MARTIN MARIETTA

# 

DENVER AEROSPACE

### **NUMBER 11/1983**



### Peacekeeper is a go; small-missile team in place

Recent Congressional approval of President Reagan's Peacekeeper basing plan means continuation of Denver Aerospace work on the intercontinental ballistic missile (ICBM) and a new business opportunity in the small ICBM program.

"Our role in carrying out the President's program will involve a continuation of our ongoing onsite assembly, test, and systems support activities or deployment planning, transportation, stage handling, and logistics for Peacekeeper deployment. Also, it will include the Vandenberg [Air Force Base] test program and a shift in emphasis from the closely spaced basing concept to the placement of Peacekeeper in Minuteman silos," said Norman R. Augustine, Denver Aerospace president.

"We've also initiated an aggressive effort to win the small-missile contract in response to the RFP [request for proposal] due this fall. A strong team of Denver and Orlando personnel has already been assembled and is laying the groundwork leading to the preparation of a winning proposal," Augustine added.

The House of Representatives May 24 voted overwhelmingly, 239-186, to base 100 of the 10-warhead missiles in existing Minuteman silos in Wyoming and Nebraska. The new missiles will be under the control of Warren Air Force Base. The

Senate followed suit May 25 with a 59-39 vote in favor of Reagan's plan.

The House-Senate resolutions free some \$625 million in the current defense budget for designing a basing system and for flight testing the Peacekeeper. Funds had been frozen since December, when Congress balked at Reagan's now-discarded "dense-pack" basing plan.

The President's plan became acceptable to many lawmakers when he accepted the findings of a blue-ribbon commission that coupled the Peacekeeper to new armscontrol measures and the development of a small, single-warhead missile.

Last week's Congressional action, however, was only the first of two major hurdles facing Peacekeeper. Lawmakers also must vote on bills to authorize and appropriate \$4.8 billion for actual procurement of the weapons. That figure is a reduction from the administration's original request of \$6.2 billion.

The House is expected to take up that second phase of the question sometime next week. Senate action will follow.

"Naturally, we're all very pleased Congress has seen fit to support the President's plan up to this point. We trust that show of good faith will prevail during the coming sessions," Augustine said.

#### How they voted

House and Senate voting last week on President Reagan's Peace-keeper missile basing plan criss-crossed partisan lines. Voting breakdown by state-delegation Representatives within a 50-mile radius of major Denver Aerospace facilities and by each of those states' two senators:

Colorado: For—Representatives Kenneth Kramer and Dan Schaefer (both R). Against—Representatives Tim Wirth and Patricia Schroeder; Senator Gary Hart (all D). (GOP Senator William L. Armstrong missed the vote.)

Florida: For—Senators Paula Hawkins (R) and Lawton Chiles (D); Representative Bill Nelson (D). Against—None within the 50-mile radius.

California: For—Senator Pete Wilson (R) and Representative Bob Lagomarsino (R). Against—Senator Alan Cranston (D).

Louisiana: For—Senators Russel B. Long and J. Benneth Johnston (both D); Representatives Robert L. Livingston (R), Lindy Boggs, and Billy Tauzin (both D). Against—None within the 50-mile radius.

## Employees are recognized for top performance

Eight employees were singled out for special recognition, and nearly 250 others were cited for outstanding contributions during the 1983 Annual Awards Night banquet May 21.

The banquet was held in the Colorado Ballroom of the City Center Marriott Hotel.

Receiving special recognition were Stephen G. Alexander, Roy J. Heyman, Durwin A. Schmitt, John V. Coyner, Jr., William H. Tobey, Allan L. Brook, Harry A. Nesteruk, and Terrill L. Roberts.

