensive examination covering numerous areas of traffic crash investigation. The morning session is in regards to general theory, and the afternoon session is the product portion of the examination.

ACTAR accreditation is valid for five years from the date of certification. During that five-year period, the accredited individual must attain 80 Continuing Education Units (CEUs) to show that he/she is keeping current in the field of traffic crash reconstruction.

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### WHY ACTAR?

Arguments I have heard against participating in the accreditation process is the statement "Why, do I need ACTAR? It's the judge who decides whether I can testify..." This is true; it is the judge that allows testimony. However, what is important is how that judge or jury interprets that testimony and how much creditability they decide to give it.

Will a judge or jury give more creditability to an individual who has put forth the effort to pursue the only national certification process that certifies he/she meets a minimum training criteria? Will the judge or jury give more creditability to that

individual who has gone that extra step to enhance his/her professionalism?

This certification process is similar to that of the engineering, medical and legal professions.

Active police officers make up approximately 51% of ACTAR participants, past police officers approximately 22%, engineers comprise approximately 16% while other backgrounds make up approximately 11%. Currently, there are 523 certified traffic crash reconstructionists.

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*For more information, Rudy Degger & Associates, Inc. has a link to the ACTAR web site. Please see <http://www.RudyDegger.com>*

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### **Highlights of Minutes from Quarterly Meeting on July 22, 1998, FMC Training Center, San Jose.**

21 Members, 29 Guests signed in.  
Meeting commenced at 8:40 a.m.

Kevin Cassidy and Rudy Degger began meeting by outlining the schedule and requirements for the day. Next meeting date and time was established for Oct. 21, 1998 from 8:30 to possibly 5:00 p.m.

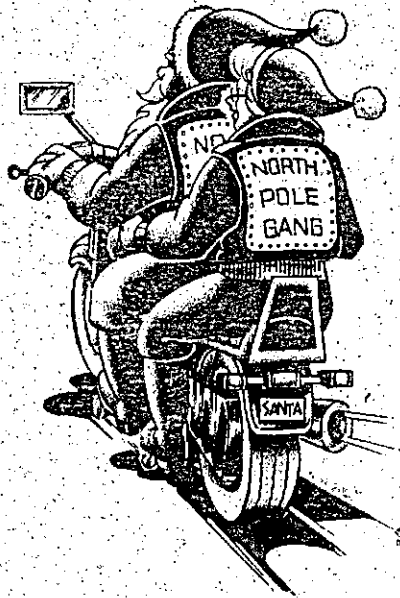
Jennifer Johnson reviews general and membership information for members. Rudy Degger distributes handouts with formulas to calculate drag factors, speeds from slide, and gives examples.

In the field at the training facility, 3 drop tests and 3 skid tests were performed. Tests were conducted by the Board of Directors, aided by members. Measurements and observations were made by members.

Skid & Drop tests required a longer time than had been anticipated, therefore no time was allowed for formal review or calculations in the classroom.

# Season's Greetings





*CA<sup>2</sup>RS Headquarters*  
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