April 1991
Volume 21, Number 3

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FAA World

When Air Traffic Is Slowed, 'Flow Control' Plays Vital Role

By Don Phillips

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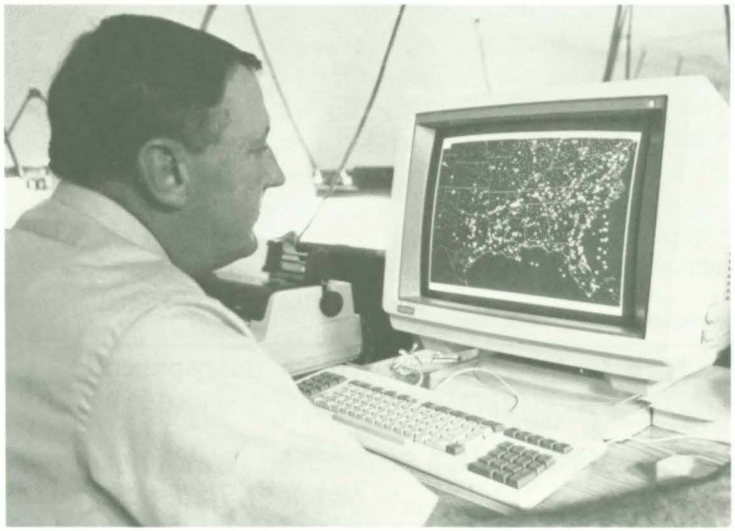
Don Phillips is a Washington Post *staff writer. This article is reprinted from the Monday, January 7, 1991, "Federal Page" of that newspaper.*

One of the more dreaded announcements for boarding airline passengers goes something like this: "Sorry folks, but we have an air traffic delay. We'll be held on the ground here for about an hour." Some pilots will elaborate and explain why. But usually that's all the explanation the passenger gets. "Air traffic delay" becomes the villain of the day, especially when the weather outside the aircraft is clear.

Behind the phrase, however, is a large cluttered room on the sixth floor of Federal Aviation Administration Headquarters here where a dozen professionals—two supervisors, two meteorologists, a computer systems analyst, and eight specialists—make decisions every day that affect the travel plans of millions of people.

This is the office the FAA formed to control the flow of aircraft throughout the country when weather or other factors interrupt air traffic in any area of the country. It is now called the Air Traffic Control System Command Center, although

turn to **Command Center** *on page 6*



Ted Young monitors air traffic flow in the Air Traffic Control System Command Center.

Following the Trail of Loran C

By Roger Myers

Roger Myers is the Southwest Region public affairs officer.

Dawn in a north Texas winter sky can sometimes be a spectacular panorama of dancing rainbow hues, playing tag between breaks in the scattered high clouds as the night withdraws and the new day shouts its presence, demanding full attention. Thus we were greeted by the cool morning, and we accepted the early beauty as a good beginning for the thousand-mile journey ahead of us.

Our itinerary called for an early morning departure from Fort Worth's Meacham Field, then a direct course to El Paso, continuing westbound to Santa Teresa and Las Cruces, New Mexico, and a return to El Paso before flying back to Fort Worth via Lubbock.

Pretty routine, you say. Perhaps; but mark this: On this day we point the nose of our King Air, N-17, westward, and we follow an imaginary line to an imaginary point somewhere out in the ozone over the Guadalupe Mountains.

Our navigation is to be state-of-the-art based. This day, we navigate directly from Fort Worth to El Paso, using Loran C. "El Paso 459 nautical miles, on a heading of 259 degrees," announced our Loran receiver as we climbed to sixteen thousand through thickening clouds.

Pilots George Woolsey and Tom Katri settled in to managing their

turn to **Loran C** *on page 7*

'Planting a Seed of Inspiration'

28 FAAers Honored with Administrator's Equal Employment Opportunity Awards

Turning the spotlight on FAAers from across the nation, Administrator James Busey lauded them for their Equal Employment Opportunity accomplishments.

He called them an inspiration to the entire agency.

Busey handed out "FAA Administrator's Awards for Excellence in Equal Employment Opportunity" laurels at a 14th annual ceremony at FAA Headquarters on February 25.

The 28 recipients were culled by a special selection panel from 75 nominations—the largest number of nominees in the history of the honor.

Busey told recipients and a packed auditorium, "Each of you should take pride in what you have accomplished. The FAA family is certainly proud of you, and I know your families and friends are, too."

> ***'Diversity has helped make America great, and I truly believe it also will help make the FAA—an already outstanding agency—an even better one.'***
>
> **James Busey**
> Administrator

Busey emphasized that by "turning the public spotlight" on the recipients' accomplishments, "we can plant a seed of inspiration for others.

"I know there are many FAAers in this auditorium, here in Headquarters and out there in regional offices and field facilities who strongly support the goals of the EEO program, but they may not know how to carry out their convictions and are looking for someone to lead the way for them."

By hearing about what the recipients have done, other FAAers "might be inspired to go out and do likewise," Busey said.

The FAA Administrator emphasized that he was deeply involved in the awards program.

"As the awards panel began its review of this year's nominations, I dropped in to let the members know what I expected of them," Busey told the audience.

"I gave them challenges, leeway and access to records. I also reviewed the nominations they sent me and gave them my personal stamp of approval."

Just before Busey presented the awards, he also zeroed in on several issues.

Here's more of what Busey said:

- ***Not Just Statistics.*** "What we tend to forget is that ultimately what we are dealing with are not programs or statistics, but people—friends, neighbors, colleagues, coworkers—people like all of us here in this room."
- ***Long Way To Go.*** The number of women in FAA stands at 22%, far below the civilian labor force figures of 43%.

Minorities make up 15% of the FAA population compared to an 18.4% minority representation in the civilian sector.

- ***Solid Progress.*** The FAA has made solid progress since his presentation of last year's EEO awards, Busey said.

There has been a half-percent gain for minorities and approximately a 1% increase for women.

"This may not sound like much," Busey said, "but compared to the record of the previous five to 10 years, it is pretty significant in my judgment."

- ***Not out in the Cold.*** Talking directly to those in the FAA who are not women and minorities and who may feel they are being left out in "all this talk of shifting demographics and special emphasis on women and minorities," Busey emphasized that the FAA's "whole effort is not about denying opportunities for anyone. It is about providing opportunities for those who historically have been denied them.

"It is about creating a level playing field, not about rigging the outcome of the game or giving one group an unfair advantage over the other."

- ***Discrimination.*** "Until we level the playing field, this is tantamount to accepting the status quo and endorsing de facto discrimination. That's not what you want, and that's not what I want," the FAA Administrator said.
- ***Job Standards.*** FAA's performance standards for equal employment opportunity are now unequivocal.

Managers and supervisors now know precisely what is expected of them, and they know too that equal employment opportunity is just as critical as the technical aspects of their jobs.

"As performance evaluation time rolls around, they are beginning to find out that they can no longer get by with lip service and vague wishes," Busey said.

- ***Togetherness.*** The FAA has fostered closer working relationships between Civil Rights offices and Human Resource Management offices in Headquarters and at the regional level, Busey said.

"The roles and responsibilities of each group have been clarified, and strategies for supporting FAA's affirmative action goals have been developed and are being put into action."

• ***Agency's Goal.*** "Let us keep in mind as we talk about statistics and percentages, our goal is not to satisfy bean counters across the street at DOT, or across town at the Office of Personnel Management," Busey said.

"I am not devoting my energies to this effort just to make the FAA look statistically tidy.

"Besides striving for basic fairness," Busey said, FAA's goal is to prepare the agency "to deal with the diversity in the work force projected for the year 2000.

"Then, minorities and women are projected to assume a substantially larger percentage of the work force."

• ***More Hispanics.*** "A striking example of this demographic shift already taking place is indicated in the 1990 census, which shows that the Hispanic population has grown by 40% during the past decade," Busey said.

