

By Peter Grier

F-22 Cleared For Production

After long delay, the Pentagon's Defense Acquisition Board finally cleared USAF's F-22 Raptor to begin production.

The Aug. 15 decision denotes official Bush Administration endorsement and settles for at least four years any question about whether DOD will continue to back and fund the supersonic stealth aircraft.

The decision came with strings attached, however. The Air Force and Lockheed Martin must find substantial cost savings. If not, the Pentagon will trim production from today's planned 339 aircraft to only 303 aircraft.

To improve efficiency, the service will have to add about \$5 billion, which it expects to later recoup through savings.

Congress will have to approve a \$5 billion increase in the production cost "cap" it imposed on the program a few years ago.

Edward C. Aldridge, DOD's acquisition chief, said, "The program has met all of its exit criteria for entering low-rate production and is performing to design goals." He expects Congress will go along with the restructured program.

Jumper Confirmed for CSAF

The Senate on Aug. 3 confirmed Gen. John P. Jumper, commander of Air Combat Command, to be the next Chief of Staff of the US Air Force.

The White House had announced July 16 that President Bush nominated Jumper to succeed Gen. Michael E. Ryan, who retires this month.

The new Chief is a 35-year veteran of the service. A fighter pilot, Jumper completed two tours of duty in Southeast Asia and received the Distinguished Flying Cross with two oak leaf clusters, among other awards.

Over the years he has commanded a fighter squadron, two fighter wings, and a numbered air force. Pentagon jobs included a tour as deputy chief of staff for air and space operations and as senior military assistant to two Secretaries of Defense.

"General Jumper knows our mission and our people inside out, and



USAF photo by TSgt. Jim Varhegyi

Gen. John Jumper testifies before the Senate Armed Services Committee during his confirmation hearing to be the next Air Force Chief of Staff. Jumper will replace Gen. Michael Ryan, who retires this month.

he has the vision, leadership, and experience to assure the US Air Force remains the world's pre-eminent aerospace force," said Ryan.

Roche's Eye Falls on the B-52

James G. Roche, Secretary of the Air Force, told a House panel July 16 that the Administration will likely request a reduction in the size of the B-52 bomber fleet when it submits its 2003 budget request next year.

"It's my intention to do exactly that," Roche said at a hearing of the House Appropriations defense subcommittee.

Money saved by retiring a certain number of B-52s could be used to upgrade those that remain, according to the service's civilian chief.

Today's bomber fleet includes a total of 94 B-52Hs, the only variant still in operational service. Only 44 are considered to be fully combat-ready. Moreover, the Air Force has said it needs only 76, meaning 18 are expendable.

Next year will mark the 50th anniversary of the first flight of the BUFF. The youngest in service is nearly 40 years old. It is still a formidable sys-

tem, however, and would employ standoff weapons in the nuclear and conventional role.

B-1B Cuts Likely To Be Delayed

It will take longer than expected to execute the Air Force's proposed reduction in B-1B bombers.

Roche said as much at a Senate Armed Services Committee hearing July 10.

Shrinking the B-1 fleet from 93 to 60 aircraft and consolidating all remaining bombers at two bases might take all of 2002, if the operation is to be done "in a sensible manner," he said.

When the reductions were announced in June the Air Force plan was to move the airplanes by this Oct. 1. Then reality—and a Senate-passed budget amendment prohibiting use of 2001 funds to pay for the move—took hold.

Budget Boost Not Enough, Say Services

In coming years, the US military will need budget increases over and above the \$18.4 billion added by the Bush Administration to its Fiscal 2002

spending plan if the services are to maintain procurement and readiness accounts, according to their leaders.

"We will need more money," Roche told a July 10 Senate Armed Services Committee hearing.

Flat budgets simply won't cut it, agreed Chief of Naval Operations Adm. Vernon Clark. Low levels of investment in the 1990s mean the Navy needs about \$34 billion a year for procurement, he said, as opposed to today's \$24 billion annual level.

"We must buy 180 to 210 aircraft and nine ships a year to sustain the 1997 QDR force level of 4,200 aircraft and 310 ships," he said.

However, the committee's new Democratic chairman, Sen. Carl Levin (Mich.), warned that money is already tight due to the effects of the recently passed tax cut and nonmilitary spending initiatives.

Army Needs More Troops, Says Shinseki

To fully carry out its current missions, the Army needs to grow by upward of 40,000 active duty troops, Army leaders told the House Armed Ser-

vices Committee on July 18. Back in 1995, Army end strength was 532,000. Since then, the Army has maintained a high operations tempo and deployed thousands of troops to various Balkan hot spots, yet end strength today stands at around 480,000.

B-1B Scheme Hits Wall of Opposition on Capitol Hill

A proposed reduction in the B-1B bomber force has turned into one of the hottest political potatoes the Pentagon has seen in a while.