Alexander, Heyman, and Schmitt were named authors of the year for their paper

#### On the cover

Special-recognition winners at the 1983 Annual Awards Night banquet May 21 are, seated from left, Harry A. Nesteruk, Roy J. Heyman, and John V. Coyner, Jr.; standing, from left, are Durwin A. Schmitt, William H. Tobey, Terrill L. Roberts, and Denver Aerospace President Norman R. Augustine, who presented the awards.

on "Base Heating on a VOIR Aerobraking Configuration in Rarefied Flow." Alexander is an engineer. Heyman and Schmitt are senior staff engineers in the thermophysics department.

Coyner received dual recognition. He was named coinventor of the year with Tobey for work on the lattice mast truss. He also shared principal-investigator-of-the-year honors with Brook for large space systems design analysis. Coyner is manager of large deployable systems in the engineering mechanics department. Tobey is a senior staff engineer in the systems engineering department, and Brook is a senior staff engineer in systems requirements and design.

Nesteruk, Vandenberg manager of program contracts for the space transportation system program, was cited for 'highly successful negotiations in restructuring the GSS [ground support systems] contract' that resulted in the long-range plan being exceeded. He received the operational performance award.

Roberts was named engineer of the year for "technical and management contributions to the first successful flight of Titan

34D." He is project manager for inertial upper stage (IUS) independent verification and validation, and acquisition support.

Others honored, and categories:

#### Publications:

Distinguished contributors: Stephen G. Alexander, Roy J. Heyman, and Durwin A. Schmitt; James A. Cervenka and Wendel J. Maegley; Benton C. Clark III; Sam M. Dominick and James R. Tegart; Remi C. Engels, Harry W. Harcrow, and Timothy G. Shanahan; John F. Haley, Jr.; Elvis D. Simon; and Phineas S. Woods.

Honorable mention: Robert M. Avijan and Richard L. Donovan; Benton C. Clark III; Ralph N. Eberhardt, Dale A. Fester, William A. Johns, and Jack S. Marino; Walter C. Espenlaub and James W. Kummer;

Lawrence M. Germann and John C. Tietz; Philip R. Horkin; Frank M. Kustas and Mohan S. Misra; Frederick E. Lukens; J. Michael Murphy; Lawrence W. Norquist; Owen L. Scott and Richard H. Sterrett; H. Michael Thomas; Philip C. Thompson; and Richard W. Tibbs.

#### Inventor:

Thomas E. Bailey, Lyle E. Bergquist, Ernest Berliner, Burt J. Bittner, Charles A. Brosemer,

Next page, please

# **Employees** honored

(From preceding page)

William C. Brown, Tibor Buna, Neil J. Butterfield, Eldon E. Constable, John V. Coyner, Jr., William C. Croucher, Frederick S. Felt,

Lawrence M. Germann, Dale J. Haberkorn, Patrick C. Hardee, Richard F. Hattz, Joseph B. Hunt, John B. Hurley, Lawrence W. Loechel, Frederick E. Lukens, Donald F. McCulley, Robert K. McMordie,

Joseph D. Miller, Mohan S. Misra, Alexander R. O'Connell, Billy D. Orr, Harold A. Papazian, Loman T. Park, Stephen M. Pompea, Wayne E. Simon, John C. Tietz, William H. Tobey, Merrill K. Umbreit, Charles W. White, and Gordon K. White.

#### New Technology:

Peter W. Abbott, Scot K. Anderson, Robert L. Berry, Benton C. Clark III, Jeff G. Cox, John V. Coyner, Jr., Lawrence M. Germann, Joy H. Kelley, William R. Llewellin, Fred E. Lukens, George Morosow, William T. Perreault, Jack R. Postuchow, Wayne E. Simon, H. Michael Thomas, John C. Tietz, and Richard A. Vigil.

#### Independent Research and Development:

Fred E. Bikle, Allan L. Brook, Stewart G. Chapin, Thomas W. Connolly, John V. Coyner, Jr., William G. Duke, Elwood S. Ewing, John H. Grueser, James R. Tegart, James W. Tyndall, and Raymond G. Ziehm.