That's the fastest growing minority group, but substantial increases are also forecast for other minority groups and women.

• ***Best and Brightest.*** "FAA will be competing for the best and the brightest among this population, and it will be too late to start trying to catch up in the year 2000," Busey said.

"It is our job, starting right now, to aggressively recruit, hire, and train minorities and women.

"That's simply a recognition of a fact and an intelligent response to an emerging reality. In fact, the continued preeminence of the United States and FAA in world aviation hinges on how well we do in this regard," he stressed. ■

Names and photos of the 28 winners of the Administrator's EEO Awards are on pages 4 and 5.

The FAA Chorale entertains the audience at the ceremony for the 14th Annual Administrator's Awards for Excellence in Equal Employment Opportunity.



People Helping People

Human Stories behind the Plaques

Wood and metal don't tell the whole story.

Behind the plaques and citations of recipients of the "FAA Administrator's Awards for Excellence in Equal Employment Opportunity" are stories of hard work and dedication.

"These are human stories of people helping people," Administrator James Busey said.

"And they are the kind of stories we will need in greater abundance if we are to reach the goal that I have established for this agency."

He highlighted the dedicated work of the 28 FAAers who were recognized with the annual award.

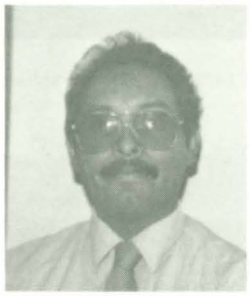
They included, Busey said, FAAers who:

• Spent evenings away from families to give tests or afternoons of free time at local colleges to recruit women and minorities for FAA careers.

• Could have begged off with an excuse that they were too busy to get involved with recruitment, but found time—often free time outside their normal working hours—to seek out sources for recruiting women and minorities.

• Made it their personal cause to seek out and hire the handicapped because they wanted to provide these disabled persons with a chance to support themselves and look forward to the future with hope.

• Created training agreements and career tracks for promising women and minorities on their staff when they could have gotten away with business as usual by filling those vacancies at the journeyman level. ■



Juan S. Amador
Employee Development Specialist
Western-Pacific Region



Arnold Aquilano
Associate Administrator for Airway Facilities
Washington Headquarters



Ronald Bagley
Air Traffic Control Specialist
Eastern Region



Louis J. Bona
Service Director
FAA Technical Center



Alfredia G. Brooks
Management Analyst
Washington Headquarters



Hannah L. Dixon
Computer Specialist
FAA Technical Center

Henry (Hank) A. Elias
Air Traffic Control Specialist
Alaskan Region





Lamon Grier, Jr.
Operations Program Manager
Washington Headquarters



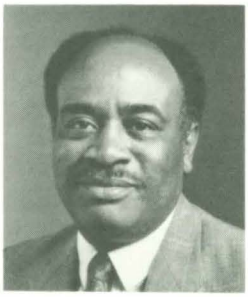
Hays V. Hettinger
Assistant Chief Counsel
Southwest Region



Frederick M. Isaac
Regional Administrator
Northwest Mountain Region

14th Annual FAA Administrator's Awards for Excellence in Equal Employment Opportunity

Awards articles on pages 2 and 3.



Luther McClellan
Advanced Automation Systems Branch Manager
FAA Technical Center



Herbert R. McLure
Associate Administrator for Human Resource Management
Washington Headquarters



Christine Maffei-Greco
Employee Development Specialist
FAA Technical Center



Douglas R. Murphy
FAA Academy Assistant Superintendent
Mike Monroney Aeronautical Center



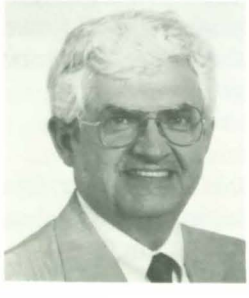
Ruth Del Rio Myers
Air Traffic Control Specialist
Great Lakes Region



Rhonda S. Peugh
Management Analyst
Mike Monroney Aeronautical Center

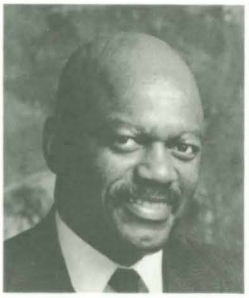


B. Keith Potts
Assistant Administrator for Aviation Safety
Washington Headquarters



Michael J. Powderly
Facility Operations Branch Manager
Southern Region

Willie Price
Air Traffic Control Specialist
Southwest Region



Fanny Rivera
Human Resource Management Division Manager
Washington Headquarters



Nancy B. Shelton
Air Traffic Control Specialist
Southwest Region





John B. Tompkins
Airway Facilities Sector Manager
Western-Pacific Region



Wanda K. Reyna
Policy Staffing Division Manager
Washington Headquarters

Gregory S. Walden
Former Chief Counsel
Washington Headquarters





Hubert L. Reynolds
Supply Systems Manager
Great Lakes Region



Leonard R. Wheeler
Aviation Safety Inspector
Northwest Mountain Region



Alice A. Wong
Engineering Specialties Division Manager
Washington Headquarters



Bennie (Ben) W. Ridgeway
Acquisition Division Manager
Mike Monroney Aeronautical Center

Command Center Paces Flow of Aircraft

continued from page 1

almost everyone still uses its original name, Flow Control.

The air traffic system is so near saturation today that delays in one part of the country have a ripple effect across the country. For instance, if Chicago O'Hare can accept fewer flights than normal because of bad weather, then planes taking off from hundreds of other airports will be delayed.

In past years, an aircraft might simply fly in a holding pattern until it could land. In the last decade, however, as fuel prices rose and the airways became crowded, the FAA decided it was safer and less costly to hold planes on the ground until they could be assured a landing time at the destination airport.

Flow Control does not "control" aircraft, but issues delay orders to air traffic control centers throughout the country. It also consults with airline officials and dispatchers. It essentially slows down the system across the country whenever air traffic controllers in one area cannot safely handle a normal amount of traffic.

A computer is programmed to handle each delay scenario. Once the delays are punched into the computer, aircraft across the country are assigned individual delay times, ranging from a few minutes to hours.

Most delays are weather-related, but there can be unusual delays, such as loose deer on runways. Runway construction and other similar factors also can result in slowdowns.

Here is an example of how the system works:

American Airlines Flight 1388 was one of the least likely candidates for a weather delay one day last September. Capt. Andy Bowe said he saw nothing but clear sky as his twin-jet MD-80 climbed east from Seattle bound for Chicago, so clear that he and copilot Bill Shelby could point out to the passengers almost every volcanic mountain in the Northwest, from Mount Baker to Mount St. Helens.

"We discussed the fact you could see forever, which is not typical of Seattle," Bowe said.

The flight was taking off late, however. Earlier that morning, it had been stuck on the ground for more than an hour because of weather. Not the beautiful Seattle weather, but thunderstorms that had struck Chicago before Bowe and Shelby even reached the Seattle airport.

'In the last decade ... the FAA decided it was safer and less costly to hold planes on the ground until they could be assured a landing time at the destination airport.'

In Washington, in the crowded room on the sixth floor of FAA Headquarters, traffic management coordinator Gerald L. Shakley pointed to a computer screen showing a list of flights headed for Chicago. Flight 1388 had been assigned a delay of 42 minutes at that point, which would lengthen later.

Before the crew had eaten breakfast, a meteorologist in the large secured Flow Control room had spotted a developing line of thunderstorms headed for Chicago.

O'Hare airport can normally handle about 90 planes an hour on three runways, but when the weather turns bad, only two runways can be used and that reduces operations to about 60 an hour.

Specialists, armed with the adverse weather information, fed the information into the computer, which contains every airliner scheduled to fly that day, plus every general aviation aircraft that has filed a flight plan. Within minutes, the computer spits out the bad news. One by one, airline crews around the country are told how long they will be delayed. Just a few minutes at first, then longer periods as delays pile up.

