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In his Sept. 29 State of the Lab address,

JPL Director Dr. Charles Elachi declared the upcoming year

“a very challenging time, but an exciting time in the history of JPL.”

Elachi: ‘Exciting’ year to come

By Mark Whalen

Elachi congratulated the GALEX, Mars Exploration Rover and SIRTf teams on the great effort to successfully launch four spacecraft in a five-month period. All four missions are operating well.

Elachi also congratulated the Galileo team on its recently completed mission, lauding their “vision and tenacity.”

“Even with Galileo gone,” he pointed out, “we still have 17 spacecraft and four major instruments in operation across the solar system. We all should take pride in the richness of the science

derstand mistakes that happen at other places, and shame on us if we repeat any of those.”

In noting that JPL should nurture a culture of “openness, responsibility and courage,” he said, “When we see a problem, it is our responsibility to bring it up to the next layer of management, and if it’s not addressed, to bring it up to the next layer, and so on. We should never be intimidated.

“On the other side, I expect management to respect people when they bring

will develop implementation guidelines, while the Project and Engineering Management Council will identify critical technical areas and ensure that approaches are implementable.

The Lab will receive an additional boost with Elachi’s announced investment in its burden budget for the near term. Highlights include:

- The Research and Technology Development area will increase from \$10 million in FY ’03 to \$25 million in ’04, then to \$35 million in ’05 and \$45 million in ’06.
- An increase of \$8.8 million for JPL’s technical infrastructure and \$3.8 million for an information infrastructure upgrade.
- The new Human Resource Development Fund (\$2.5 million for FY ’04, trending to \$15 million in a few years) will allow JPL to annually hire at least 25 “fresh-outs,” within three years of graduation; hire staff in specific disciplines for critical areas such as astrophysics, system engineering, and planetary and Earth science; and conduct joint appointments with local universities, including Caltech, USC, UCLA and others.
- A \$2 million business investment for a system to allow for enterprise resource planning and integrate it with the Lab’s engineering and design processes as well as manufacturing and inventory processes.
- \$4 million to the Microdevices Laboratory, to upgrade equipment.

In total, the additions represent an increase for investment from 21 to 26% of JPL’s burden budget. “This is very critical,” Elachi said. “I felt that these investments were essential to the long-term health of the Lab.”

As soon as the budget is approved, JPL could face some growth in personnel. Elachi envisions that JPL will add 100 to 200 work years (the equivalent of 100 to 200 full-time employees) in the next year. To accommodate that, the Lab is considering renting 200 to 300 workspaces in the Pasadena area over the next year.

For the long term, JPL has developed a 10-year master plan, which includes the construction of three major buildings and possibly an education center. The first building, a flight project center, is slated to start a year from now and will provide 500 to 600 offices.

In closing, Elachi told the gathering, “In this 45th anniversary of NASA, we can all be proud of what JPL has accomplished for the nation and humankind as part of the NASA team.”

Elachi’s address is archived at <http://dailyplanet.net>.



Tom Wynne / JPL Photo Lab

coming from these spacecraft.”

The new fiscal year began Oct. 1, and in terms of a new budget, “things are looking optimistic for NASA,” Elachi said, noting that the House and Senate have passed their bills but have not yet met for a final bill.

The president’s request for FY ’04 is projected to be about \$15.5 billion, with a sum of close to \$18 billion in five years. “That’s pretty good, considering the economic situation we’re in,” he said.

For space science, the president’s FY ’04 request is approximately \$4 billion, with a five-year projection of \$5.6 billion, an annual growth of about 7%. In the Earth Science area, the president’s ’04 request is about \$1.5 billion, down from FY ’03, “but the trend for the future is on the positive side,” Elachi said. “There is a small drop between ’04 and ’05, but then it will pick up.”

What are the implications for JPL? For the near term, Elachi said the Lab’s projected budget for FY ’04, if enacted, shows a net growth of about 10%. “Effectively, between the House and Senate, all of our future missions have been approved, with very minor perturbations,” he said.

To help the Lab achieve its goals, Elachi stressed the importance of “lessons learned.” “Smart people learn from their mistakes, but brilliant people learn from other people’s mistakes,” he said. “It’s very important for us to un-

derstand mistakes that happen at other places, and shame on us if we repeat any of those.”

In light of the aforementioned lessons learned and the Columbia Accident Investigation Board’s recent report, NASA is forming an Engineering and Safety Center, a “virtual team” that includes staff from all NASA centers. Based at Langley Research Center, the team will provide an additional step of checks and balances—“not to wait until problems happen, but to bring an external perspective from talent both inside and outside the agency,” Elachi noted.

“This is an example of how we all should work as a team to help the agency achieve its goals,” he said. He told the audience about a “One NASA” meeting that will be held at JPL Oct. 17 (see page 3 article).

The director described a slight shift in focus for the Lab in its implementation strategy. The former plan was to always have one in-house mission in progress at JPL; now the goal is to have one large and one small- or medium-sized mission always in development.

In addition, the Lab will implement in-house strategic subsystem elements of projects subcontracted to industry; implement several remote-sensing and in-situ instruments in house; and select missions, subsystems and instruments early in the mission definition process.

The Strategic Management Council

Benefits enrollment starts Oct. 15

FROM OCT. 15–31, employees will be able to select their benefit options for 2004. The *Benefits@Caltech* newsletters sent out in September and early October discussed important changes in the benefits program effective Jan. 1. These changes include:

- Replacing the Blue Cross and CIGNA plans with Health Net Paid Provider Organization and Health Maintenance Organization options.
- Introducing a new basic Long-Term Disability plan providing 40% income replacement during long-term disabilities.
- Providing a new employee plus child(ren) medical and dental coverage option.

Enrollment instructions and a detailed Comparison of Benefits chart will be mailed to employees’ home addresses prior to Oct. 15.

This year, it’s important to review enrollment materials and verify your dependent data online. In addition, if you are transitioning to the Health Net HMO plan it’s also important to review the primary care provider data online (www.healthnet.com/caltech) to ensure that you are assigned the correct provider.

For a list of enrollment meetings to be held this month, see page 2. For enrollment questions, contact the JPL Benefits Office at ext. 4-3760.

Get tickets for Family Day, set for Nov. 1

JPL FAMILY DAY WILL BE HELD Saturday, Nov. 1. Tickets are required, and are available through Oct. 17. All JPL badge holders and their immediate families may attend.

Family Day will be held from 10 a.m. to 3 p.m. Lunch and entertainment will be provided in the mall, and it’s a great opportunity for your family to see your workplace up close. Activities and tour sites include a Mars Exploration Rover mission exhibit, Cassini mission exhibit and planetarium show, von Kármán visitor center, Space Flight Operations facility, JPL Store, Welcome to Outer Space movie, Child Educational Center and Caltech Credit Union.

Tickets are available at the JPL Store, Building 114-104; Human Resources, 180-502; Public Services, 186-113; credit union, 218; Mars Exploration Program, 264-640E; and Employee Services and Recognition, 310-203.

For more information, call Nancy Kapell at ext. 4-9432.

“...We all should work as a team to help the agency achieve its goals.”

News Briefs



Dr. Ayanna Howard

Howard named top young innovator
DR. AYANNA HOWARD, a senior member of the technical staff with the Telerobotics Research and Applications Group in Section 348, has been named one of the world's top young innovators by Technology Review magazine.

The "TR100" is a group of 100 creative individuals under age 35 "whose work is transforming the nature of such fields as biotechnology, computing, energy, medicine, manufacturing, nanotechnology, telecommunications, and transportation," the magazine said. Technology Review editors and a panel of judges chose the group from nearly 650 candidates.

Howard and the other honorees are profiled in the October issue of Technology Review magazine. They received the award at last month's Emerging Technologies Conference at the Massachusetts Institute of Technology.

With JPL since 1991, Howard's expertise is in neural networks, robotics, fuzzy logic, and machine vision. She has published more than 40 journal articles, conference papers, and book chapters on the successful use of artificial intelligence techniques, from intelligent terrain assessment algorithms to autonomous rover navigation.

She is a past winner of JPL's Lew Allen Award for Excellence in Research, the Lab's highest honor in recognition of significant leadership and technological innovation performed during the early years of an employee's professional career.



Dr. Claudia Alexander

Women of color award to Alexander
JPL research scientist DR. CLAUDIA ALEXANDER is a recipient of an Emerald Honor for Women of Color in Research & Engineering. The award, given by Career Communications Group, Inc., is the publisher of Black Engineer & Information Technology Magazine.

The award was presented in September at the National Women of Color Research Sciences and Technology Conference in Nashville, Tenn. The annual conference celebrates the contributions of minority women in science and technology.

Alexander was one of the project

managers of JPL's Galileo mission to Jupiter, which ended Sept. 21. She is also a project scientist for the U.S. role in the European Space Agency's Rosetta mission to a comet.

Parking changes for 2004 noted
JPL Security has announced the following issues affecting parking policies for next year:

- **Performance-Based parking returns in 2004.** Each Directorate received allocations for awarding on-Lab parking privileges to JPL employees for excellent performance. Recipients of Performance-Based parking will be notified by their supervisor or manager. Individuals will be issued parking hang tags in December that will be valid between Jan. 5, 2004 and Jan. 2, 2005. Performance hang tags issued in 2003 will not be valid in calendar year 2004.

- **Lottery Parking will be suspended in 2004.** In light of the demands of Mars Exploration Rovers, Stardust, Space Infrared Telescope Facility and other projects—along with the associated influx of affiliates, partners, and visitors in the first part of 2004—an on-Lab parking lottery will be delayed and evaluated later in the calendar year. Current Lottery parking hang tags will expire in January 2004.

- **Employees who obtain the designation of Senior A will have been notified by their supervisor or manager between Sept. 22 and Oct. 10.** Newly designated Senior A's will be eligible to park on-Lab in unassigned spaces beginning Jan. 5, 2004. Hang tags will be issued by the Parking Office prior to the new year.

- **Employees who reach 25 years of continuous JPL service are eligible for on-Lab colored parking effective on their anniversary date.** Similarly, regular promotions to Principal, Manager I, and other qualifying positions are eligible for hang tags on the effective date of the promotion.