#### Technical Achievement Awards:

Louis L. Aldridge, Ward B. Anthony, Norman L. Arbon, James R. Barros, Robert E. Bauman, Joseph T. Berger, Jr., Daryl D. Bielenberg, William B. Carson, Eva L. Demlow, A. Darrell Devers, Jon A. Dutton, Ben F. Elam, Gregory R. Enders, David E. Eirckson,

Louis S. Favata, Dale A. Fester, Gustav J. Freyer, Charles D. Garner, Jr., Edward W. Greiner, Herb Grotheer, Philip R. Horkin, Richard F. Hruda, Marvin L. Hughes II, Gerald R. Johnson, John H. Johnson, William J. Kacena III, Robert L. Knickerbocker,

Richard M. Laureta, James W. Lowrie, Roman J. Matherne, Jr., Jay L. McBride, Rex McCleary, Dwaine J. McKellips, Timothy J. Meehan, Richard W. Menapace, John E. Montague, David J. Nott, Frank X. Pfenneberger, William E. Pipes III,

Michael K. Saemisch, C. Russell Spath, Parker S. Stafford, Arthur J. Throckmorton, William M. Van Beek, Charles W. Williams, and Delbert W. Wilson.

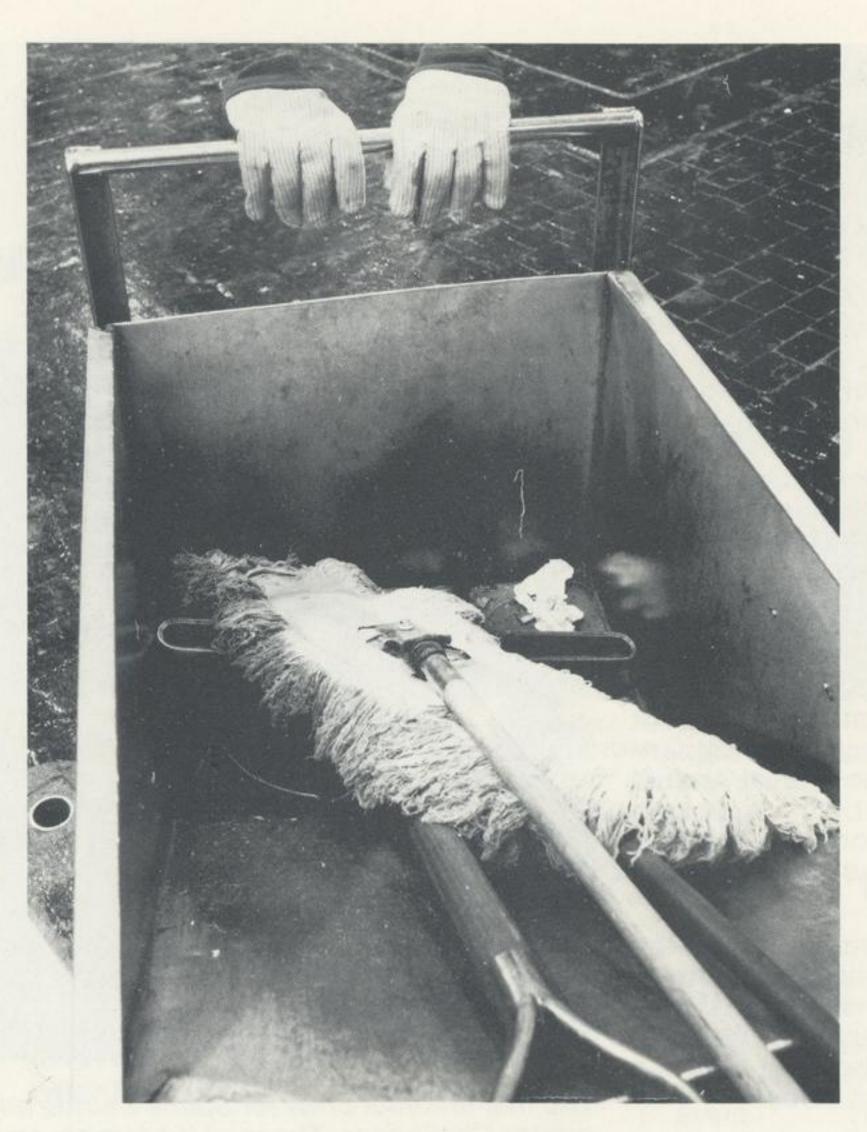
#### Operational Performance:

Reynold J. Abadie, Jr., Bernald N. Acker, James R. Albers, Allan V. Ardrey, Arthur L. Arndt, Paul H. Bacalis, James M. Beard, Santo B. Bertuzzi, Benjamin Nier, Richard P. Brier, Jr., Herbert E. Broughton, Floyd C. Brown,

Richard F. Cambell, Salvatore Caporale, Arnold C. Carvill, Richard E. Ciepela, John R. Cook, Thomas J. Corbin, Bobby J. Cornelius, James E. Cullen, Raymond Damaso, Bobby G. Davis, Frederick D. Day III, Wilfred L. DeRocher, Jr., William G. Duke,

John D. Eagen, Paul S. Fedec, Wendell E. Fields, John N. Froistad, Samuel W. Gentile, William L. Gibson, Owen H. Graff, Norman E. Greenwalt, James C. Grohowski, Kent H. Gunderson, Gary S. Hinds, Arthur E. Homewood, Thomas L. Hood, Richard B. Hooley, Jacob J. Huck,

William S. Jackson, Ramon A. Jaramillo, Richard G. Jones, Thomas W. Knapp, Tony C.



Gloves awaiting a warm body on the second-floor factory at the main plant last week caused many a double take amid the oft repeated: "Where's Tony?" At lunch perhaps, but even when not working, the owner shows he's ready to hit it on the run.

D. Knight, John F. Koshak, Max E. Lankston, Terry J. LaRose, Marvin H. Lillibridge, David E. Lloyd, Denese B. Lloyd, Saul R. Locke, Carter K. Lord,

Danny L. Mangum, William E. Massaker, Kevin L. McNeill, Mary I. Medina, Robert A. Meyer, Craig H. Morgensen, Charles D. Moore, George B. Mumma, Thomas H. Munro, James F. Nelson, Jr., Harry A. Nesteruk, Barbara Ory,

John E. Parker, Tommy J. Perry, Thomas J. Pharo, Jr., Lynn C. Pixley, Michael J. Povec, William P. Pratt, Robert J. Przekwas, F. Charles Radaz, Jr., Euan P. Reynolds, Terrell L. Roberts, Robert L. Robinson, Garland A. Roe,

John B. Sanderson, Arlin J. Schaap, Roger T. Schappell, Arlen W. Schlaht, Cecil A. Schumacher, Raymond F. Schwindt, Robert H. Snodgress, Lee F. Stewart, Georgia K. Stuffelbeam, George A. Tefft, Gene L. Thomas, Philip C. Thompson, Robert J. Thompson,

Marvin D. Vander Weg, John H. Vowells, Gregory H. Wagner, Charles E. Walter, Richard W. Webb, Jr., James W. Weddle, Maurice E. Wilber, Herbert A. Wildeman, Ronald R. Willoughby, Don L. Wrobel, Richard T. Yoshida, and Gerald A. Zionic.

#### Committees judging the awards were:

Publications: B. Melissa Arrajj, Charles R. Class, George W. Haynes, George Morosow, and Elvis D. Simon.

Inventors: Ronald A. Bena, Jack O. Bunting, James L. Burridge, Cleve F. Claxton, Phillip L. DeArment, Charles R. Gunnison, Grover W. Hall, Anella F. Knoke, Chester A. Pedersen, Josephine E. Salazar, and Parker S. Stafford.

New Technology: Robert B. Blizard, Anella F. Knoke, George Morosow, Ernest B. Ress, and Ward D. Rummel.