As Bowe waited at his hotel for an airline van, he received a call from his airline. Flow Control had already assigned him a 60-minute delay. By then, the thunderstorms were already moving out of Chicago, and by the time Flight 1388 reached O'Hare the sun was shining through a few broken clouds. But the ripple effect of those thunderstorms on the country's aviation system lasted all day.

Flow Control bases its decisions on the best weather forecasts available, but Shakley acknowledged that he sometimes relies on experienced guesses from local airport officials as much as weather forecasts.

"Past experience adds a lot to it," Shakley said.

Shakley said the worst time of the year is thunderstorm season, but the system can be tied in tangles at any time of the year. For instance, on December 28 there were snow delays in Boston, Detroit, Newark, New York, and Philadelphia; fog delays in Atlanta, Dallas-Fort Worth, Charlotte, St. Louis, Cincinnati, and Phoenix; low ceilings in Denver; and a disabled aircraft at Chicago O'Hare.

"That's about as bad as it gets," Shakley said. "It makes for a long day. Truthfully, those are the fun days. Time just seems like it's nothing."

As for the pilots, there is always the question of what to tell the passengers. "I usually try to make it detailed but somewhat light," Bowe said. "The weather is great here, but it isn't in Chicago. Ninety-nine percent of the time, the feedback from that is positive.

"You can't think that you put them in this big aluminum tube, you close the door, and you got 'em." ■

Experience with Loran C

continued from page 1

"office" for this flight, on which we would experience the closure of the so-called "midcontinent gap" in Loran C coverage.

As the Fort Worth skyline rapidly dropped below the King Air's left wing, we were reminded of how the vast territory of America's midcontinent has always been a challenge to cross. At various points in history, the Chisholm Trail, the golden spike, and the airway beacons helped lead the way.

The U.S. Post Office, with its establishment of a transcontinental airmail route in 1922, was the first to succeed in really closing the gap of mid-America and significantly shrink the travel time between the East and West Coasts.

By 1926, the time it took to transport the mail from New York to San Francisco was only 34 hours, 20 minutes; and, due to prevailing winds, the opposite direction time was reduced to 29 hours, 15 minutes. Not too shabby, considering aviation was only 23 years old, and the intrepid airmail pilots were flying World War I-vintage aircraft, and their method of navigation was mostly compass headings and following lighted airway beacons.

We had now broken clear of the leading edge of the frontal clouds and had climbed toward the Llano Estacado, headed in the direction of the Pecos River and the Guadalupe Mountains.

The famous Guadalupe Pass in the southern part of the Guadalupe Mountains was, very early, marked by a lighted beacon to guide aviators to the lowest crossing point of these formidible mountains. The lighted airway beacon had eventually given way to low-frequency range stations, and radio signals were used to mark airway routes across the continent.

As technology improved, both in navigation equipment and aircraft, the aviation industry was able to make the East Coast and West Coast



Photo by Roger Myers

The N-17 pictured at sunrise.

of America a one-day, round-trip journey.

Still the general aviation segment of the industry had a need for a low-cost reliable system of navigation, particularly at low altitudes and in offshore situations where other systems of navigation were not practical.

Enter Loran C, a part of FAA's commitment to modernize and upgrade the National Airspace System.

Loran C is a self-contained, earth-based navigation system consisting of widely separated, ground-based transmitter chains and airborne receivers. The powerful transmitter, a master and normally three secondary transmitters located many miles apart, form a chain identified by a four-digit number. The chains transmit time-dependent, low frequency signals, which airborne receivers use to determine the aircraft position by comparing the time differences between the master and its secondary signals.

In 1957 Loran C replaced the original Loran system developed during World War II. This system became very popular with all maritime users and was expanded by the U.S. Coast Guard to provide coverage in the Gulf of Mexico and West Coast in the 1970s.

In the early 1980s the microprocessor revolutionized Loran receiver technology, allowing miniaturization of airborne equipment. Widespread acceptance by the aviation community had now brought the price of Loran receivers in reach of all users.

As early as 1985, then FAA Administrator Donald Engen approved the implementation of Loran C into the NAS. In support of this mandate, FAA and the Coast Guard jointly put in motion plans to expand and modify the maritime-oriented system for aviation use.

A major part of this expansion centered upon closing the so-called "midcontinent gap" by commissioning additional Loran transmitter stations in the heartland of America. FAA provided land acquistion, and the Coast Guard commissioned four new Loran transmitters at Havre, Montana, Gillette, Wyoming, Boise City, Oklahoma, and Las Cruces, New Mexico.

With completion of the latest Loran chain, the "midcontinent gap" finally was closed. Point-to-point enroute navigation using Loran C now had become a reality, and we were about to make full use of it.

One hundred miles into the flight, pilot Tom Katri checked all the functions of our Loran equipment.

Sure enough, just as planned, we found our current location/position: location on the route (lateral distance from signal), distance from the station, ground speed, course, wind, track, crosstrack, and track offset. Two hours, forty minutes later we were splitting the middle of the runway at El Paso International Airport, another not too shabby flight time. Our curiosity to experience how the midcontinent gap had been closed was satisfied.

With the enroute system now in place, FAA will provide certification of Loran C approaches, the next step in the agency's continuing commitment to the aviation community.

Eastbound later in the day, the Texas weather turned fickle, and frontal clouds filled the sky with rain edged with ice. Our group was happy to know we had provided another trail in the system of transporation across America's midsection: the trail of Loran C. ■

Seeking Solutions

Agency Sponsors First Airway Science/Industry Roundtable

"At every turn, there's a dragon to be slain," Mike Kruger told a group representing the agency, industry, and academia gathered to provide feedback on the Airway Science (AWS) Program, started in 1982 to establish a path through education to train those seeking careers in aviation. Kruger, who manages FAA's Higher Education and Advanced Technology Staff (AHT-30) of which the AWS is a part, is looking for ways that the FAA can benefit from AWS.

Although the AWS Program now seems to have everything going for it—increased grants for this fiscal year totaling $10 million, with all but $300,000 of the funding being competitive; an important mission of providing trained personnel for the future safety of aviation; and a strong EEO focus with 23 percent of its grant awards going to minority institutions—things were not always that way.

Until last year, AWS was a demonstration project that was locked into a published program. With such rigorous parameters, it was impossible to make the desired impact in the aviation community, academia, and industry. There were also few available ways to incorporate "lessons learned" into fine-tuning AWS while the program functioned under the rigid structure of a demonstration project.

Today as a regular FAA program and "with the AWS demonstration project behind us," says Kruger, "it is time to broaden our sights, learn from our past experiences, and consider how AWS can more effectively address the human resource challenges of tomorrow for not only the Federal Aviation Administration, but the aviation industry as well."



At the first AWS roundtable were representatives from the FAA, industry, and academia including Isaac Nettey, Airway Science Program director, Texas Southern University, Houston; Walter Coleman, vice president operations, Air Transport Association; Bill LaLiberte, Education Committee chair, Air Traffic Control Association; and Lionel Driscoll, Project SAFE manager, FAA Flight Standards Service.



AHT-30 employees attending included, from the right, Margaret Powell, Virginia Krohn, and Mary Mesa.

The AWS Program has renewed momentum, according to presenters at the roundtable.

There are 44 FAA-recognized AWS institutions in 30 states, Margaret Powell, head of the AWS Curriculum Program, told the roundtable group. The five AWS curricula concentrations in order of popularity are airway science management, aircraft systems management, airway computer science, aviation maintenance management, and airway electronic systems.

Bob Ryder, associate professor of commercial aviation at Delta State University, described industry connections between Delta State, the airlines, and small package express firms. The Beech King Air is used as a teaching lab for advanced flight students who serve as copilots on air transportation flights.