- **All other on-Lab parking eligibility criteria and special parking pass programs (Project, Expeditor, Special Visitor, Medical and Carpool) will remain unchanged.**

Special Events Calendar

Ongoing Support Groups

Alcoholics Anonymous—Meetings are available. Call the Employee Assistance Program at ext. 4-3680 for time and location.

Caregivers Support Group—Meets the first Thursday of the month at noon in Building 167-111 (The Wellness Place). For more information, call the Employee Assistance Program at ext. 4-3680.

Codependents Anonymous—Meeting at noon every Wednesday. Call Occupational Health Services at ext. 4-3319.

Gay, Lesbian and Bisexual Group—Meets the first Friday and third Thursday of the month at noon in Building 111-117. Call the Employee Assistance Program at ext. 4-3680 or Randy Herrera at ext. 3-0664.

Parents Group for Children With Special Needs—Meets the second Thursday of the month at noon in Building 167-111.

Working Parents Support Group—Meets the third Thursday of the month at noon in Building 167-111. For more information, call the Employee Assistance Program at ext. 4-3680.

Tuesday, October 14

JPL Stamp Club—Meeting at noon in Building 183-328.

"Remembering the Past, Imaging the Future: Diagnosing and Treating Alzheimer's Disease"—This free event will be held in Beckman Auditorium at 8 p.m. Panelists will present the latest innovations in imaging techniques for visualizing pathology in the brains of Alzheimer's patients. They will discuss how this will impact the diagnosis of Alzheimer's, present ideas for predicting Alzheimer's in presymptomatic individuals, and talk about the newest methods for treating this disorder and treatments on the horizon. For more information, call (626) 395-4652.

Wednesday, October 15

"Viruses, Viruses, Viruses"—Caltech president Dr. David Baltimore will deliver this free lecture at 8 p.m. in Beckman Auditorium. For more information, call (626) 395-4652.

Thursday, October 16

JPL Hiking+ Club—Nonmembers are invited to stop by the Building 301 patio at noon to discuss membership information.

NASA Honor Awards Ceremony—The annual event to honor JPL staff will be held from 9:30 to 11 a.m. in the mall.

TIAA/CREF Enrollment Meeting—This workshop, held at noon in T1720-137, is designed to assist employees newly

eligible for the Caltech/JPL retirement plan with selection of investment options and completion of enrollment forms.

Thu.-Fri., October 16-17

Von Kármán Lecture Series—JPL astrophysicist Dr. David Meier will present "Cosmic Jets: New Building Blocks of the Universe" at 7 p.m. Thursday in von Kármán Auditorium and Friday in Pasadena City College's Vosloh Forum, 1570 E. Colorado Blvd. Thursday's lecture will be webcast at <http://www.jpl.nasa.gov/events/lectures/oct03.html>.

Friday, October 17

Folk Music—Irish songstress Fil Campbell will appear at Caltech's Winnett Student Lounge at 8 p.m. Tickets are \$15 for adults and \$5 for children under 12. For more information, check the Caltech Folk Music Society site at www.folkmusic.caltech.edu.

Saturday, October 18

The Tweaksters—Two quirky artists explore the laws of physics, then seemingly smash them to bits in a mix of dance, juggling and aerobatics. Held at 2 p.m. in Caltech's Beckman Auditorium. Tickets are \$12 for adults, \$7 for youth. For more information, call (626) 395-4652.

Tuesday, October 21

"A Bayesian View of the Universe: From Massive Data Sets to Physical Understanding"—Dr. Jeff Jewell of the Planck Low-Frequency Instrument Data Analysis Team in Section 367's Data Understanding Systems Group will lecture at noon in the 167 conference room.

Investment Advice—Fidelity will offer one-on-one counseling in T1720-131. For an appointment, call (800) 642-7131.

"Looking Ahead To Retirement"—This workshop from noon to 2 p.m. in Building 180-101 is designed to help participants who are approaching retirement age examine their retirement expenses and income sources and provide strategies to help them close any gaps between the two. It also touches on distribution options during retirement.

Wednesday, October 22

JPL Toastmasters Club—Meeting at 5 p.m. in the 167 conference room. Call Debbie Llata at ext. 3-3690.

"Lies and the Lying Liars Who Tell Them . . . A Fair and Balanced Look at the Right"—Satirist and author Al Franken will read from his new book at 8 p.m. in Caltech's Beckman Auditorium. A book signing will follow. For more information, call (626) 395-4652.

2004 BENEFITS ENROLLMENT MEETINGS

Selecting the appropriate benefit coverage is an important decision. To learn more about your benefit options for 2004, please plan on attending at least one of the following meetings.

An Overview of 2004 Plan Changes

Monday, Oct. 20	3 to 5 p.m.	von Kármán Auditorium
Wednesday, Oct. 22	11 a.m. to 1 p.m.	von Kármán Auditorium
Tuesday, Oct. 28	11 a.m. to 1 p.m.	von Kármán Auditorium
	3 to 5 p.m.	von Kármán Auditorium

Understanding Health Net's Prescription Drug Program

Wednesday, Oct. 22	3 to 5 p.m.	von Kármán Auditorium
Thursday, Oct. 23	3 to 5 p.m.	von Kármán Auditorium
Tuesday, Oct. 28	1:30 to 3 p.m.	167 conference room
Wednesday, Oct. 29	9 to 11 a.m.	167 conference room
	1 to 3 p.m.	167 conference room

Health Net Transition of Care Informational Sessions

Friday, Oct. 24	3 to 5 p.m.	von Kármán Auditorium
Tuesday, Oct. 28	9 to 11 a.m.	167 conference room
Wednesday, Oct. 29	11 a.m. to 1 p.m.	167 conference room
	3 to 5 p.m.	167 conference room

Medical/Dental Plan Question/Answer Sessions

Thursday, Oct. 16	9:30 a.m. to 3 p.m.	Mall
Tuesday, Oct. 21	9:30 a.m. to 3 p.m.	Mall
Friday, Oct. 24	9:30 a.m. to 3 p.m.	Mall
Thursday, Oct. 30	9:30 a.m. to 3 p.m.	Mall

CloudSat radar shipped for integration

The CloudSat spacecraft's Cloud Profiling Radar has been shipped from JPL's Spacecraft Assembly Facility to Ball Aerospace in Boulder, Colo. Over the next several months Ball and JPL engineers will integrate the radar into the spacecraft, and a series of environmental tests will be conducted.

The Cloud Profiling Radar was developed by JPL with partnership and hardware contributions from the Canadian Space Agency. The High Power Assembly subsystem of the radar remains at JPL for thermal-vacuum testing. When this testing is satisfactorily completed later this year, the subsystem will be shipped to Ball, where it will be integrated into the Cloud Profiling Radar.

CloudSat, an Earth System Science Pathfinder mission that will launch in 2005, will study clouds in detail to better characterize the role they play in regulating the Earth's climate. CloudSat is a joint U.S./Canadian mission intended to provide a global survey of cloud properties. CloudSat data will lead to improved representation of clouds in weather and climate models, and should improve the accuracy of weather forecasts and climate predictions.

CloudSat will fly in on-orbit formation as part of the "A-Train," a constellation of six satellites in Earth orbit that will cross the equator within a few seconds to minutes of one another at around 1:30 p.m. local time.

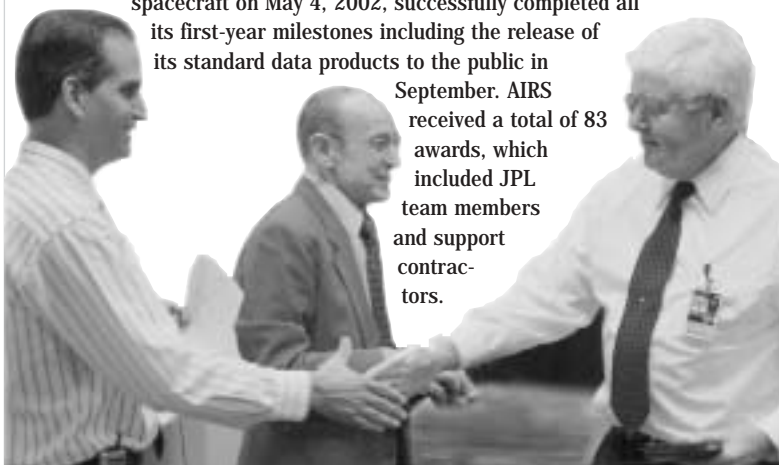


Bob Brown / JPL Photo Lab

Goddard honors JPL's AIRS team

NASA Goddard Space Flight Center recently honored members of JPL's Atmospheric Infrared Sounder (AIRS) team with group achievement awards for outstanding teamwork on the Earth Observing System Aqua mission.

AIRS, an atmospheric sounding system launched onboard the Aqua spacecraft on May 4, 2002, successfully completed all its first-year milestones including the release of its standard data products to the public in September. AIRS received a total of 83 awards, which included JPL team members and support contractors.



Fred O'Callaghan (right), former AIRS project manager and current program manager of the Astronomy and Fundamental Physics Experiments Program (720), receives his award from AIRS project manager Tom Pagano (left) and AIRS science team leader Dr. Mustafa Chahine

to courtesy of Sharon Okonek



Workshops underway agencywide

This article, one in a series that describes how NASA centers are realizing the One NASA goal, was provided by the Kennedy Space Center.



"I think One NASA is all about teamwork. Regardless if you're NASA badged or part of the contractor team, you're part of the NASA team," said Kennedy Space Center Director Jim Kennedy. With those words, Kennedy helped inaugurate the agency's One NASA leader-led workshops Aug. 20.

NASA is embarking on a cultural change emphasizing a strong commitment to teamwork, accessible tools and a greater collaboration across the agency. This forward-thinking leap, which also meets the President's Management Agenda goal to make government more efficient and effective, is known as One NASA.

Following the prior introduction of One NASA concepts, the need for workshops was overwhelmingly expressed in One NASA surveys. Employees sought to better understand the overall strategy and direction of the agency while grappling with their role in that strategy.

The resulting session objectives are to provide an overview of the strategy for the agency, outline accomplishments and future plans for enterprises and centers, highlight how all centers contribute to enterprise plans and agency vision and mission, provide examples of collaboration among enterprises and centers through real-life examples, and share information about various initiatives.