IR&D: Ronald A. Bena, James L. Burridge,

# Lunchtime video series cues positive thinking

A two-part video series, "The Sky's the Limit," on popular psychologist Dr. Wayne Dyer's philosophy of no-limit thinking will be shown June 8 and 9 from 11:40 a.m. to 12:15 p.m. in the engineering building presentation room.

Seating is on a first-come basis for the brownbag screening.

The program is scheduled at Greenwood Commons, building 6100, Room C from 11:10 to 11:45 a.m. June 13 and 14 and at GPL, skills training 180, Classroom A from 11:10 to 11:45 a.m. June 28 and 29.

The program will be repeated at the engineering building June 22 and 23 if response warrants a repeat showing.

For information, call Dorothea Gibson, educational services, Ext 5272.

Susan A. Dozier, Thomas C. Fenner, Dale A. Fester, William C. Green, Robert N. Hansen, George E. Heyliger, Stanley R. Hurst, Charles P. Morrow, Fredric S. Nyland, Sidney L. Russack, Leonard G. Taigman, and Joseph M. Toth, Jr.

Technical Achievement: Warren Beery, Paul R. Brown, Jack O. Bunting, James L. Burridge, J. Carroll Curlander, Richard R. Foll, Grover W. Hall, William E. Rogers, Alan E. Schaefle, Parker S. Stafford, and Hatch Wroton.

Operational Performance: Richard G. Adamson, R. E. Burnett, James L. Burridge, Charles E. Carnahan, William S. Curra, Edward F. Dash, and Robert G. Morra.

# Inventors to receive awards

Eleven employees have been honored by the Denver product development review board for their inventions.

Receiving cash awards are:

Dr. Stephen J. Pike and Dr. William A. Fraser, electronics: heated wire liquid level sensor;

Melvin W. Frohardt, solar energy systems; Dr. Patrick C. Hardee, electronics; and Keith H. Hartz, test: aerodynamic reduction of torques due to wind loads;

Richard A. Spencer and Wendell H. Chun, electronics: dexterous, compliant manipulator end effector;

Dr. Howard Y. Jong and John R. Victorine, electronics: computer-aided phased array feed design for a parabolic reflector antenna with application to multiple beams;

Boris Popovich and William R. Adams, electronics: computer-aided aberration correction feed array design for a spherical reflector antenna with application to scanning beams.

# Working Woman magazine features recreation program

Coed intramural and competitive team programs here earned high praise in the May issue of Working Woman magazine.

"Martin Marietta women don't have to worry about being stuck on the sidelines while male employees have all the fun...." the article reported. "Some 1000 women—employees and spouses—are involved in Martin Marietta's sports program."

Cited among the benefits from sports participation are release of tension, pressure, and fatigue; improved morale; and reduced turnover and absenteeism.

An employee attrition rate of less than one-half the industry average at Denver Aerospace is credited, at least in part, to employee enthusiasm for the sports and recreation program here.

### Martin Marietta completes sale of 4 cement plants

Martin Marietta Corporation has completed the previously announced sale of four cement plants to a subsidiary of Blue Circle Industries, PLC of the United Kingdom, and a partnership controlled by a subsidiary of Cementia Holding, A. G. of Zurich for approximately \$170 million in cash.

In addition, the sales relieve Martin Marietta of approximately \$22 million of debt associated with those facilities.

The purchase includes plants, property, equipment, inventories, and accounts receivable at Tulsa, OK; Davenport, IA; Calera, AL; and Atlanta, GA. The Blue Circle Industries subsidiary purchased the Tulsa, Calera, and Atlanta facilities, and the partnership purchased the Davenport plant.



Inventors Stephen J. Pike, left, and Dr. William A. Fraser view their "heated wire liquid level sensor" currently being evaluated by a major automobile manufacturer for possible application as a direct oil-level monitor/indicator.

#### Recreation

Rafting—The Rocky Mountain Alpine Club sponsors a white-water raft trip through Brown's Canyon June 19. For information, call Brian Gallagher, Ext 7281, or Joe Mensch, Ext 6423.