John Odegard, dean of the University of North Dakota's Center for Aerospace Science, described the ATC Demonstration Project that would prepare UND graduates for air traffic control employment using an integrated flight and ATC simulation lab. He explained the new Spectrum training program for China Airlines,

which includes 300 to 400 hours internship experience on a commuter airline. New initiatives include satellite teaching in which UND could offer courses through video to participating Airway Science institutions, utilizing a learning center and satellite uplink to augment their curricula with specialized aviation courses.

"AWS is effective in getting minorities involved in aviation," said Herbert Armstrong, airway science coordinator at Virginia's Hampton University, one of the participating minority institutions. The school has graduated 14 AWS majors and will graduate 15 to 20 more in May. Three of its graduates are at the FAA Academy. AWS, which began at Hampton with five students and one faculty, now includes 80 students with an AWS major and many more with AWS specialties. The program "enriches the curricula" at participating schools, says Armstrong, who is also president of the University Aviation Association, the only professional organization representing the nonengineering/technology element in collegiate aviation education.

Hampton's new ATC Project provides state-of-the-art air traffic control training to AWS management majors.

Congress has appropriated a total of $61.2 million under the Airway Science Grant Program since 1982, related Virginia Krohn, grant program manager. Participating colleges and universities have used the awards, which are facilities and equipment money, for such things as simulation equipment, academic buildings, computers, and meteorological equipment. Academic institutions, however, must provide cost-sharing funds toward any grants projects.

Gary Kiteley, UAA executive director and contractor for the AWS Program, highlighted a recent study



Mike Kruger, manager of FAA's Higher Education and Advanced Technology Staff (AHT-30) gives an update on the Airway Science Program.

on the impact of AWS on higher education and industry. From the standpoint of the academic community, primary benefits of the program include additional employment opportunities for graduates, leading to increased program enrollments, stronger curricula, a greater variety of offerings, increased status of aviation programs, and enhanced classrooms, laboratory facilities, and equipment.

To industry AWS offers better quality in hires, reductions in critical shortages in some technical occupations, and more uniformity in hires. The AWS Program has been praised for fostering stronger ties among the FAA, academia, and industry in the agency's interest of promoting aviation safety.

Program weaknesses include limited employment opportunities with the FAA and poor performance of some AWS hires on the air traffic control screen.

Walt Coleman, Air Transport Association of America vice president, pointed out that airlines want to raise the number of AWS graduates working for the FAA because they bring important benefits to air traffic and aviation safety. He sees a "need for comprehensive education programs that provide controllers with more than just the essential knowledge and skills to control traffic, but to be aware of the operational and economic considerations of operating transport aircraft."

The "Roundtable Action Plan," which came out of the recent meeting identified the following weaknesses in the program:

- Lack of a national forum to address issues within the Airway Science Program.
- Rigidity of the AWS curriculum core.
- Need for the airport management curriculum.
- Lack of partnership with industry to improve scholarships in aviation majors.
- Lack of an effective recruitment plan to recruit AWS students in FAA occupations.

Recommendations for new directions for AWS that emerged from the roundtable's breakout groups include setting up an aircarrier option, with scholarship opportunities and guaranteed loans to pay for the high cost of professional flight education; two-year AWS options in technical areas; an airport management specialization; and a national council for airway science, which would have membership from the FAA, industry, and academia to provide input on AWS issues, including curricula.

Organizations represented at the roundtable agreed to take the lead on studying specific proposals and on dates to report back.

The aim of Kruger and the AHT-30 staff—to increase dialogue and cooperative efforts among those who expect to benefit from the Airway Science Program—seems to have hit the mark. For the future, the group will continue to seek answers to the question, "What can be done to make a good program better?" ■

Miami Center Controller Demonstrates 'Can Do' Attitude

Ray McLeod, a full performance level (FPL) controller in the Miami enroute center and a paraplegic, is following the career path of his father.

The elder McLeod worked approach control at Miami International Airport and the control tower at Atlanta Hartsfield for 25 years.

"That's how I got the word about this great job," said Ray, who began his third year as a FPL controller in April.

McLeod has been with FAA for five years.

In 1990 he was recognized as FAA Federal Handicapped Employee of the Year in the Southern Region.

Before joining the FAA he worked as an aircraft dispatcher for several Part 121 and Part 135 operations.

McLeod said his disability has not impeded his job performance or his relationship with coworkers.

"I've been treated more than fairly since I've been hired," he said. "I don't think people treat me differently because they know I can do the job. I try to make them feel at ease," says McLeod.



Ray McLeod at his duty station.

McLeod has been with FAA for five years. In 1990 he was recognized as FAA Federal Handicapped Employee of the year in the Southern Region. Before joining the FAA he worked as an aircraft dispatcher for several Part 121 and Part 135 operations.

Even though he has earned greater responsibilities, McLeod still sees his career as being in its early stages.

He proceeded through the normal four-month training program in Oklahoma City and has since returned for an additional month of radar training.

He is currently an on-the-job training instructor and has successfully trained assistant controllers and radar controllers for the last eight months.

His other job-related activities include taking part in the Operations Committee where as a team member he discusses possible changes and improvements in the center's airspace system.

He has been recommended for an on-the-job training evaluator position and is taking additional training courses to prepare for that role.

McLeod and his wife Cynthia have been married for 16 years and have two sons, Andrew and Ray, Jr., aged 16 and ten.

Their older son has expressed an interest in becoming a controller like his father and grandfather, but is not getting pressured into it, according to his dad. One aspect Andrew likes about the job is the money, said McLeod, who believes he also needs to consider what would make him happy.

McLeod keeps active by swimming after work and on days off.

He also helps coach his boys' Little League baseball team.

'I'm just like everyone else. I'm just there to do the job. Sometimes I amaze people with what I can do.'

Ray McLeod
Miami ARTCC

His other hobbies include playing baseball and working on home furnishings such as wood doors, beams, and cabinets.

McLeod says he approaches his job with the attitude that he can do anything he sets his mind to.

"I'm just like everyone else. I'm just there to do the job. Sometimes I amaze people with what I can do." ■

Retirees

Aeronautical Center
Betty M. Akerson
Virginia L. Bishop
Owen W. Crouch, Jr.
Harvey B. Gray
Thomas D. Hoge
Richard G. Manley
Robert E. Runyon
Evelyn M. Wiginton
Betty J. Wilborn

Alaskan Region
Allen F. George
Irene M. Maris
Carrol P. Shirk

Central Region
Ray Corn
John W. Joice
Theodore D. Little
Carter M. Logan
Rosa Newman
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Norbert C. Feltes
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Carl W. Meredith
William T. Murphy
Frank D. Nichols
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Ronald C. Steele
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Carl W. Anderson
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James D. McWilliams
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Roy D. Mendes
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Audrey Schutte
Harrel D. Spangler
Frederick W. Stubbe
Ross V. Tanner
John B. Tompkins
Joseph M. Weber
James A. Wuollet

People

Aeronautical Center

Terry H. Deplois, unit supervisor, Flight Procedures/Inspection Section, Oklahoma City FIFO, promotion made permanent ... **Donald Espinosa,** academy 3R instructor, Technical Operations Section, Airway Facilities Branch, FAA Academy, from Washington Headquarters ... **Freida J. Fossett,** supervisor, Systems Management Section, Operational Systems Branch, Regulatory Support Div. ... **Sandra T. Hershey,** manager, Management Services Div. ... **William H. Owens,** unit supervisor, Flight Procedures/Inspection Section, Atlantic City FIFO, Atlantic City, NJ ... **Robert L. Pace,** manager, Engineering & Production Branch, FAA Logistics Center ... **Delcenia C. Peacock,** manager, General Accounting Branch, Accounting Div. ... **Jeffrey A. Roy,** manager, Aviation Standards Branch, FAA Academy, from New England Regional Headquarters ... **Larry L. Taylor,** manager, Human Resource Management Div.