One of 38 One NASA actions was to broaden employees' knowledge of the agency's vision and the initiative, so in response KSC was selected to host the initiative's first leader-led workshops, which opened at the KSC Visitor Complex IMAX Theater. NASA leaders discussed how the agency vision relates to all employees' work objectives. This portion was also aired on NASA TV for those unable to attend.

Kennedy; James Jennings, NASA's associate deputy administrator for institutions and asset management; Ed Weiler, associate administrator for Space Science; Kevin Peterson, Dryden Flight Research Center director; incoming KSC Deputy Director Woodrow Whitlow; and implementation team lead Johnny Stephenson each explained their respective contributions to One NASA.

Stephenson emphasized, "One NASA allows us to accomplish more as a team than ever possible individually."

Breakout sessions provided detailed information about the progress of NASA's ongoing initiatives. Specifically, the gatherings focused on (1) project management; (2) return to flight; (3) President's Management Agenda/Full Cost Accounting; (4) human capital/NASA Shared Services Center; and (5) integrated planning.

Also, these workshops introduce key leaders outside of individuals' own enterprises while simultaneously emphasizing the level of cross-center collaboration underway within NASA. For example, Weiler shared his

knowledge of astronomy to explain to KSC's workforce that thinking out of the box may be difficult but often yields amazing results.

Kennedy, the new director of KSC, helped spearhead the program initially and he's incorporating those leadership ideals into his daily practices.

"Today is a very, very special day," he said. "When you leave here, I hope you feel you've learned a lot and had a chance to celebrate that we're a team."

Dr. Julian Earls presented a refreshing motivational speech during lunch as well. Earls, Glenn Research Center's incoming director, used humorous analogies to express constructive leadership concepts. For example, he explained how the "Tate Family" easily undermines an organization's goals. The notorious family members are Dic Tate, Agi Tate, Hesi Tate and Irri Tate.

"The true significance is not so much what happens here, but what happens when you leave here—because of what happened here," Earls said. "When spider webs unite they can contain a lion."

These activities are just the first of many like it that will prompt discussion and information sharing. Also, additional One NASA information can always be referenced at www.onenasa.nasa.gov.

The panel at the first One NASA workshop, held at the Kennedy Space Center.

JPL's 'One NASA' town hall set for Oct. 17

JPL will hold a One NASA town hall meeting on Friday Oct. 17, from 9 to 10:30 a.m. in von Kármán Auditorium. It will feature Dr. Ghassem Asrar, associate administrator of NASA's Office of Earth Science (Code Y); Johnny Stephenson, the One NASA team lead from NASA Headquarters; Jim Kennedy, director of Kennedy Space Center; and Dr. Charles Elachi, JPL's director. They will discuss how JPL is supporting the One NASA initiative.

The meeting will be followed by two breakout sessions from 10:30 to 11:30 a.m. One meeting, to be held in von Kármán Auditorium, will address the implication of Full Cost Accounting and Integrated Financial Management at JPL. The subject and location of the second breakout session is to be determined. Check the Daily Planet (<http://dailyplanet>) the week of Oct. 13 for more information.

All employees are encouraged to attend and participate in these events.

The Town Hall will be broadcast on the Daily Planet and on JPL TV monitors.

Left to right: Dr. Ghassem Asrar, Jim Kennedy, Johnny Stephenson.



Microthrust propulsion lab opens

By Rima Bedevian

The new Microthrust Propulsion Laboratory opened its doors on Sept. 15 to develop, evaluate and test microthrust propulsion technologies and microspacecraft systems, allowing JPL to become a leader in microthrust technology.

"We will face many challenges, and now we will have the tools to meet those challenges," said John Ziemer, a senior engineer in the Advanced Propulsion Technology Group (3534).

The 1,000-square-foot facility and test chamber, which are funded through JPL grants and loans, will initially be involved in the Laser Interferometer Space Antenna (LISA) Project, which will directly detect gravitational waves in space, and the Space Technology 7 Disturbance Reduction System

(ST7-DRS) Project, which is designed to validate and test advanced technologies for future use on NASA's missions that have never been flown in space.

The lab will also be used as part of NASA's Aerospace Technology Enterprise Program to test a miniature xenon ion thruster in the future.

The LISA and ST7-DRS missions, which require a drag-free operation with microthrusters opposing solar pressure, will challenge technology development and verification including performance, contamination and lifetime testing, while the miniature xenon ion thruster will enable the formation of flying control for space interferometers, explorers and probes.

Although the lab just opened, it's currently working on its first operation of the test chamber and will begin the testing of the microthruster next month.

Passings

MICHAEL SCHMELZEL of the Advanced Thermal and Structural Technology Group in Section 3542 died Sept. 8.

Schmelzel had worked at the Lab since 1989. He is survived by his wife JoAnn and sons Curtis, Matthew and Bryant. Funeral arrangements were private.

Letters

My father, surviving brothers, and sister wish to thank Division 33 and Section 336 for your heartfelt prayers, thoughts, kind words of support, and gift basket following the death of my youngest brother Mark. The gift basket was shared with the family and other guests at the celebration of life gathering following the memorial ceremony. Thank you again to all in our JPL family.

Anthony Mittskus

Dear JPL Family: We would like to express our appreciation and gratitude for the generous donations we have received to the Mike Schmelzel Memorial Fund as well as the beautiful plant arrangement. Having experienced such a great loss, we never could have imagined the support and love we have received from everyone at JPL. My children and I would like to thank all of you for the generosity and love you have given to our family through this terrible time; you will never know how much your support has meant to us.

Curtis, Matthew, Bryant and Joanne Schmelzel

I would like to extend a sincere "Thank You" to my friends, co-workers, and JPL/ERC for the beautiful plants, flowers, and cards; and, most of all for your support and thoughtfulness expressed on the recent passing of my father, Chet Swanson.

Terry Swanson

Retirees

The following JPL employees retired in October:

Dan Bathker, 40 years, Section 920; Richard Coffin, 37 years, Section 101; Moktar Salama, 33 years, Section 351; Allan Klump, 30 years, Section 341; Jack Mondt, 30 years, Section 346; Donald Ebbeler, 23 years, Section 311; Elma Reynolds, 23 years, Section 341; Jack Brock, 17 years, Section 366; Robert Hamell, 17 years, Section 335; Robert Glass, 14 years, Section 311J; Barnwell Legge, 13 years, Section 331.

Classifieds

For Sale

AIR CONDITIONER with heating unit, exc. cond., needs a 220 line, used until central air was installed, \$150/obo. 626/449-3699.
AIR COOLER, evaporative, horizontal and down discharge, used for approx. 5 years to cool an 1,800 sq. ft. home, \$200. 626/359-7668.
ANSWERING MACHINE, Panasonic KX-TM100B, digital, black, in box, \$10. 310/659-4388.
APPLIANCES: convention oven, nearly new, \$400; dishwasher, \$150; refrigerator, tan, \$150; wall oven, white, \$100; water heater, 50G, originally installed in '94, still has five years on warranty, \$400/obo. 352-0972.
AVIATION TRANSCIEVER, Narco 830 and charger, handheld, needs battery, \$50. 353-9367, evenings and weekends.
BACKPACK, children's, external frame, circa mid-70s, good cond., total frame height 27", shoulder strap height 19", pictures and