Baseball—Tickets for the Denver Bears-Wichita Arrows baseball game and fireworks display July 2 may be ordered from recreation through June 17. Tickets cost \$4.50 and include seating in the upper level between first base and home plate.

Hunting—Skyline Hunting and Fishing Club begins a new three-week session of its hunter education course June 7. Mike Rue is instructor. Classes are held from 7:00 to 9:30 p.m. in the DSC presentation room. Cost is \$5.00. For information, call Richard Benson, Ext 4528.



Richard E. Benson, maintenance, and his wife, Barbara, are newly certified hunter education master instructors. Together, the Bensons teach hunter education for Denver Aerospace employees and family members.

# Frontiers of Science scholarships awarded

A student from Littleton High School and another from John F. Kennedy High School will be attending the 1983 Frontiers of Science Institute under Denver Aerospace all-expense scholarships.

Mark D. Ebel, son of Mr. and Mrs. David M. Ebel of Littleton, has major interests in chemistry, biology, and mathematics. He wants a career in biochemistry, medicine, or engineering.

Anne Marie Kowalski has excelled in mathematics and science at John F. Kennedy High School, and expects to pursue a career in medicine or research. She is the daughter of Mr. and Mrs. Eugene A. Kowalski of Denver.

The Frontiers of Science Institute is held each summer at the University of Northern Colorado. During the eight-week program, high school juniors take part in intensive study programs in physical science, biological science, energy science, and computer science. They have an opportunity to use laboratory equipment not usually available to high schools. They also study various examples of the application of scientific methods and concepts in research, development, and production.

# Husband-wife team teaches hunter safety

Richard E. Benson, maintenance, and his wife, Barbara, are the newest master instructors in the Colorado Department of Natural Resources Division of Wildlife hunter education program.

The Bensons received certification as master instructors May 27 after completing five years of workshops, seminars, and a 40-hour home study course. Mrs. Benson is only the second woman to receive the certification.

The Bensons have taught 1700 hunter safety students during the past 18 years. The program has grown from a brief three-hour overview to 20 hours of teaching activities about outdoor survival, firearms safety and mechanics, wildlife identification and management, hunter ethics, and first aid.

"Our students have ranged from a sevenyear-old to a 77-year-old," said Benson.
"We are thrilled when mothers and children complete the course with their husbands and fathers." Deaf mutes, the learning disabled, and non-English speaking students all have learned hunting safety through the program.

"The company has supported us 100 percent. We have the best classroom in Colorado, and the Skyline Hunting and Fishing Club furnishes all the materials we need for an excellent program," said Benson, a 25-year employee.

"Our greatest satisfaction is reading the Division of Wildlife's annual accident report and seeing accident statistics go down."

For information on the hunter safety program, open to all employees and dependents, call Benson at Ext 6209 or 4528.

# Employee skills benefit local organizations

Seven area business, education, and charity advisory groups are benefiting from time and effort contributed by Denver Aerospace administrators.

Robert J. Polutchko, vice president and general manager of the Space and Electronic Systems division, has been named to the board of directors of the Littleton Town Hall Arts Center.

Robert G. Morra, vice president of Technical Operations, serves on the educational advisory council of the Colorado Association of Commerce and Industry.

Serving on private industry councils locally are William Curra, director of human resources; Carl G. Baily, chief, personnel staffing; and Joseph P. Marcus, director, mechanical and structural manufacturing. Curra is chairman of the Jefferson, Gilpin, and Summit Counties councils; Baily serves on the Arapahoe County council; and Marcus serves on the Denver council.

Irma Jean Guire, manager of protocol, was elected to the Bank of Lakewood board of directors.

Fitzroy Newsum, manager of civic liaison, is regional publicity subcommittee chairman and a trustee for the Mile High United Way.

# Training sessions set for new travel service; use to begin soon

Facilitators from Performance Travel, Inc will hold orientation meetings June 14 through 16 for secretaries, administrators, and others handling employee travel arrangements.