Alaskan Region

Darold Mike Betts, area supervisor, Sitka, AK, FSS, from Fairbanks AFSS ... **Helen M. Groeneveld,** area supervisor, Merrill Field ATCT, Anchorage, promotion made permanent ... **Herbert W. Hinman,** area supervisor, Juneau, AK, AFSS ... **Cecelia L. Hunziker,** manager, Resource Management Div., from Aeronautical Center ... **Charles L. Kyle,** unit supervisor, Anchorage, ARTCC AFS ... **Charles W. Lund,** manager, Flight Standards Branch, Flight Standards Div., promotion made permanent ... **Sally J. McMullen,** area supervisor, Fairbanks, ATCT ... **Richard D. Mauck,** manager, Bethel, AK, FSS, from Hawthorne, CA, AFSS ... **Tony D. Moulton,** manager, McGrath, AK, FSS, from Anchorage FSS ... **Leonard O. Olson,** unit supervisor, Anchorage, AK, ARTCC, promotion made permanent ... **Robert J. Phillips,** area supervisor, Anchorage, ATCT ... **Randy K. Rogers,** area supervisor, Kenai, AK, AFSS ... **Phyllis P. Taylor,** supervisor, Acquisition & Utilities Section, Real Estate & Utilities Branch, Logistics Div., promotion made permanent ... **Margery A. Tideman,** unit supervisor, Staffing & Compensation Branch, Human Resource Management Div.

Central Region

Robert H. Hale, Jr., manager, Resource Management Branch, Air Traffic Div. ... **Madelyn Jamerson,** area manager, St. Louis, MO, AFSS, Chesterfield ... **William T. Kolf,** area supervisor, Cedar Rapids, IA, ATCT, from Kansas City International Airport ATCT ... **George W. Lee,** manager, Wichita, KS, FSDO, from Little Rock, AR, FSDO ... **Roy T. O'Conner,** asst. manager, plans & procedures, St. Louis, MO, ATCT, Berkeley, MO, from Chicago O'Hare ATCT ... **David W. Soeder,** area supervisor, Waterloo, IA, ATCT, promotion made permanent.

Eastern Region

Charles L. Bolling, area supervisor, Washington ARTCC, Leesburg, VA ... **Vito J. Borrello,** supervisor, System Effectiveness Section, Facility Operations Branch, Air Traffic Div., from New York TRACON ... **Mary Ann Burns,** unit supervisor, Wilkes-Barre AFSFO, Harrisburg AFS, Avoca, PA, promotion made permanent ... **Robert J. Carter, Jr.,** asst. sector manager, Harrisburg AFS, New Cumberland, PA, from Washington Headquarters ... **Albert F. Douglas,** manager, Philadelphia ATCT, from Washington National ATCT ... **Walter Drelick,** unit supervisor, New York FSDO, Valley Stream, NY ... **Richard J. Ducharme,** supervisor, Systems Operation Section, Facility Operations Branch, Air Traffic Div., from Boston, MA, ATCT ... **Beverly M. Faber,** unit supervisor, Islip, NY, ARTCC AFS, promotion made permanent ... **Charles L. Freeman,** asst. manager for training, Philadelphia ATCT, Tinicum ... **Ann H. Haralam,** manager, Material Services Management Branch, Logistics Div. ... **Martin J. Ingram,** aviation safety inspector, New York FSDO, Valley Stream, NY ... **John W. Kies,** section supervisor, Systems Management Branch, Air Traffic Div. ... **Timothy S. McHale,** area supervisor, Syracuse ATCT, from Utica ATCT ... **James P. Meekins,** supervisor, Planning Section, Systems Requirement Branch, Air Traffic Div. ... **Abigail C. Moserowitz,** staff chief, Management Staff, Airway Facilities Div. ... **Peter A. Nelson,** asst. manager, Airports Div. ... **Edward J. Quigley,** area supervisor, Greater Pittsburgh ATCT, Coraopolis, PA, promotion made permanent ... **Allen J. Ruff,** team supervisor, New York FSDO, promotion made permanent ... **Steven E. Saul,** area supervisor, New York TRACON, Garden City, NY ... **Daniel Z. Smith,** manager, Clarksburg, WV, ATCT ... **William VanBruinisse,** asst. manager, traffic management, New York TRACON, Garden City, NY ... **Edwin C. Van Cott,** area supervisor, Allentown, PA, ATCT, promotion made permanent.

Great Lakes Region

Wanda L. Adelman, area supervisor, Bismarck, ND, ATCT, promotion made permanent ... **Jon K. Applegate,** area supervisor, Lansing, MI, AFSS, Clinton County, promotion made permanent ... **Robert F. Ashauer,** deputy manager, Resource & Planning Branch, Airway Facilities Div., from Green Bay, WI, AFS ... **Robert L. Bartlett II,** manager, East St. Louis, IL, ATCT ... **Maureen R. Beharelle,** asst. manager for program support, Springfield, IL, AFS ... **Robert B. Benjaminson,** asst. manager for training, Chicago, IL, ARTCC, Aurora ... **Thomas E. Brand,** manager, Position & Pay Administration Branch, Human Resource Management Div., promotion made permanent ... **Steven C. Bucher,** manager, Airport District Office, Belleville, MI, FSDO, Wayne County ... **Fred C. Clark,** unit supervisor, Fargo, ND, FSDO, promotion made permanent ... **Ricky N. Dillbeck,** area supervisor, Evansville, IN, ATCT ... **Martin G. Duffy,** asst. sector manager, Aurora, IL, AFS, from Chicago AFS ... **Robert F. Everson,** asst. manager, plans & programs, Chicago O'Hare ATCT, from regional headquarters ... **Sirraj M. Fechter,** supervisory computer programmer analyst, Minneapolis, MN, ARTCC, Farmington, MN, promotion made permanent ... **Stephen P. Ford,** area supervisor, Chicago, IL, ARTCC, Aurora ... **Dean E. Fulmer,** area supervisor, Minneapolis, MN, ARTCC, Farmingham ... **Loren G. Gardner,** manager, Peoria, ATCT, from Chicago O'Hare ... **Donald A. Gunderson, Jr.,** area supervisor, Mitchell Field ATCT, Milwaukee, WI, from Wold Chamberlain ATCT, Minneapolis ... **Gary L. Henry,** area manager, Cleveland, OH, AFSS, from Louisville, KY, AFSS ... **Thomas B. Howell,** manager, Cleveland, OH, ARTCC, Oberlin, from Indianapolis, IN, ARTCC ... **Robert G. Karnick,** area supervisor, Chicago O'Hare

ATCT ... **James C. Kendall,** unit supervisor, Rochester AFSFO, Minnesota AFS, from Indiana AFS ... **Donna M. Kitta,** area supervisor, Dayton Vandalia ATCT, promotion made permanent ... **James M. Lundy,** environmental support technician, Aurora, IL, AFS, promotion made permanent ... **Cameron L. MacDonald,** area supervisor, Lansing, MI, AFSS, Clinton County, promotion made permanent ... **Thomas R. Martin,** unit supervisor, Belleville, MI, FSDO, Wayne County ... **Robert E. Mc Collough,** unit supervisor, Belleville, MI, FSDO, Wayne County, promotion made permanent ... **Maximo A. Mendoza,** environmental support unit supervisor, Aurora, IL, AFS, from Oakland, CA, ARTCC AFS ... **Billy J. Meredith,** unit supervisor, Lansing AFSFO, Michigan AFS, from Romulus, MI ... **Colleen Nichols-Muschler,** security specialist, Minneapolis, MN, CASFO ... **John V. Orr, Jr.,** unit supervisor, Champaign AFSFO, Illinois AFS, promotion made permanent ... **Philip L. Peterson,** unit supervisor, Rockford, IL, AFSFO, Illinois AFS, from Champaign AFSFO ... **David L. Shick,** unit supervisor, South Bend, IN, FSDO, promotion made permanent ... **Doreen J. Sims,** area supervisor, Grand Forks, ND, AFSS, promotion made permanent ... **Jimmie D. Stanley,** principal maintenance inspector, Belleville, MI, FSDO, Wayne County, promotion made permanent ... **Linda Tjossem,** area manager, Chicago, IL, ARTCC, Aurora, IL, from Portland, ME, ATCT ... **Roland G. Tucker,** unit supervisor, DuPage AFSFO, Chicago AFS, from Dakota AFS ... **Kenneth R. Waggoner,** unit supervisor, Pontiac AFSFO, Michigan AFS, promotion made permanent ... **Charles D. Wilcox,** area supervisor, Kankakee AFS, from Grand Forks, ND, AFSS ... **Steven H. Woolheater**, manager, Springfield, Il, AFS ... **William T. Yakich,** unit supervisor, Milwaukee AFSFO, Wisconsin AFS, promotion made permanent.