further details available, \$10. 249-4603.
BEDROOM SET, California King water bed, wave-less mattress; 6 drawer pedestal, 45" tall bookcase headboard with stained-glass lighted cabinets and stained-glass accent arch mirror; matching bedspread, nightstand and chest of drawers, 56" tall, both with stained-glass doors, \$1,100. 790-4028.
BIKES, 2 boys', 20", 6-spd., dual suspension, like new, \$50 each. 626/797-6982.
BIKE, 415 FSX BMX, very rugged construction, 4130 chrome frame, 20" wheels, Alex rims, 3-piece crank set, gyro for bar spins, exc. cond., original price \$430, sacrifice for \$210. 790-4028, Daryl.
BOOTS: Niccona lizard skin, western, blk., size 10 1/2, \$25; Justins, medium tan, sz. 10 1/2, \$20; TABLE TOP, oak, Victrola, 1916, \$400; FLOOR RADIO, Victor, hand crank, circa 1926, needs repair, \$200. 248-5282.
CAMPGROUND MEMBERSHIP at Ridgeview Resort RV, in Bullhead City, AZ, near Laughlin, shuttle service available to casinos, \$2,000. 626/335-7345.
CART/DESK, O'Sullivan model 61925, for computer, mobile, cherry veneer, exc. cond., bought for \$120, sell for best offer. 626/449-0997.
CHINA, Lenox, eternal and matching crystal sherbets and goblets, platinum rim, 5-piece service for 12 + meat platter, 2 vegetable bowls, gray boat, used once, some with labels, new, retail \$3,300, discount \$2,045, sell for \$950; DESKS & CHAIRS, Ethan Allen, like new, \$200 and maple, \$60; END TABLE, Ethan Allen, \$50; CHEST, Bombay, \$200. 790-5643.
COFFEE MAKER, Braun, 10-cups, white/black, like new, \$30/obo. 626/791-6101.
CORNINGWARE, in sealed boxes, \$10 per box; MILK CAN, tole painted, \$40. 626/449-3699.
DESK AND CHAIR, Trestle, matching, captain's writing style, solid maple, 44" x 25", with plate glass top, exc. cond., \$199. 626/791-9154.
DIGITAL CAMERA, Olympus Camedia C-5050, 5 megapixel, top rated by PC Magazine June 2003, retails for \$700 plus tax, lots of features plus great auto modes, brand new in box with all accessories and USA warranty, \$571. 310/659-4388, David.
DOG, Doberman puppy, male, very affectionate, needs attention & loving home, 9 mo. old, can't keep much longer. 909/945-5527.
DOG HOUSE, Dogloo XT, for small dog, up to 45 lbs., good cond., \$35. 626/303-1927.
DOG KENNEL, Petmate, VariKennel, size xlg., for full-size dog, 39" x 29" x 27", door is 23" x 19", door and side vents are chrome plated steel, basically brand new, used indoors for only about 3 weeks, pictures and further details available, \$100. 249-4603.
FURNITURE: baby crib, white, with mattress, \$99; dresser, white, \$49; bassinet, attachment for Trend Traveler playpen, \$10; office chairs, slate blue upholstery with oak arms, \$99; desk chair, matching blue high-back swivel, \$59; recliner, teal, \$49; porch chair, large, white, wicker, with arms, plus matching side table, \$29; bike. 626/798-4510.
HOCKEY TICKETS, Kings, two, season ticket holder selling individual games for lower bowl, \$100. 626/852-0821.
KITCHEN TABLE SET, oak, leaf and 6 upholstered chairs, \$125. 626/447-6423.
LAWNMOWER, Murray, 4.0 HP, runs well, \$50; BICYCLE, old Schwinn, 10 spd., \$10, can deliver locally. 952-2192, Tom.
MICROWAVE, Sharp, 1,200 watt, \$45. 661/296-3547.
MISC: ham radio home-brew transmitter & power supply, c. 1940, \$39; donut spare tire/wheel, (1105 80d-13, used once, \$39; massager, Shiatsu, fits in chair, \$39; wireless intercom set, \$39; 2 add-on seatbelt sets, \$25; golf ball retriever, telescoping aluminum 12", \$19; kid's rolling duffel bag, multicolor, never used, \$19; luggage set, Pierre Cardin, 3-piece, \$19; turntable with amp & speakers, \$15. 626/798-4510.
MOVING SALE: office desk, high-quality; computer desk with pullout table; desk with drawer, all 3 pieces \$90. 790-0815, after 5pm.
MOVING SALE: bookcase, all wood, holds TV, \$70; entertainment center, \$55; desks, \$35, \$20; recliner, sofa & love seat, \$600; queen size bed and mattress, wood, almost new, \$500; audio electronic equipments and misc. furnitures and lamps, \$5-\$15. 626/799-7593.
PIANO, Yamaha C3, grand, 6 ft., polished ebony, exc. cond., MSRP \$32,495, sacrifice for \$11,000. 790-3899.
PLAYHOUSE, Fisher Price, children's step 2, 4' by 5', great shape, \$75; swingset, w/2 gliders, 2 swings, padded legs and monkey bar, \$100. 626/447-6423.
PRINTER, COPIER & SCANNER, 3 in 1 Work Center XK35c, makes scanning or copying documents & books easy with a 30-bit color & 300 x 600 dpi resolution, scan function produces clear color scans & sharp text reproductions, includes color & black ink cartridge, \$50/obo. 909/518-0998.
SCANNER, Microtek Scan Maker X6EL, PC or Mac compatible, scans up to legal size plus photo slide or negative scanner, Photoshop 4.0 LE and OCR software, used only a few times, \$30. 626/303-1927.
TELEVISION, Magnavox 25" and 4 head VHS VCR with remote, \$75; TV, home theater model, RCA, 27" w/remote, \$100; STEREO, JVC, model HR-VP606U; VCR, VHS, w/remote, \$50. 790-3991, evenings, Dick Turner.
TV, Philips, model 14RF50S141, 2002, 14", with remote, exc. cond. \$150. 626/644-3796.
TREES, red banana plant, 5' tall, \$60/obo; fish

tail, 6' tall, \$80/obo; ficus, 10' tall, braided, in 30" plastic pot, \$250/obo; ceramic bowl, gray, 2' diameter with planted geraniums, \$40/obo. 626/791-6101.
WHEELCHAIR CARRIER, good cond., paid \$2,000, now \$750; hand controls, \$150; shower chair, \$20; walker, \$20. 626/968-6024.

Vehicles/Accessories

'86 BUICK Century, limited ed., V6 3.8-L eng., only 65K mi., passed smog Mar. '03, well maintained, \$1,300. 626/914-9695.
'95 FORD Taurus LX wagon, top-of-the-line, exc. cond., deep green/beige leather, moonroof, remote entry, cruise, pwr. seats, auto temp. control, 57K mi., \$6,250. 626/798-2925.
'02 HONDA Shadow Spirit 750, yellow, aftermarket rear light and turn signals, sissy bar, only 600 mi., must sell, 3 helmets included, \$5,200/obo. 626/791-5498, Joe.
'96 HONDA CBR 600 F3 motorcycle, 6,100 mi., exc. cond., white, red and black, never down, with matching helmet, thermal cover, tank bra and cargo net, \$4,100. 909/948-9942.
'95 HONDA Accord EX, 2 door coupe, 80K mi., blue-green, automatic, clean, loaded, exc. cond., \$8,300. 952-8455.
'89 HONDA Accord LX 4-door, 63K gentle mi., automatic, 1 owner, all records, excellent maint., silver w/maroon interior, no wrecks, air, power windows, am/fm/cass., \$3,300/obo. 626/797-6824 or 714/538-3763.
'93 JEEP Grand Cherokee Laredo, white, 4.0L, 6 cyl., 4wd, good cond., \$4,300. 957-8463.
'90 JEEP Cherokee 4WD, white, 2 door, 4.0L, 6 cyl., 5 spd., manual, ps/pb/tilt, a/c, roof rack, 145K mi., clean body, runs strong, \$3,100/obo. 648-4846, Mike.
'92 LEXUS ES-300, champagne, leather seats, sunroof, power everything, 107K mi., runs great, some cosmetic dings, \$5,500/obo. 310/659-4388.
'93 MERCEDES, E-300, 6 cyl., 3.0 L, auto, 133K mi., hunter green metallic exterior, cream leather interior, custom sound system, a/c, power windows, alarm, garage kept, owner has service records, vg cond., beautiful drive, \$7,500/obo. 626/797-6824.
'93 NISSAN 240SX, blk., 2 door w/hatchback, 146K mi., good cond., orig. owner, all records, \$2,700. 248-0258.
'92 PLYMOUTH Grand Voyager, charcoal gray, 3.3L, V6, good cond., runs well, \$1,850. 957-8463.
'98 TOYOTA Avalon, white, 4 door, a/c, CD, alarm, Lo-Jack, good cond., 91K mi., \$7,700. 626/319-5466.
'98 TOYOTA Celica GT, liftback, 2 door, white, grey cloth interior, 5-spd., manual, premium pkg., pwr. locks/windows/sunroof, tinted glass, alarm, exc. cond. and fun to drive, 57K mi., \$10,500. 662-5671, Brian.
'01 VOLVO S40, midnight blue/black, loaded, am/fm stereo/CD/cass., pwr. doors and windows, beautiful leather interior, 1 owner. 323/445-5342, Alex.
'00 VW Jetta, 1.8T turbo, blk. w/ blk. leather, 6 CD, moonroof, 5-spd., loaded, very clean, like new, serviced regularly, 56K mi., moving, must sell, \$12,000/obo. http://shard.servebeer.com/~iceman/jetta/jetta.html. 626/744-9941, night.
'89 WINDCRUISER Itasca, 32' class A motorhome, 22K mi., GMC 30 chassis, 454 w/Banks power pack, generator, queen bed island, 3-way appliances, 2 rooftop a/c, TV, VCR, antenna, connections for cable/satellite, back-up CCTV, leveling jacks, tire pressure warning system, hitch receiver, lots of storage, very clean, \$22,000. 626/335-7345.
'98 ZIEMAN trailer, commercial, single-axle, electric brakes, pwr. winch, torsion bar suspension, tilt bed, exc. cond., \$1,500/obo. 626/793-3393.

Free

BIKE, 10-spd., c. 1973, needs to be restored. 626/798-4510.
DOG, Licorice, to a good home, great dog, medium size, short blk. hair, virtually no shedding, was a stray, super loving, intelligent, great with children of all ages, has shots and is spayed, would make a great watch and companion dog, needs a backyard and love, will reclaim if it isn't a good fit. 957-0743, Karen.
FENDERS, for VW Bug, one front, one rear. 626/797-6982.

Wanted

FEMALE SINGER for garage band, avg. band age is 35, originals, classic/hard rock, Beatles, blues, reverb2020@yahoo.com.
GUITARIST, classical music, interested in playing duets. jfz@alumni.caltech.edu, Jim.
HOUSE KEEPER/BABYSITTER, part time, Mon. to Fri. 4-8 pm, must spk. English or Amharic, duties include cooking, light housekeeping, and baby-care, baby boy approx. 1 yr. old, references required, \$10/hr. 626/791-2035.
TUTOR for math, jr. & sr. high school level classes, geometry, algebra I/II, SAT math. 888/784-1639, David.
SPACE INFORMATION/memorabilia from U.S. & other countries, past & present, for personal use. 790-8523, Marc Rayman.
VANPOOL RIDERS, permanent & part-time seats avail. on vanpool #3, originating out of Fontana w/stops in Rancho Cucamonga and La Verne; arrive at 6:45, depart at 3:45; cost is \$140/mo. for permanent riders (\$90 after \$50 monthly subsidy for JPL employees), \$7/day for part-time. Rhea Clearwater, ext. 4-5831 or Mike Taylor, 4-8343.

VOLLEYBALL PLAYERS, co-ed, no beginners please; Tues. nights 8-10:00 at Eagle Rock High School; S/nt. 956-1744, Barbara.