The Chicago-based travel agency begins providing employee business travel service in Denver June 27 and at the Michoud division and Vandenberg operations this fall.

Four one-hour sessions will be held at the main plant, and two sessions each at Greenwood, LSC, and DSC II. Department administrators will receive copies of the training schedule.

Performance Travel, Inc, a subsidiary of IVI Travel, Inc, will provide the lowest available air fares, car rentals, and hotel/motel reservations.

Other benefits include educational seminars, air-travel accident insurance, advance boarding passes for some airlines, 24-hour, seven day-a-week service, and management reports on travel.

For information on the travel training sessions, call Dorothea Gibson, educational services, Ext 5272.



Members of the Denver Aerospace Corporate Cup team prepare to defend their title as two-time winners. Amateur athletes from 23 Denver-area corporations will compete tomorrow to benefit the Colorado Special Olympics.

### Athletes to defend Corporate Games title

Company pride and community service are at stake as Denver Aerospace defends its two-year winning streak in the third annual Denver Corporate Games tomorrow, June 4.

Competition is expected to be stiff with 23 Denver-area corporations fielding more than 1,700 participants in competition to benefit the Colorado Special Olympics, a program for handicapped amateur athletes.

In 1981, \$1500 was collected for the Special Olympics. Last year, \$5,000 was earned.

Events include racquetball, volleyball, track, 10-kilometer races, 100-meter run, 800-meter coed relay, 1500-meter run, tennis, bowling, swimming, and golf.

Participants compete for Olympic-style first-, second-, and third-place individual medals. Cumulative team points determine the first-place company team, which receives the Corporate Cup to display for one year.

The Games are sponsored by the Denver Athletic Club and cohosted by Metropolitan State College.

### Times, Locations

Times, locales for 1983 Denver Corporate Games competitions:

rate damos competitions.			
Event	Time	Location	
5-km Run	7:30 a.m.	Washington Park	
10-km Run	8:00 a.m.	Washington Park	
Track	10:30 a.m.	Auraria Campus	
Tennis	8:00 a.m.	Auraria Campus	
Racquetball	9:00 a.m.	Denver Athletic Club	
Volleyball	8:00 a.m.	Denver Athletic Club and Auraria Gym	
Swimming	12:00 Noon	Auraria Pool	
Golf	9:45 a.m.	City Park Municipal Course	
-	A STATE OF THE STA	policy processing	

### Corporate triathelon team wins for second year

Bowling

Thirteen employees competed in the Washington Park Short-Course Triathelon May 22, with first-place wins posted in open and corporate team classes.

The event consists of a 15.5-mile bicycle race, a six-mile run, and an 800-meter swim.

Taking first place in the open class with a combined time of 1:18:14 were Keith M. Chatfield, cyclist, Steven M. Weinstein, runner, and Ronald E. Johns, swimmer.

As in 1982, Denver Aerospace won the corporate class. This year's winning team of Michael H. Manov, Jeffery J. Findle,

and John B. Miller posted a combined time of 1:22:19.

9:00 a.m.

Tri-City

Lanes,

Broomfield

Fifth place went to another employee team composed of Wilmer E. Atkinson, David J. Crain, and Robert J. Reilly. Their combined time was 1:26:07.

In the womens' team class, Cynthia J. Lehigh teamed with two nonemployees to finish eighth in 1:52:01.

Individual entrants, their places and times were: Terry Heggy, sixth in age group, 1:37:14; William Mumma, 13th in age group, 1:57:22; and Margaret P. Miller, 33rd in the womens' class with 2:15:56.

# Michoud employees are active in community

Many Michoud division employees are participating actively in community organizations.

For example, Cheryl Alexander, the senior employment specialist many met when applying for jobs, works with the Association of Personnel Professionals. The organization recently began a pilot program with the New Orleans school system to teach high school students how to prepare and dress appropriately for a job interview, and how to conduct themselves during the interview.

She also started and coordinates the Neighborhood Watch Program in her New Orleans East subdivision.