New England Region

William E. Adams, manager, Aircraft Maintenance Branch, Flight Standards Div., promotion made permanent ... **Allan Brilliant,** manager, Boston AFS ... **Joseph A. Cirillo,** area supervisor, Bangor, ME, AFSS, promotion made permanent ... **George J. Freitas,** unit supervisor, Boston, AFS, promotion made permanent ... **Todd D. Friedenberg,** area supervisor, Bangor, ME, ATCT, promotion made permanent ... **Mark C. Fulmer,** branch manager, Engine Certification Office, Engine & Propeller Directorate ... **Mark A. Guiod,** area supervisor, Boston, MA, ATCT, from Worcester, MA, ATCT ... **Thomas F. Kozak,** area supervisor, New Bedford, MA, ATCT, promotion made permanent ... **Albert T. Lynch, Jr.,** area manager, Boston, ATCT ... **George A. Moberger,** area supervisor, Boston ARTCC, Nashua, NH, promotion made permanent ... **Thomas J. Nicholson, Jr.,** asst. manager for automation, Field Automation Support Facility, Air Traffic Div. ... **Arnold W. Smith,** area supervisor, N. Kingstown, RI, Ocean TRACON, Quonset Point, from Providence, RI, ATCT ... **Steven D. Stcynske,** asst. manager, Manchester, NH, ATCT ... **William F. Turner,** area supervisor, Manchester, NH, ATCT, promotion made permanent.

Northwest Mountain Region

Samuel A. Aaron, asst. manager, Seattle, WA, FSDO, from regional headquarters ... **Donald E. Bennett,** unit supervisor, Helena, MT, FSDO, from Southern Regional Headquarters ... **James H. Birchfield,** unit supervisor, Salt Lake City, UT, Field Maintenance Party, Airway Facilties Div. ... **William E. Cassada, Jr.,** asst. manager, plans & procedures, Denver, CO, ATCT ... **John F. Cook,** area supervisor, Seattle, ARTCC, Auburn, WA ... **Charles E. Davis,** section supervisor, Facility Operations Branch, Air Traffic Div., from Seattle ARTCC ... **Terry D. Falkner**, manager, Seattle ARTCC, Auburn, WA ... **James M. Feeney,** area manager, Portland, OR, ATCT ... **Donald F. Ford**, group supervisor, Seattle ARTCC, Auburn, WA. ... **Charles S. Frankenfield,** manager, Centennial ATCT, Denver, CO, from Cheyenne, WY, ATCT ... **Barbara A. Garner,** section supervisor, Procurement Branch, Logistics Div., promotion made permanent ... **Edward D. Henderson,** manager, Billings, MT, ATCT, from Seattle ARTCC ... **Robert A. Hill,** manager, Seattle, WA, FSDO ... **Allan R. Johnson,** manager, Idaho Falls ATCT, from Eugene, OR, ATCT ... **James F. Kelsey,** area manager, Salt Lake City ARTCC ... **Nora Landers,** section supervisor, Real Estate & Utilities Branch, Logistics Div., promotion made permanent ... **Michael A. Leffingwell,** group supervisor, Navigation/ Communications Installation Engineering Section, Establishment Branch, promotion made permanent ... **James R. Lockhart,** asst. manager, Airway Facilities Div. ... **Michael Mollohan,** area supervisor, Seattle-Tacoma, WA, ATCT ... **Kevin M. Mullin,** supervisory aviation safety inspector (mfg.), Seattle MIDO ... **Helen M. Parke,** asst. manager, Air Traffic Div., from Seattle ARTCC ... **Carl D. Pike,** manager, Seattle MIDO, promotion made permanent ... **Jack B. Selders,** area supervisor, Salt Lake City UT, ATCT, from Pocatello, ID, ATCT ... **Alton E. Tolson,** asst. manager, Salt Lake City, UT, AFS ... **Paul J. Wenberg,** area supervisor, Seattle-Tacoma, WA, ATCT, promotion made permanent ... **Dennis J. Winebrenner,** asst. manager, Casper, WY, AFSS, from Seattle, WA, AFSS.

Southern Region

Ralph S. Abney, Jr., area manager, San Juan CERAP, from Dothan, AL, ATCT ... **Eugene B. Barnett,** manager, Greer, SC, ATCT, from Page Field ATCT, Ft. Myers, FL ... **Edwin Berrios-Pacheco,** asst. manager for automation, San Juan CERAP ... **Oscar E. Branch,** manager, Meridian, MS, ATCT, from Mobile, AL, ATCT ... **Edward L. Brewer,** manager, Gainesville, FL, AFSFO, Jacksonville AFS, from Charlotte, NC, AFS ... **Charles P. Brockman,** unit supervisor, Atlanta, GA, CASFO, Nashville, TN, promotion made permanent ... **John H. Brooks,** crew chief, Miami, ARTCC AFS ... **Ted D. Brookshire,** asst. manager, plans & programs, Nashville, TN, AFSS ... **David L. Bryant,** section supervisor, Technical Support Staff, Data Processing Branch, Management Systems Div. ... **Robert L. Christian, Jr.,** group supervisor, Hilliard, FL, ARTCC, promotion made permanent ... **David J. Cognata,** area supervisor, Hilliard, FL, ARTCC, from San Juan CERAP ... **Pedro Colon-Diaz,** manager, Richmond Heights, FL, AFSFO, Miami Hub AFS, promotion made permanent ... **Sam Connor,** area supervisor, Anniston, AL, AFSS, promotion made permanent ... **Melvin A.**