For Rent

ALTADENA house, 3 bd., new paint inside and out, newly plumbed, carport, fireplace, water, gardner and trash pickup paid for, near JPL north of Woodbury & east of Lincoln, \$1,700. 323/871-1043, Kathleen.
ARROYO house, min. from JPL, charming 3 bd., with h/w floors, fireplace, cent. a/c & heating; spacious living & dining rooms + lg. detached rm.; beautifully landscaped front and back yards; incl. stove/oven, refrigerator; quiet & safe neighborhood; \$1,950. 760/451-8500.
LA CRESCENTA area, 1-bdrm. house, \$1,000. 248-3640.
PASADENA, Caltech roommate seeks non-smoking, cat-friendly roommate to share 2 bd., 2 ba. condo 3 blocks from Caltech; unfurn. bd. & ba.; central air/heat, fireplace, 3rd fl. north-facing balcony, laundry and parking; walking dist. to Old Town, Goldline metro & more; 6-mo. lease, \$1,000 + 1/2 gas and electric + \$1,000 security deposit. 626/833-2961, Jane.
PASADENA, spacious 2-story condo, 3 beds, 2.5 baths, prestigious community, beaut. inter., bright ktch., prof. landscape, ctrl. air & heat, close to shop., cozy LR w/F/P, end unit, frml DR, hdwd. flrs., immac. cond., close to schls. \$1,750. 626/396-9024.
PASADENA townhome-style apts., furn. & unfurn., 2 bd., 1.5 ba., patio, dishwasher, cent. a/c, new carpet & floors, refrigerator & stove, laundry, parking, close to Caltech & JPL. \$1,295-\$1,350 + util. 626/577-3060, ext. 14, Dennis.
PASADENA apt. to share w/JPLers, furnished, 3 bd., 3 ba., townhome-style, patio, central a/c, laundry, close to Caltech & JPL. \$650 + utilities. 626/577-3060 ext 14, Dennis.
PASADENA townhouse, lg., 3 bd., 2.5 ba., centr. air & heat, washer/dryer hookups, fireplace, walk to Goldline station, new carpet, linoleum, stove, covered parking, no smoking or pets, water & trash incl., \$1,800. 626/394-5946.
SIERRA MADRE townhouse-style apt. to share, 1,000 sq. ft., lg. patio, 2 bd., 1.5 ba., quiet street, garage parking, washer/dryer for this unit, \$605 + 1/2 util. 626/355-4838.
SUNLAND room in condo, fully furn., share kitchen/bath/laundry; garage parking, a/c, fireplace, pool, Jacz., tennis court; 10 mi./JPL, female preferred, non-smoking, \$500 incl. util., \$400 security deposit, references. 352-3112.
TUJUNGA duplex on cul-de-sac, lg., 2 bd., 1 ba., stove, front unit; new paint, carpet & a/c; approx. 15 min. to JPL, nicely landscaped, washer/dryer hookups, no pets, \$1,250. 352-4669.
WOODLAND HILLS, room in quiet home, separate bath and phone line, high-speed internet, kitchen and laundry privileges, non-smoking, utilities included, \$400. 710-7694.

Real Estate

ARKANSAS, Ozarks home, 4 bd., living rm., dining rm., deck w/lake view, fireplace, nr. lake w/fishing/boating/swimming, nr. golf course, home on 3 wooded lots, 30 min. from Branson, Mo., \$100,000/obo. 626/449-3699.

Vacation Rentals

BIG BEAR LAKEFRONT, lux. townhome, 2 decks, pool/spa, tennis, beautiful master bd. suite, slps. 6. 949/786-6548.
CABO SAN LUCAS, Valentine's wk. getaway, junior suite at Pueblo Bonito Resort, slps. 4, balcony w/panoramic vw. of Sea of Cortez, kitchenette, a/c, satellite TV, on white sand beach, lg. freeform pool w/island & waterfall, fitness ctr., 2 restaurants, deli, beauty shop, maid service, bilingual staff; 80 F ocean temp. \$800 for wk. of 2/09/04, www.pueblobonito.com. 626/296-8633, Todd.
COLORADO RIVER home in Ehrenberg, AZ, Redman, 1985 mobile, 14' w x 48' L (2 bd., 1 bath), full length (48') extra wide metal awning (14' + 2' bent poles for great access), 3/4 cement patio/driveway, Tuff Shed barn, 9' x 12', forced heating (a/c ready), 2 window a/c's & 1 swamp cooler, 10 minutes from Blythe, \$27,500/obo. 626/916-0665.
DEL MAR condo, fully furn., 7 nights, 11/15-11/22/03, sleeps 6, 2bd., 1 & 1/2 ba., living room, full kitchen, cable TV/VCR, game room, sauna, pool/spa, laundry room, BBQ area, walking to race track and beach, JPL discount. 626/961-8771.
HAWAII, Maui condo, NW coast, ocean front view, 25 ft. fr. surf, 1 bd. w/loft, complimentary furniture, phone, color TV, VCR, microwave, d/w, pool, priv. lanai, sleeps 4, laundry facility, low season rate \$105/nite/2, high-season rate \$120/nite/2, \$15/nite/add'l person. jackandrandy@cox.net or 949/348-8047.
MAMMOTH, Snowcreek, 2 bd., 2ba., +loft, slps. 6-8, fully equip'd kitchen incl. microwave, D/W, cable, VCR, phone, balcony w/mtn, vw., Jacz., sauna, streams, fishponds, close to Mammoth Creek, JPL disc'nt. 626/798-9222 or 626/794-0455 or valerie@gps.caltech.edu.
OCEANSIDE condo, fully furn, 2 bd., 2 ba., fireplace, full kitchen, quiet, relaxing, beautiful beachside setting; BBQ, pool, spa, game room, great ocean view; easy walk to pier & restaurants, slps. 8, avail. weekly or monthly. 909/981-7492, Darlene, or dfhauge@yahoo.com.
OCEANSIDE condo, on the sand, charming 1 bd., panoramic vw., walk to pier and harbor, pool/spa, game rm., slps. 4. 949/786-6548.
ROSARITO BEACH condo, 2 bd., 2 ba., ocean view, pool, tennis, short walk to beach, on private road., 18-hole golf course 6 mi. away, private, secure parking. 626/794-3906.

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universe

Jet Propulsion Laboratory

I n s i d e

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Lab hosts One NASA discussion

By Mark Whalen

JPL welcomed guests from throughout NASA Oct. 17 for a discussion of the One NASA initiative, a series of collaborative activities across the agency that will support all members of the NASA family.

Dr. Ghassem Asrar, manager of the agency's Earth Science Enterprise; Jim Kennedy, director of the Kennedy Space Center; and Johnny Stephenson, One NASA team lead from NASA Headquarters; joined JPL Director Dr. Charles Elachi for the town hall meeting and subsequent breakout session that covered the impact of NASA's Integrated Financial Management program and Full Cost Accounting at JPL.

"One NASA is not an end, it's a means to an end," Stephenson said. His hope is that in carrying out NASA's vision, employees embrace openness. "Sometimes the minority



From left, Johnny Stephenson, Dr. Ghassem Asrar, Dr. Charles Elachi and Jim Kennedy.

opinion has the best idea. Hopefully we don't get on a bandwagon and do something without hearing everyone."

Stephenson also called on employees "to provide the best capabilities, regardless of the geographic location" to accomplish a mission.

Asrar termed One NASA "A means by which we will assure we all pull together in the same direction." Clearly, the agency's goal is to continue the successful intercenter cooperation already underway.

"We have long employed our knowledge of Earth system properties to help us understand our neighbors in the solar system," Asrar said. "Optical, radar and laser technologies we have developed for Earth

sciences have been sent to other planets in our solar system; similarly, the technologies to study other planets are employed heavily in our Earth Observing System satellites."

Asrar praised JPL for leading NASA's efforts "to do for the oceans what we have done for the atmosphere," creating a capability to monitor the oceans and their role in the Earth's climate and water cycle.

Elachi also stressed the importance of interdependent work among the NASA centers. He thanked KSC staff for their assistance on launches of JPL missions, and also noted many of the Lab's ongoing collaborations with Goddard, Glenn, Ames, Langley and Marshall as solid evidence of One NASA at work.

"One NASA to me is simple: it just makes sense," Elachi said. "It is a spirit, an attitude, with which we approach our work with our 20,000 colleagues on the NASA team."

Another One NASA goal is the implementation of Full Cost Accounting throughout the agency. Owen Barwell, NASA Headquarters director of Full Cost Initiatives, provided a broad overview of the financial management system that allocates funds to flight projects.

JPL Associate Director and Chief Financial Officer Fred McNutt reviewed JPL's Full Cost Accounting system, which the Lab has utilized for years. It allows projects to budget, account for and manage all costs.

In support of the agency-wide effort, McNutt noted, a JPL team has recently conducted briefings on the Lab's financial business planning processes. The team, which includes McNutt along with Steve Proia, Jean Milbrandt and Diane Newmark of the Finance and Contract Management Division and Cory Stevens of the Project Business Management Division, has met with NASA Headquarters, Goddard, Ames, and Marshall, with a visit to Kennedy Space Center scheduled for late October.

"We fully support NASA's conversion to Full Cost Accounting," McNutt said. "At JPL, we can all be very proud of the accounting system we have here to identify project costs," McNutt said.

Photo by Richard Hasegawa / JPL Photolab

Study notes faster-melting glaciers

By Alan Buis

The Patagonia Icefields of Chile and Argentina, the largest non-Antarctic ice masses in the Southern Hemisphere, are thinning at an accelerating pace and now account for nearly 10 percent of global sea-level change from mountain glaciers, according to a new study by NASA and Chile's Centro de Estudios Cientificos.

JPL researcher Dr. Eric Rignot and two Chilean colleagues compared conventional topographic data from the 1970s and 1990s with data from JPL's Shuttle Radar Topography Mission, flown in February 2000. Their objective was to measure changes over time in the volumes of the 63 largest glaciers in the region.

Results of the study, published earlier this month in the journal Science, conclude the Patagonia Icefields lost ice at a rate equivalent to a sea level rise of 0.04 millimeters (0.0016 inches) per year during the period 1975 to 2000. This is equal to 9 percent of the total annual global sea-level rise from mountain glaciers, according to the 2001 Intergovernmental Panel on Climate Change Scientific Assessment. From 1995 to 2000, however, that rate of ice loss from the icefields more than doubled, to an equivalent sea level rise of 0.1 millimeters (0.004 inches) per year.

In comparison, Alaska's glaciers, which cover an area five times larger, account for about 30 percent of total annual global sea-level rise from mountain glaciers. So what's causing the increased Patagonia thinning?

Rignot and his colleagues concluded the answer is climate change, as evidenced by increased air temperatures and decreased precipitation over time. Still, those factors alone are not sufficient to explain the rapid thinning. The rest of the story appears to lie primarily in the unique dynamic response of the region's glaciers to climate change.

"The Patagonia Icefields are dominated by so-called 'calving' glaciers," Rignot said. "Such glaciers spawn icebergs into the ocean or lakes and have different dynamics from glaciers that end on land and melt at their front ends. Calving glaciers are more sensitive to climate change once pushed out of equilibrium, and make this region the fastest area of glacial retreat on Earth."

Rignot said scientists are particularly interested in studying how climate interacts with glaciers because it may be a good barometer of how the large ice sheets of Greenland and Antarctica will respond to future climate change.