Chris Dreyfus is a facilitator and concept adviser in the mission success department. She is chairing the annual August career conference held by the American Council for Career Women. She has served two years on the organization's board of directors.

In addition, she volunteers time for the American Society for Training and Development, the New Orleans Organizational Development Network, and the Volunteer Information Agency. She also teaches aerobic dancing one night a week.

Saul Locke heads the gift and donations committee on the board of directors of Community Living Services. Part of the Volunteers of America national organization headquartered at New Orleans, the program aids disabled and handicapped people and helps communities during times of crisis. Locke is manager of productivity at Michoud.

Robert W. Smith, director for development, has been named a member of the Committee of "50." The New Orleans Chamber of Commerce committee encourages companies to locate in the river region.

Out in California, John Rowski earned the title Scouter of the Month for his work as scoutmaster, committee member, and chairman of the Boy Scouts of America in Orange County. He is chief of the electrical materiel section on the West Coast. He was active in scouting when at Michoud seven years ago and started the first scout troop in Slidell.

### MARTIN MARIETTA NEWS Published by Public Relations MARTIN MARIETTA AEROSPACE

Call Ext. 5364 with information or suggestions for articles, or call one of the following coordinators. Kenneth E. Sedlmayr 6872 Technical Operations: Production Operations: Steven L. Cohen 3369 **Business Development:** Leonard G. Taigman 4466 Space/Electronics Systems Division: J. H. Guilfoyle 6944 Strategic Systems Division: John H. Pond 9165 Space Launch Systems Division: Michael T. Cole 1700 Business Management Daphne R. Gillison 3155 Michoud Division: Evan D. McCollum 3788 Canaveral Operations: Donald T. Beck 9108 External Tank Operations (KSC): Melodie deGuibert 3160 Vandenberg Operations: William Leary 2202

P.O. Box 179—Denver, CO 80201

June 3, 1983



The five-member crew for Space Shuttle mission seven poses in front of a photo of the orbiter Challenger. Those of the largest crew to fly shuttle are, bottom row, left to right, Sally K. Ride, mission specialist; Robert L. Crippen, crew commander; Frederick H. Hauck, pilot; top row, left to right, John Fabian, mission specialist; and Dr. Norman E. Thagard, physician and mission specialist.

### Employee photographers win national awards

Six employee amateur photographers and one employee's wife have won honors in the 1983 photo competition of the National Services and Recreation Association (NESRA).

Wallace "Ben" Pitt, manufacturing, won second place in the slides division and first place in the human interest slides class for "Thomas Flyer." Thomas Lisec, mechanics, took third place in the same class for "Daydreaming."

Peter Chase, test operations, took second place in the color prints open class with "A Place Called San Simeon," and third place in the scenic black-and-white prints class with "The Way Home."

Kenneth Beaudrie, propulsion engineering, took second place in the black-and-white prints, open class, with "Spanish Ladder," and third place in the color prints, open class, with "Sisters."

Larry Root, logistics, won second-place honors in the human interest black-and-white prints class with "Ford."

Karen Lehnen, wife of Douglas Lehnen, test operations, took second place in the open slides class with "Strawberries."

More than 264 employees and family members from 37 NESRA member organizations submitted 550 entries in the annual competition.

### University professor gets hands-on experience

A professor at California Polytechnic State University has joined the ground support system engineering staff at Vandenberg to acquire industry experience.

Fred Friedman, assistant professor of mechanical engineering technology, will work in computer-aided design for six months before returning to the classroom with a better understanding of practical applications in engineering theory.

The engineering technology curriculum at Cal Poly stresses "hands-on" experience and practical application of theory. All faculty members are required to have

current industry experience.

Richard Ristine, Vandenberg operations college relations representative, organized the program.

"It is important for us to demonstrate our ability to work in partnership with academe to upgrade the technical expertise of engineering faculty during a time when industry as a whole is being criticized for luring engineering faculty away from higher education, "Ristine said.

Friedman joined the Cal Poly faculty during 1975 after seven years in private industry.