Cooper, asst. manager for training, Nashville, TN, AFSS ... **Sidney M. Cooper,** traffic management unit supervisor, Miami, ARTCC ... **John K. Corpening,** asst. manager, Atlanta, GA, AFS (Hub), from regional headquarters ... **Gene T. Crabtree,** manager, San Juan, PR, AFS ... **Thomas Doherty,** asst. manager, NAS implementation, Memphis, TN, ARTCC ... **Ricky J. Downing,** area supervisor, Memphis, TN, ARTCC, promotion made permanent ... **Felix J. Enriquez,** asst. manager for program support, Miami, ARTCC AFS ... **Van E. Estes III,** unit supervisor, Asheville, NC, AFSFO, Charlotte, AFS, promotion made permanent ... **Carl S. Everatt,** asst. manager for training, Gainesville, FL, AFSS ... **William J. Fedowich,** area manager, Pensacola, FL, ATCT, from Dallas/Ft. Worth ATCT ... **Phillip L. Fuller,** air traffic manager, Military Activities Staff, Key West, FL, from FAA Academy ... **Donald K. Gallion, Jr.,** area supervisor, Hilliard, FL, ARTCC, promotion made permanent ... **Patricia L. Garrambone,** area supervisor, Craig Municipal ATCT, Jacksonville, FL, from FAA Academy ... **Roger V. Gordon, Jr.,** unit supervisor, Miami, FL, FSDO ... **Curtis W. Goswick,** manager, Hebron, KY, ATCT, from regional headquarters ... **Bernard R. Gunnels, Jr.,** staff chief, Communications Control Center ... **Ronald L. Harper,** asst. manager for training, Miami, AIFSS, promotion made permanent ... **Betty W. Harrison,** area supervisor, Hampton, GA, ARTCC, promotion made permanent ... **James D. Jefferson,** manager, Atlanta, AFSFO, Atlanta Hub AFS, from Columbia, SC, AFS ... **Robert R. Johnson,** manager, Raleigh, NC, AFSFO, from regional headquarters ... **Richard L. Krzepina,** unit supervisor, Miami, ARTCC AFS ... **Charles M. Mahaffey,** asst. manager for training, Orlando, FL, ATCT, from Greensboro, NC, ATCT ... **Bruce E. Maupin,** manager, Jackson, MS, AFSFO, Jackson AFS, from regional headquarters ... **Keith S. May,** manager, Central Branch (Orlando), Office of Assistant Chief Counsel, promotion made permanent ... **James H. McCannell,** asst. manager for training, Hilliard, FL, ARTCC ... **James W. McQuigg,** asst. manager, NAS Implementation, Hilliard, FL, ARTCC ... **Lewis M. Miller, Jr.,** F&E on-site manager, Memphis, TN, NAS Program Management Staff, Airway Facilities Div. ... **James M. Pearson,** area manager, Hilliard, FL, ARTCC ... **Noel A. Peters,** unit supervisor, Atlanta, GA, CASFO, promotion made permanent ... **Richard Riegler, Jr.,** unit supervisor, Miami, ARTCC ... **Wayne R. Rives,** manager, Hampton, GA, AFSFO, Atlanta ARTCC AFS, promotion made permanent ... **John C. Roseborough, Jr.,** section supervisor, Ft. Lauderdale FSDO ... **James E. Sanford,** manager, Memphis, Hub, AFS, from Miami ARTCC AFS ... **Sharon B. Schumm,** area supervisor, Savannah, GA, ATCT, promotion made permanent ... **Nicholas R. Scott,** asst. manager, Civil Aviation Security Div. ... **Richard D. Shaffer,** section supervisor, Ft. Lauderdale FSDO, promotion made permanent ... **Frederick Steeves,** unit supervisor, Charlotte, NC, AFS, from Tampa, FL, AFS ... **Clayton E. Steinacker,** area manager, San Juan CERAP, from Memphis, TN, ARTCC ... **Donald E. Sullivan,** manager, Montgomery, AL, AFSFO, Montgomery AFS, from Covington, KY, AFS ... **Mitten R. Swartzwelder,** traffic management unit supervisor, Miami ARTCC ... **Eddie L. Thomas,** manager, South Branch, Office of the Assistant Chief Counsel, promotion made permanent ... **Odel G. Torres,** asst. manager for program support, San Juan, AFS ... **Charles A. Underwood,** asst. manager for training, Raleigh, NC, ATCT ... **Sandra G. Walsh,** area supervisor, Sarasota, FL, ATCT, from Washington Dulles ATCT, Loudoun County, VA ... **Lawrence H. Williams,** section supervisor, Nashville, TN, FSDO, promotion made permanent ... **Leonard H. Youngren,** crew chief, Memphis, TN, ARTCC AFS, promotion made permanent.

Southwestern Region

Jesus J. Aguilera, manager, Austin, TX, FSS, from Ft. Worth, TX, AFSS ... **Michael W. Ahlness,** area supervisor, Roswell, NM, ATCT, from Lafayette, LA, ATCT. ... **Willis O. Beene,** area supervisor, Houston, TX, ARTCC, promotion made permanent ... **Lillard G. Bruce,** team supervisor, Baton Rouge, LA, FSDO, promotion made permanent ... **Brent A. Chance,** manager, Little Rock, AR, FSS, from Albuquerque Transition Staff ... **Terry D. Cooksey,** manager, Texarkana AFSFO, Little Rock AFS ... **Jerry A. Cosner,** asst. manager, Albuquerque, NM, ARTCC AFS, from Olathe, KS, AFS ... **William H. Darby II,** area supervisor, Midland, TX, ATCT, from Lubbock, TX, ATCT. ... **Manuel F. Garcia,** supervisor, Recruitment Section, Employment Branch, Human Resource Management Div. ... **Robert E. Graphman,** supervisor, East Section, National Air Traffic Systems Effectiveness/Evaluations Branch, Evaluations Div., promotion made permanent ... **Darryl A. Haynes,** area supervisor, Houston, Hobby ATCT, from San Antonio, ATCT ... **Burnis D. Horton,** manager, Systems Maintenance Engineering Branch, Airway Facilities Div. ... **James D. Kincaid,** area supervisor, Tulsa, OK, ATCT, from San Antonio, TX, ATCT ... **Diana I. Miramontez,** unit supervisor, Ft. Worth, TX, ARTCC, promotion made permanent ... **James R. Nausley,** supervisor, NAS Implementation & Automation Section, Systems Requirements Branch, Air Traffic Div. ... **Cliff M. Oravec,** area supervisor, Monroe, LA, ATCT, from Lafayette, LA, ATCT. ... **Enrique S. Rodriguez,** unit supervisor, El Paso AFS ... **Fred D. Sikes,** unit supervisor, Shreveport, LA, AFSFO, Little Rock AFS. ... **Jan Skarda,** area supervisor, Houston, Intercontinental ATCT, from Austin ATCT ... **James E. Stevens,** area manager, Dallas/Ft. Worth, TX, ATCT ... **Arlester Thomas,** unit supervisor, Construction Management Section, F&E, Establishment Engineering Branch, Airway Facilities Div., promotion made permanent ... **Walter L. Tweedy,** area supervisor, Dallas/Ft. Worth ATCT, from Love Field ATCT, Dallas. ... **Albert G. Tyson,** asst. manager for technical support, Albuquerque, NM, ARTCC AFS, promotion made permanent ... **Mark D. Washam,** area supervisor, Houston ATCT, from Albuquerque, NM, ATCT ... **Marcus L. Williams,** manager, Real Estate Branch, Logisitics Div.

Technical Center

Anthony L. Durso, manager, Systems Engineering Branch, National Automation Engineering Field Support Div. ... **Armando J. Gaetano,** section supervisor, Aircraft Engineering & Modification Branch, Technical Facilities Div., promotion made permanent ... **Norman N. Hopkins,** manager, Flight Service Field Support Branch, National Automation Field Support Div., from Riverside, CA, AFSS.