Lucia Glacier, Southern Patagonia Icefield.



Photo courtesy of Jeff Osman and Shirley Wolf

A new Spanish dish

An Oct. 6 ceremony marked the completion of a new 34-meter antenna at the Deep Space Communication Complex in Madrid, Spain. JPL Director Dr. Charles Elachi and other guests from JPL and Ingenieria y Servicios Aeroespaciales, which manages the facility, participated in the ceremony.

The antenna and its associated electronics were scheduled to continue calibration and demonstration tracks through the end of the month. Routine operations are due to begin Nov. 1.

News Briefs



Tom Gavin

Gavin honored by AAS

THOMAS GAVIN, associate director of flight projects and mission success at JPL, is being honored as a fellow of the American Astronautical Society.

Gavin will receive the prestigious award at the society's national conference in Houston on Nov. 19. He is being recognized for his many unique contributions to astronautics during his 40-year career at JPL. "I owe this honor to the hard work of all the engineers at JPL who work on the flight projects," Gavin said.

Gavin has served in his current position since May 2001. Since joining JPL in 1962, he has held a variety of engineering and management positions, including mission assurance manager for Voyager and Galileo, spacecraft system manager for Cassini and deputy director for space and Earth science programs. Prior to his current assignment, he was the director for space science flight projects.

Lab supports space conference

More than 50 JPL personnel attended the three-day Space 2003 Conference and Exposition held last month in Long Beach. The event was organized by the American Institute of Aeronautics and Astronautics.

JPL Director DR. CHARLES ELACHI represented NASA at the conference and was joined by the directors of NASA's Ames, Goddard and Johnson centers, and NASA Headquarters representatives. Deputy Director EUGENE TATTINI participated in panels on education and on what's next in the utilization of space.

Overall, the conference was attended by about 1,000 people from the Department of Defense, industry, NASA and others. JPL will also participate in next year's conference, to be held in September in San Diego.

Order office amenities online

It's now easier for JPL customers to order office amenities and services thanks to a new online service center.

The Office Amenities and Services service center is available in the NBS toolkit under "Order Services" at <https://nbs.jpl.nasa.gov/login> and through the help desk at ext. 4-9895. Requests for such work as systems furniture installation, mounting computer keyboards at workstations, repair of systems furniture, and hanging white boards, posters, pictures, and signs inside offices will now be provided by Systechs, via the new online service center. Systechs will also provide seismic anchoring of wall cabinets and bookshelves. These services were previously provided by Jacobs Engineering.

The changeover was made during the recent transition of maintenance and operations services from Jacobs Engineering to All Star Corp. All Star will continue to provide maintenance services such as setting and changing workspace temperatures, ventilation problems, replacing burned-out lamps, office cleaning and trash pick up, plumbing problems, etc.

The new online service center promises more efficiency, less paper-

work and cost savings over previous methods used to order such services. Areas such as Procurement, Facilities, and Accounts Payable will also benefit.

Requests for engineering and design of all new construction and remodel work, to add or modify existing HVAC, plumbing, and electrical systems, office painting, carpentry services, replacement of carpeting or flooring, moving heavy equipment, and locksmith services should still be input to the original Facilities Services service center.

Flying Club offers membership meeting

The fall membership meeting of the JPL/Caltech Flying Club will be held Oct. 30, at Caltech, 201 E. Bridge at 7 p.m. Speaker for the meeting will be Major COLIN MILLER, an F-22 test pilot based at Edwards Air Force Base, who will give a presentation on his experiences as a test pilot in the plane.

Members and guests are welcome, especially those who may be interested in learning to fly or becoming a member of the club.

Another item of note for pilots, prospective pilots, and others interested in aviation is an Air Fair, to be held Nov. 8-9 at El Monte Airport from 9 a.m. to 5 p.m.

For more information, call BOB FERBER at ext. 4-3463.

Volleyball, anyone?

The Caltech Volleyball Club invites competitive players from the Caltech/JPL community to come out for the 2003-04 season. Men's and women's teams are being organized.

Interested individuals should be able to demonstrate proficiency in all primary volleyball skills; position players will be given preference. To sign up, contact DANIEL LOO at (626) 395-3203 or at Daniel.Loo@caltech.edu.

Mentors sought for video contest

NASA's Langley Research Center is sponsoring a video competition for K-12 students and seeks volunteer mentors for the student teams. The mentoring can be done by e-mail.

The NASA Center for Distance Learning, in cooperation with Christopher Newport University and the Institute of Electrical and Electronic Engineers, have created the VINNY™ award, named in honor of Leonardo da Vinci, a man famous for the creative use of science, technology, engineering, and mathematics to solve human problems. The contest was designed to help heighten and increase awareness of science, technology, engineering, and mathematics (STEM).

Teams made up of one teacher and three students will identify and research a global problem and discover ways that STEM can help solve it. Teams will combine skills in research, writing and creativity.

Entries will be accepted in English or Spanish. Winning one-minute videos will be exhibited on the NASA's Kids Science News Network at <http://ksnn.larc.nasa.gov>.

Anyone interested in being a mentor must register by Oct. 31 at <http://vinny.pcs.cnu.edu>.

Special Events Calendar

Ongoing Support Groups

Alcoholics Anonymous—Meetings are available. Call the Employee Assistance Program at ext. 4-3680 for time and location.

Caregivers Support Group—Meets the first Thursday of the month at noon in Building 167-111 (The Wellness Place). For more information, call the Employee Assistance Program at ext. 4-3680.

Codependents Anonymous—Meeting at noon every Wednesday. Call Occupational Health Services at ext. 4-3319.

Gay, Lesbian and Bisexual Group—Meets the first Friday and third Thursday of the month at noon in Building 111-117. Call the Employee Assistance Program at ext. 4-3680 or Randy Herrera at ext. 3-0664.

Parents Group for Children With Special Needs—Meets the second Thursday of the month at noon in the Wellness Place, Building 167-111.

Working Parents Support Group—Meets the third Thursday of the month at noon in Building 167-111. For more information, call the Employee Assistance Program at ext. 4-3680.

Saturday, October 25

Caltech Ballroom Dance Club—The midterm Halloween Party will be held in Winnett Lounge from 8 p.m. until midnight. Costumes are optional. Free admission. Dancing, fun and games and refreshments will be offered.

Flying Leap Players—This group creates the feel of live radio programming from the 1940s and '50s, and will perform at 8 p.m. in Caltech's Beckman Auditorium. Tickets are \$22, \$18 and \$14; high school age and younger, \$10. For more information, call (626) 395-4652.

Wednesday, October 29

Volunteer Professionals for Medical Advancement—Meeting at 10:30 a.m. at the Caltech Credit Union, 528 Foothill Blvd., La Cañada.

Thursday, October 30

JPL Golf Club—Meeting at noon in Building 306-302.

JPL Stories—Richard Shope, research analyst in the Science Research & Analysis Office, will present "From Outreach to Up-reach: My Space Science Adventures at JPL and NASA" at 4 p.m. in the Library, Building 111-104. Come hear about a metamorphosis from mime to education and outreach and then to science research. If you have questions about the story series or wish to participate, call Teresa Bailey at ext. 4-9233.

Fri., Oct. 31—Sun., Nov. 2

"Sweeney Todd"—The C.G. Bond melodrama will be performed by Theater

Arts at Caltech in Ramo Auditorium at 8 p.m. Friday and Saturday, 2 p.m. Sunday. Tickets are \$10 for JPL staff, \$5 for students. For more information, call (626) 395-4652.

Tuesday, November 4

JPL Gamers Club—Meeting at noon in Building 301-227.

JPL Genealogy Club—Meeting at noon in Building 301-271.

The Kennedys: America's Emerald Kings—Thomas Maier will discuss his new book at 8 p.m. in Caltech's Beckman Auditorium. Free admission. A book signing will follow. For more information, call (626) 395-4652.

Tues.-Wed., Nov. 4-5

"Macbeth"—JPL employees, retirees and family members are invited to audition for the Theater Arts at Caltech production of Shakespeare's classic. Auditions will be held in Caltech's Ramo Auditorium at 7:30 p.m., and will also be held Nov. 8 at 1:30 p.m. See <http://tacit.caltech.edu> for related information as it becomes available. The play will be performed during winter term on three consecutive weekends beginning Feb. 20.

Wednesday, November 5

Associated Retirees of JPL/Caltech—Meeting at 10 a.m. at the Caltech Credit Union, 528 Foothill Blvd., La Cañada.

"From PCs to Petaflops: The Future of Really Big Computers"—Thomas Sterling, visiting associate in the Center for Advanced Computing Research at Caltech, will deliver this free lecture at 8 p.m. in Beckman Auditorium. For more information, call (626) 395-4652.

Thursday, November 6

Caltech Women's Club—A Welcoming Coffee will be held from 11:30 a.m. to 1 p.m. in von Kármán Auditorium. For more information, call Carol Anderson at (818) 790-8175.

JPL Gun Club—Meeting at noon in Building 183-328.

Tues.-Wed., Nov. 11-12

Blood Drive—Held in von Kármán Auditorium Tuesday from 10 a.m. to 4 p.m. and Wednesday from 7 a.m. to 1 p.m. Sign up at the Occupational Health Services home page at http://eis/medical/blood_form.html or at the Red Cross site (<http://www.givelife.org>) that provides an automated e-mail reminder for your appointment. Click on "login," then "make appointment," then enter your e-mail address, birthdate and the sponsor code "JPL." Advance signups are available at Occupational Health Services, Building 310-202, prior to the blood drive. For last-minute signups, or to change your appointment, call the Red Cross at 626-960-6956, ext. 225.

JPLer re-enlists in Reserves

By Susan Braunheim-Kalogerakos

JPL Deputy Director Lt. Gen. Eugene Tattini, left, congratulates Eugene Ramos after swearing him in as a U.S. Air Force Reservist.

Deputy Lab Director General Eugene Tattini administered an oath of re-enlistment to JPLer and Air Force Technical Sergeant Eugene Ramos on Oct. 9.

Ramos asked Tattini to administer the oath because "anyone who has attained the rank of general has shown tremendous dedication to service for our country and thus deserves my utmost respect," Ramos said. "To have General Tattini, a JPLer like myself, conduct this event was simply wonderful."