Washington Headquarters

William O. Byberg, manager, Operations & Procedures Branch, Military Operations Div., Office of Air Traffic System Management ... **Marcia V. Corey,** manager, Information Resource Management Branch, Human Resource Management Div., Associate Administrator for Human Resource Management ... **Herman J. Demuth,** supervisory aviation safety inspector, Air Carrier Training Branch, Air Transport Div., Flight Standards Service, promotion made permanent ... **Timothy G. Fleming,** manager,

Future Systems Div., Office of Air Traffic System Management ... **Christine M. George,** center counsel, Senior Executive Resource Staff, Associate Administrator for Human Resource Management ... **Timothy A. Grovac,** section supervisor, Enhanced Traffic Management Branch, Future Systems Div., Office of Air Traffic System Management ... **Patrick W. Marable,** asst. manager, Maintenance Operations Div., Systems Maintenance Service, from Southwest Regional Headquarters ... **William J. Marx,** branch manager, Civil Operations Div., Office of Air Traffic System Management, from Eastern Regional Headquarters ... **Stanley E. Matthews,** deputy director, Office of Air Traffic System Management ... **Benny L. McGlamery,** manager, Terminal Procedures Branch, Procedures Div., Air Traffic Rules & Procedures Service ... **Willis C. Nelson,** asst. manager, System Plans & Programs Div., Air Traffic Plans & Requirements Service ... **James C. Nocker**, technical program manager, Maintenance Automation Branch, Maintenance Operations Div., Systems Maintenance Service, from San Antonio, TX, AFS ... **James W. Rogers,** deputy section supervisor, Aircraft/CNS System Development Div., Research & Development Service ... **Daniel P. Salvano,** manager, Aircraft Engineering Div., Aircraft Certification Service ... **Russell M. Scarberry,** chief, Special Projects Staff, Office of Air Traffic System Management ... **James F. Stemple,** unit supervisor, Facilities & Equipment Program Analysis Div., NAS Program Management Service ... **Joseph J. Stevens,** manager, Administrator's Hotline, Office of the Administrator ... **Lyle K. Streeter,** unit supervisor, Accident Investigation Div., Office of Accident Investigation ... **Shelley A. Thomas,** manager, Career Systems Div., Office of Human Resource Development ... **Gordon L. Woodahl,** asst. manager, Operations Branch, ATC Systems Command Center, Office of Air Traffic System Management.

Western-Pacific Region

Atanacio Almendariz, area supervisor, Rancho Murieta, CA, AFSS, Sloughhouse, CA, from Sacramento FSS ... **Stephen V. Byrum,** area supervisor, Las Vegas ATCT, promotion made permanent ... **Charles A. Chamberlain IV,** area supervisor, Burbank, CA, TRACON, promotion made permanent ... **Terry L. Comstock,** area supervisor, Los Angeles ARTCC, Palmdale, promotion made permanent ... **Frederick L. Davis,** manager, Concord, CA, ATCT, from San Francisco ATCT ... **Patricia L. De Pauw,** area manager, Ontario, CA, TRACON ... **Debra A. Elmore,** area supervisor, Edwards AFB, CA, RAPCON, from Ontario, CA, ATCT ... **William T. Eyre, Jr.,** manager, Los Angeles, FSDO ... **Stanley C. J. Faulk,** area supervisor, Los Angeles ARTCC, Palmdale, promotion made permanent ... **James J. Ford,** principal inspector, Van Nuys, CA, FSDO, from regional headquarters ... **Michelle L. Ford,** area supervisor, Hawthorne, CA, AFSS, from Lancaster, FSS ... **Johnnie W. Garza,** area supervisor, Edwards AFB, CA, RAPCON, from Los Angeles ARTCC, Palmdale ... **Ralph L. Guerriero,** area supervisor, Rancho Murieta, CA, AFSS, Sloughhouse, from Sacramento, FSS ... **Lauren A. Harvey,** area supervisor, Los Angeles, ARTCC, Palmdale, promotion made permanent ... **Brian E. Hauf,** area supervisor, Oakland, CA, ARTCC, Fremont ... **Gary W. Hobbs,** asst. manager, traffic management, Los Angeles, ARTCC, Palmdale ... **William J. Hughes,** area supervisor, Long Beach, CA, ATCT, promotion made permanent ... **William T. Ipock,** area supervisor, Rancho Murieta, CA, AFSS, from Sacramento, FSS ... **Douglas R. Johnson,** operations chief, Sacramento, AFS, Reno, NV ... **Ronald E. Krebs,** asst. manager, plans & procedures, El Toro, CA, TRACON, Santa Ana ... **William C. Lindsay,** section supervisor, Contracting & Acquisition Management Branch, Logistics Div., promotion made permanent ... **James B. Manson, Jr.,** manager, Ontario, CA, TRACON, from regional headquarters ... **Cecil T. McReynolds,** asst. manager for training, Los Angeles AFS, from regional headquarters ... **Wilson S. Moses,** manager, Rancho Murieta, CA, AFSS, Sloughhouse, from Sacramento, CA ... **Ricky A. Opperman,** area supervisor, San Jose, CA, International Airport ATCT, from Palo Alto, CA, ATCT ... **Steven A. Pansky,** asst. manager for training, Burbank, TRACON ... **Ronnie L. Pelayo,** unit supervisor, Los Angeles, CASFO, promotion made permanent ... **Robert A. Rabideau**, asst. manager, plans & procedures, El Toro, CA, TRACON, Santa Ana ... **Ronald S. Rakoski,** area supervisor, Los Angeles ARTCC, Palmdale, promotion made permanent ... **Donald W. Ralph,** area manager, El Toro, CA, TRACON, Santa Ana, from NAS Miramar TRACON, San Diego ... **Katherine D. Raulston,** area supervisor, Los Angeles, ARTCC, Palmdale, promotion made permanent ... **George R. Riberal,** environmental support unit supervisor, Honlulu AFSFO, Hawaii-Pacifiic AFS, from Diamond Head, AFSFO ... **Bruce L. Rigney,** area supervisor, Las Vegas, NV, ATCT, promotion made permanent ... **Joseph F. Savage,** manager, Livermore, CA, ATCT, from Stockton ATCT ... **Charles B. Simmons,** manager, Edwards AFB, CA, AFSFO, Lancaster, Las Angeles AFS, from regional headquarters ... **Larry J. Statham,** area manager, El Toro, CA, TRACON, Santa Ana, from regional headquarters ... **Jack G. Van Zandt**, branch manager, Air Traffic Div. ... **Dwight D. Virtue,** area supervisor, Los Angeles, ARTCC, Palmdale, promotion made permanent ... **David E. Watson,** area supervisor, Guam CERAP, Andersen AFB, promotion made permanent ... **Joyce Wilson,** manager, Operations Branch, Human Resource Management Div. ... **Kenneth L. Wittmer,** area supervisor, Oakland, CA, ARTCC, Fremont, promotion made permanent ... **Leon W. Zukosky,** area supervisor, San Francisco, ATCT, from Windsor Locks, CT, ATCT.

FAA World

April 1991

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Kathleen Bergen—Southern Region
Roger Myers—Southwest Region
Holly Baker—Technical Center
Elly Brekke—Western-Pacific Region

A Bird's-Eye View of the Grand Canyon

New Aeronautical Chart Published To Bolster Safer Sightseeing Flights

Sightseeing flights over the Grand Canyon can now use the "Grand Canyon VFR Aeronautical Chart," which was effective April 4, to promote aviation safety and navigation in this popular flight area.

The chart, published at a scale of 1:250,000, depicts procedures and restrictions within the airspace affected by special federal aviation regulation (SFAR) 50-2. Included are communication frequencies, minimum altitudes and area navigation data.

The front of the chart, designed for transient general aviation pilots, looks similar to a terminal area chart. The reverse side is for FAA-approved commercial air tour operators and shows routes, altitudes, and special procedures for helicopter and fixed-wing aircraft. On both sides photographs of significant landmarks aid visual navigation.

The Cartographic Standards Branch, ATP-220, developed specifications and standards for the chart in coordination with FAA's Western-Pacific Region, the Las Vegas Flight Standards District Office, the National Ocean Service and user groups in the Grand Canyon area.



Zuni Southbound



Grand Canyon Airport

The chart was produced by the National Ocean Service and is available for $2.75 from its authorized agents or from:

NOAA Distribution Branch
N/CG33
National Ocean Service
Riverdale, MD 20737-1199

Selected as part of the U.S. national exhibit at the 15th conference of the International Cartographic Association, the chart will be displayed with exhibits on mapping and charting from approximately 40 countries. Dates for the conference, to be held in Bournemouth, England, are September 23 to October 1.

Photos show the dramatic terrain in the Grand Canyon area and the airport.

U.S. Department
of Transportation

**Federal Aviation
Administration**

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