General Tattini was glad to do it. "Although I've done this many dozens of times, I always consider it an honor to be asked to conduct a re-enlistment and to administer the oath," he said.

For the last 16 years Ramos has served as an Air Force Systems Administrator, similar to his job in JPL's Flight System Testbed. The first 10 of these years were served on active duty. He has been at JPL for almost four years.

Ramos decided to re-enlist because he wasn't ready to completely give up the military way of life. "After all, the Air Force

provided me with excellent training during the years I was on active duty, so this is my way of expressing loyalty and gratitude, being in the Reserves," he said.

The event took place in the Flight System Testbed near Ramos' office. Ramos' wife, Chie, and his sons Christian, 11, and Marc Eugene, 8, attended the ceremony along with many of his co-workers.

"As a member of the Air Force Reserve, Technical Sergeant Ramos is a citizen soldier who must balance his time between his family obligations, his JPL job and his military duties," Tattini said. "You really have to be committed to your country to do this. I thought it was marvelous that his family could attend and that his entire section turned out to participate in the ceremony."

"I am committing myself for another six years of service knowing very well what can happen in the world we live in today," Ramos said. "I have taken this oath four times in my military career and this time was by far the best because I did it in front of my family, friends and co-workers."

For the next six years Ramos will report to the 146th Airlift Wing in Port Hueneme on the first weekend of every month. For two weeks a year, he will report to Camp Smith in Hawaii.



Dutch Slager / JPL Photo Lab

A toast to BETTER COMMUNICATIONS

Toastmasters helps JPLers speak with more confidence

By Debbi Dachinger-Llata

A magazine poll once revealed the three greatest fears of Americans: death was third on the list and cancer second. The most overwhelming fear of all was public speaking.

Most people get nervous before performing in public, although public presentation offers opportunities for personal transformation and fulfillment. It is an essential element of many jobs, and in our personal lives we may be called upon to speak in front of others. So, how can we relax our fears and improve our speaking skills? A Toastmasters International Club meeting provides the answers.

The skills learned in Toastmasters are in demand in all aspects of our lives, and can be applied directly to one's workplace. Toastmasters International uses time-tested programs that are continually updated to meet each participant's needs. Self-paced programs allow you to progress as rapidly or gradually as your needs dictate. Toastmasters Club members learn to communicate in ways that enhance success in whatever life path they've chosen. A Toastmaster learns to be a better listener, easily lead teams and conduct meetings, and give and receive constructive evaluations. Toastmasters offers the opportunity to learn and practice the arts of speaking and leadership in a supportive environment.

Clubs are active in approximately 80 countries worldwide. They are inexpensive, personal improvement classes that build confidence and make one a better speaker over time. New members are advised to "stick with it," because every meeting is empowering. Working through the Toastmaster workbook gives participants continuous speaking and speech crafting experience. Many committed members become leaders or achieve advanced certificates.

JPL has its own Toastmasters Club. H. Al Richardson, who had a 31-year career at JPL (1942-1973), started the club at JPL in 1968 and has held a membership ever since. The octogenarian still attends on-Lab meetings and is a great mentor and contributor.

"The number one fear on the planet is public speaking, which means, if there was a funeral, most people would rather be in the casket than give the eulogy." —Jerry Seinfeld

"Toastmasters has increased my self-confidence, and has provided training and management skill experience applicable to other organizations," said Richardson, who currently serves as the club treasurer. "Learning effective people skills is paramount to successful leadership. My Toastmasters experience has involved speech communications, competitive speaking, training leaders, and serving in senior leadership positions."

Jim Raney, a mechanical systems technician in Section 387, found out about Toastmasters through Ken Broda, a NASA pilot and Toastmasters member, when Raney owned up to the fear of speaking in front of an audience. After Raney's fourth meeting, he noticed a marked change in his self-confidence and comfort level. Raney, who wouldn't even take speech classes in college, no longer carries the fear; he has been participating in Toastmasters since 1995 and now speaks enthusiastically to groups of people, while clearly enjoying himself.

Xiaochun (Adam) Wang, a JPL/Caltech

post-doctoral scholar, joined the club in 1997. English is his second language, and public speaking presented a great challenge. As a foreign student, he found the meetings to be positive and encouraging, enhancing his ability to learn American culture and share his Chinese culture. "When my manager promoted me to a supervisory position," said Wang, "he gave me a 'quick tips' book for new managers. In the chapter on communication, one of the tips recommended joining a Toastmasters Club, so I did."

Tyrone Little of the Finance and Contract Management Division joined Toastmasters due to nervousness about speaking up at meetings and social gatherings. "I would just sit quietly for fear that what I'd say might sound silly," he said. "Now if I have something to say I speak up. The important thing is that I'm communicating. I'm able to focus on the topic being discussed and not on the possible criticism. This breakthrough has helped me professionally and personally."

"Since joining Toastmasters, I have grown and overcome my fears to the point of volunteering as the master of ceremonies for different functions," said the current president of JPL's Toastmasters Club, Joy Hodges, who serves as the Space Interferometry Mission project administrator. "I recently gave a eulogy at a friend's funeral, which I would never have done before."

The typical meeting includes a session where impromptu speeches are given, with another for prepared speeches, usually five to seven minutes long, given by several members on specific subjects. Members also improve their skills through immediate peer evaluation on speakers' strengths and suggestions on areas for improvement.

Roger Carlson, a technical editor in Documentation, has attended Toastmasters for two years. "Documentation is often the Rodney Dangerfield of any major undertaking – it gets no respect," he said. "I now offer better presentations, resolve issues, highlight strong points and avoid embarrassment from missing key points. I now communicate more directly and succinctly."

Since Toastmasters began in 1924, more than 3 million members have benefited from the organization's communication and leadership programs. The Caltech/JPL Toastmasters Club is a successful group with twice-monthly meetings. Besides hearing and presenting impromptu talks and prepared speeches, members leave the meetings with constructive lessons and new confidence levels.

Each member works on public speaking skills at an individual pace. In the warm atmosphere of a Toastmasters Club, participants develop assertiveness, learn to motivate fellow workers, and build new and lasting friendships.

For more information about the club, visit <http://www.jplcaltechoastmasters.com>

JPL Clubs

One in an occasional series

The JPL/Caltech Toastmasters Club meets the second and fourth Wednesday evenings of each month in the 167 conference room. Social time and dinner at 5 p.m. precede the meeting's beginning at 5:30. Meetings conclude at approximately 7:30. Anyone can attend a meeting as a guest at first. Non-JPL employees should contact Debbi Dachinger-Llata, vice president of membership, at ext. 3-3690, to arrange paperwork for the day(s) of your attendance.

Members of the Caltech/JPL Club attended a recent Humorous Speech Contest. From left to right, front row: H. Al Richardson, Tyrone Little, Taher Daud, Roger Carlson, Joy Hodges, and Debbi Dachinger-Llata; back row: Bill Lear, Ross Jones, Jim Raney.



Enroll for benefits by Oct. 31

The annual enrollment period for active employees continues through Oct. 31. Retiree enrollment will be held Nov. 3-21.

The JPL Benefits Office suggests that at a minimum, employees should:

- Review their dependent data online at <http://nbs.jpl.nasa.gov>.
- Review their primary care provider data on the "Employee & Dependent Form" of the annual enrollment web site if currently enrolled in the CIGNA or California Care health maintenance organization.
- Re-enroll in a Health Care or Dependent Care Spending account for 2004.

For questions regarding annual enrollment, call the Benefits Office at ext. 4-3760.

To assist employees in enrolling, the following briefings have been scheduled:

OCT. 28		
9 to 11 a.m.	167 conference room	Health Net Transition of Care
11 a.m. to 1 p.m.	von Kármán	An Overview of 2004 Plan Changes
3 to 5 p.m.	von Kármán	An Overview of 2004 Plan Changes
1:30 to 3 p.m.	167 conference room	Understanding Health Net's RX Program
OCT. 29		
9 to 11 a.m.	167 conference room	Understanding Health Net's RX Program
11 a.m. to 1 p.m.	167 conference room	Health Net Transition of Care
1 to 3 p.m.	167 conference room	Understanding Health Net's RX Program
3 to 5 p.m.	167 conference room	Health Net Transition of Care
OCT. 30		
9:30 a.m. to 3 p.m.	Mall	Medical/Dental questions and answers

Passings

ERNEST ALDOUS, 81, retired from Section 356, died Sept. 13.

Aldous worked at the Lab from 1966-86. He is survived by son Dave Aldous, stepdaughter Sandra, grandchildren Eric and Michelle Aldous, brother Harold and sister Mary Woods.

Memorial services were held Sept. 20 at Plymouth Village in Redlands.

Letters

I would like to express my appreciation and gratitude for the generous donation I received for my brother and also my son who passed away Nov. 2001.

Having experienced such a great loss, I never could have imagined the support and love I received from everyone at JPL. I would like to thank my friends, co-workers and JPL for the beautiful flowers.

Linda Love and family

With gratitude: Many thanks to my friends and colleagues offering their comfort and understanding at the untimely passing of my father-in-law and friend, world-renowned railroad photographer Herbert H. Johnson. Times like this are never easy; having friends like you makes it easier.

Karl Strauss, Section 344

Classifieds

For Sale

ARTWORK, C M Russell "Comming Thru The Rye," 350 lb., 26" x 29" x 21," signed bronze on marble base. \$3,200/obo. 248-8030.

BABY ITEMS: crib, wood, made in Italy, incl. height adjustable mattress, exc. cond. \$150/obo; car seat by Century, front-facing, up to 40 lbs., gd. cond., \$25/obo. 626/791-6101.

BASEBALL TRAINING NET, exc. cond., was \$120, now \$50. 626/850-4378.

BASKETBALL BACKBOARD, portable, good cond., \$65. 626/289-8799.

BUNK BEDS, twin on top, queen on bottom, cobalt blue metal frame, mattresses included, exc. cond., \$200 firm. 626/289 8799.

CART for computer or TV, 37.5" w x 29.5" h x 19.5" d, oak, 2 slide-out shelves, casters, good cond., \$60/obo. 952-1303.

CART/DESK for computer, O'Sullivan model 61925, mobile, cherry veneer, exc. cond., bought for \$120, sell for best offer. 626/449-0997.

CHAIRS (2), upholstered tub-style by RB Furniture, \$25/each; TYPEWRITER, Smith-Corona electric portable, w/spell-check, \$25; CARD TABLE, Samsonite metal, \$10; all in excellent condition. 240-8384.

CHEST, Bombay, brand new, 3-drawer, med. wood, curved front & legs, very faint flowers on front, can't use or return due to 24 hr. store return policy, pd. \$380, sell for \$300/obo. 249-0573.

CHINA CABINET & BUFFET, oak wood, in excellent condition, \$550/obo. 957-8463.

CONCERT TICKETS, 2, L.A. Philharmonic; Nov. 1, 8 p.m.; Walt Disney Concert Hall; Mahler: Symph. #2, Resurrection; \$35 ea.; Terrace Vw., Row A, 251-252. 626/564-1654, Heather.

CRIB, Jenny Lind by Evenflo, oak finish, 4-position mattress height, easy-access drop side, rolling casters, Target sells new \$110 w/o mattress, selling used, vg cond., including mattress for only \$50. 661/254-7366, Betsy.

DIAMOND CHIP RING, ladies 10YG, with gift box, \$90; CELL PHONE, Nokia 5190 with car charger and Body Glove cover, \$25; VIDEO GAME, Gameboy, color, w/backup charger and Pokemon, silver. \$50/obo. 897-1203, Valerie.

DINING TABLE, solid oak "Wambold," with 4 chairs (modern styling), 84" L x 42" W x 29" H, \$599; AUDIO/VIDEO CABINET, oak, with dual glass doors 48" L x 17" W x 32" H, \$199. 661/287-1514.

DINING TABLE & CHAIRS, seats 10, beveled glass top, 10 black lacquered chairs, excellent condition. \$450/obo. 957-8463.

DRYER, GE gas, exc. cond., large capacity, front loader, 2 years old with low amount of usage; need to sell, new house has electrical connections, \$175/obo. 626/568-3310.

DRYER, GE, heavy duty extra large capacity, five-cycle automatic, vg cond., \$120; COUCH, beautiful 94" long white satin, exc. cond., like new, \$250. 545-0455.

ENCYCLOPEDIA, Britannica, complete set, publ. 1971, exc. cond., \$45. 626/850-4378.

GUITAR, Martin, classical, backpacker/travel,

solid-spruce, nylon-string, 1 yr. old, exc. cond., w/padded case, \$100/obo. 626/797-3196.

GUITAR, Yamaha EG112C, electric, blk., exc. cond., less than a year old, includes gig-bag, strap and whammy bar, \$150. 249-2420.

HOCKEY TICKETS (2), Kings, season ticket holder selling individual games for lower bowl, \$100. 626/852-0821.

KEY BLANKS, Kawasaki ZR-7, \$12 each. 626/355-1209.

MOVING SALE: Sanyo refrigerator, \$150; 8" futon mattress & wooden frame, \$150; wooden dining set with 4 chairs, \$60; misc. kitchen & microwave rack, \$25; vacuum, \$30; 4-pc. all-purpose pot, \$10; ceramic steam pot, \$25; \$4 items: toaster oven, mirror (13" x 49"), Vicks vaporizer, garment rack, iron board. 626/405-1539.

MOVING SALE: queen mattress (S50) single (S25) futon (Ikea, couch/2-p-bed, 1 y.o., \$150); desk (S50), PC (S200), TV (S20), shelves (Ikea, wood, 6 m.o., 3.5 x 2 x 6 ft., \$50), refrigerator (S75), din. table (S25), chairs (Ikea, 4 for \$20), lamps, cooking util., dishes. 957-2437.

MOVING SALE: small refrig., Sanyo, 4.3 cu. ft. \$100; 15" TV \$30; VCR \$25; floor lamp \$20; table lamp \$10; phone incl. message recorder \$15; everything 1.5 yrs old. 626/577-4957.

MOVING SALE: dining table, cherry veneer w/6 chairs, \$400; kitchen table + 4 chairs, \$100; sm. refrig., 7 cu ft., \$80. 310/795-8949, Mauro.

MOVING SALE: queen mattress w/spring box & frame, \$150; stereo, Aiwa, w/4 speakers; \$60; fan heater w/humidifier system, \$25; scanner, HP, \$40; computer desk, \$25; blen-der, \$10; bookshelf, \$8; entertaining center, \$8; standing fan, \$10; water filtration pitcher with 2 filters, Brita, never been used, \$18. 626/405-1539.

MOVING SALE: meticulous owner moving to NYC: Stuffed chair, 2-drawer wood file w/desk extension, ironing board; color TV, JVC 13," 18.7 cu.ft. side-by-side GE refrig.; Ikea TV stand; Ikea floor lamp; desk chair; Eureka Whirlwind Hepa upright vacuum; ankle weights; drinking glasses; floral dish set, Braun handheld mixer/combo; Black & Decker Scum-Buster; metal clothes drying rack; 30 x 50" beige rug; various kitchen utensils. E-mail thobedk@hotmail.com for pictures/prices.

PIANO, good cond., \$200/obo. 626/287-1025.

PIANO, Yamaha C3 grand, 6 ft., polished ebony, exc. cond., MSRP \$32,495, sacrifice, \$11,000. 790-3899.

POOL FILTER GRIDS, will fit 60' x 60' Titan filter, used, \$175. 661/645-0248, Joe.

STROLLER for baby, Aprica, teal green, exc. cond., was \$299, now \$100. 626/850-4378.

TREADMILL, Trainium by DP, personalized workout, incline control, programmable speed, stop key/safety switch, air-step cushion deck, calorie count, \$200; COFFEE TABLE FRAME, cast iron, dark brown, 4' x 4', needs glass, \$50. 244-8822.

TREES, red banana plant, 5' tall, \$60/obo; fish tail, 6' tall, \$80/obo; ficus, 10' tall, braided, in 30" plastic pot, \$250/obo; CERAMIC BOWL, gray, 2" diameter with planted geraniums, \$40/obo. 626/791-6101.

VACUUM, Hoover SteamVac V2 carpet cleaner, only used once, \$150. 626/578-9720.

Washing machine, Hoover SteamVac V2 carpet cleaner, only used once, \$150. 626/578-9720.

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cassette, alloy wheels, new tires 14K, free rotation contract, 1 owner, zero accidents, vg cond., \$1,800/obo. 626/969-3479.

'84 HONDA CRX, 5-spd, blue, 124K mi., runs great, new tires, replaceable sun cracked fender, no a/c. \$700. 653-9506.

LORINSER wheels for Mercedes, 16" x 8", chrome plated, w/225/60R16 tires & lug bolts, 4 wheels, \$95/ea. 517-2016, after 5 pm.

'93 MERCEDES E-300, 6 cyl., 3.0 L, auto, 133K mi., hunter green metallic exterior, cream leather interior, custom sound system, a/c, power windows/alarm, garage kept, owner has service records, vg cond., beautiful drive, \$7,500/obo. 626/797-6824.

'93 MERCEDES 190E 2.6, 83,000, dark green w/tan interior, 4-dr. sedan, automatic, power steering/locks/windows/seats, sun & moonroof, am/fm stereo tape w/5-disc CD changer, new tires, great cond., luxurious and sturdy car, \$8,600. thobedk@hotmail.com for picture.

'95 NISSAN Quest GXE minivan, 1 owner, clean, exc. cond., gold color, moonroof, alloy wheels, ABS brakes, dual a/c, keyless entry, 76K mi., registration pd. till next Sept., \$7,200/obo. 626/524-5396, David.

'93 NISSAN 240SX, black, 2 dr. w/hatchback, 146K mi., good cond., orig. owner, all records, \$2,700. 248-0258.

'71 OLDSMOBILE Cutlass Supreme, fresh 350 with cam/intake/carb/exhaust, new transmission, B&M floor shifter, mag. wheels, clean, \$10,000/obo. 807-7718, Mike.

'97 SAAB 900SE, convertible turbo, blk., tan leather int., 4 cyl., auto, a/c, cruise, am/fm, cassette, CD changer, pwr. steering/windows/locks, dual power seats, heated seats, dual air bags, 89K mi., \$13,500. 408/981-9020.

'87 SUZUKI Samauri, 4wd, 110K mi., red w/white soft top, nice, clean, well-maintained, mostly kept inside, would be ideal for towing behind motor home, \$2,100. 993-3399.

TIRES (4), Goodyear Eagle P285 60R16, w/Am racing rims, 6-lug, \$400/obo. 897-1203.

'02 TOYOTA Highlander, limited, 29,700 mi., moonroof, loaded, CD player, dark blue, exc. cond., \$19,750. 909/599-3230.

'82 TOYOTA Celica GT liftback, clean title, auto, white exterior w/blue side stripes, blue interior, power steering/brakes/side mirrors, tint, cass/radio, factory alloy wheels, good tires & battery, alarm, recently serviced trans, registered tags till 5/04, vg cond., strong 2.4L engine & trans @ 167.5K mi., great town car, \$1,900/obo. 626/358-7705.

UNLOADER, 18HP Case 1816 "skidsteer" with role over cage, electric starter, 20-gal. gas tank, 36" bucket, brush fork, excavation teeth, shop manual, spare hydraulic motors & parts, air filters, needs new tires and snow chains, starts good, \$2,000/obo. 248-8030.

'02 VOLOCI electric bike, 30 mph, 25-mile range, 1 yr old, 79 lbs, \$2,100/obo. 550-7555.

'00 VW Jetta, 1.8T turbo, blk w/ blk leather, 6 CD, moon roof, 5-spd, loaded, very clean, like new, serviced regularly, 56K mi., moving, must sell ASAP, \$12,000/obo. <http://shard.servebeer.com/~iceman/jetta/jetta.html>. 626/744-9941.

'02 TOYOTA Celica GT liftback, clean title, auto, white exterior w/blue side stripes, blue interior, power steering/brakes/side mirrors, tint, cass/radio, factory alloy wheels, good tires & battery, alarm, recently serviced trans, registered tags till 5/04, vg cond., strong 2.4L engine & trans @ 167.5K mi., great town car, \$1,900/obo. 626/358-7705.

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