The plan, announced in June, has already sparked determined opposition from members of Congress whose districts would be affected by the move. McConnell AFB, Kan., Robins AFB, Ga., and Mountain Home AFB, Idaho, are bases which stand to lose B-1B units.

Kansas lawmakers, for instance, are emphasizing that the Kansas Air National Guard can fly a B-1B for only \$6,600 an hour, as opposed to the Air Force average cost of \$10,600, and that the average B-1B technician at McConnell has 15 years of experience, far higher than the service norm.

"I think we're going to win this one on a long-term basis," said Sen. Sam Brownback (R-Kan.) at a July 9 press conference following a meeting with Air Force officials.

Pentagon officials, for their part, say that shrinking the B-1B force could free up \$1.5 billion to outfit the remaining Lancers with new precision weapons, self-protection systems, and reliability upgrades.

"This is the kind of efficiency we owe the taxpayers," Secretary of Defense Donald Rumsfeld told a House panel July 16.

"The Army is too small for the mission load it is carrying [and] under-resourced for the size that it is," said Chief of Staff Gen. Eric K. Shinseki.

Shinseki then endorsed a 40,000 increase figure mentioned by a panel lawmaker but used no specific numbers himself.

The new Secretary of the Army, Thomas E. White, added that the service today has trouble managing normal commitments, much less operational missions.

"You can see that in the personnel readiness of commands like the Training and Doctrine Command," said White.

Two Killed in California F-16 Crash

Two crew members died in the July 17 crash of an Air Force F-16 near a mountain range in the eastern California desert.

The aircraft was flying a photo mission out of Edwards AFB, Calif., to record the test flight of another F-16. It went down at about 7 a.m. near China Lake Naval Air Warfare Center, in an area studded with volcanic peaks.

Killed were Maj. Aaron George, a test pilot with the 416th Flight Test Squadron, and Judson Brohmer, an aerial photography subcontractor working with Lockheed Martin.

Investigators could not immediately determine if either or both of the men ejected from the aircraft. A board of officers will investigate the accident.

First Jet Lost in No-Fly-Zone Operation

A USAF F-16 en route from Incirlik Air Base in southern Turkey to a patrol mission covering the no-fly zone

Wolfowitz and the "Reckless" Three-Percent Solution

At a July 11 House Budget Committee hearing, Deputy Secretary of Defense Paul Wolfowitz issued a strong plea for more defense spending, starting with the Fiscal 2002 DOD budget. This is an excerpt of his statement:

"The increase in the 2002 budget is ... devoted to beginning urgent rehabilitation of the 20th century force that we have and begins building the force of the 21st century. This 2002 budget gets us started on the road to rehabilitation. [It] is a bridge budget to what we hope will be the transformation budget of 2003.

"I'm reminded of another point in our history when it was a challenge to make a case for increased defense spending. In 1950, Gen. Omar Bradley urged President Truman to spend at least \$18 billion on defense. [Figures herein not adjusted for inflation.] The Joint Chiefs gave an even higher estimate at \$23 billion, and the services' estimate was higher still at \$30 billion. But the President said we couldn't afford that much—\$15 billion was as much as we could afford. Six months later, we were suddenly in a war in Korea. Just as suddenly we found we had no choice other than to budget some \$48 billion—a 300 percent increase. How much better it would have been to have made the investment earlier. ...

"We have spent an historical average of about eight percent of GDP on defense, in part because we have not spent enough in peacetime to prepare for, and deter, war. We can't know who may challenge us in the future, or where, or when. Today, we are more in the range of three percent of GDP, but it is reckless to press our luck or gamble with our children's future.

"To think we can't afford an insurance policy of roughly 3.5 percent of GDP today to deter the adversaries of tomorrow and underpin our prosperity and, by extension, peace and stability around the globe is simply wrong. When compared with the cost in dollars and human lives if we fail to do so, it is cheap at that price. ... [W]e are much wiser to make smaller investments now rather than pay the premium rate later on."

over northern Iraq crashed July 18. Pilot Capt. Michael A. Nelson Jr. ejected safely from the aircraft and was taken to a hospital in the Turkish city of Batman, according to local press accounts.

The Turkish military said engine failure, not hostile action, was the cause of the crash.

Although the accident marked the first loss of a fixed-wing aircraft over Iraq since the end of the Gulf War, two USAF F-15s mistakenly shot down two Army helicopters in northern Iraq in 1994, killing 26.

Iraqi Missiles Near US Aircraft

An Iraqi surface-to-air missile on July 24 flew so close to an Air Force U-2 reconnaissance aircraft that the pilot felt the reverberations from its warhead's explosion, according to news service reports.

The airplane was carrying out a mission over southern Iraq as part of Operation Southern Watch. It returned safely to base.

Combined with another recent incident in which a Navy E-2C surveillance aircraft flying in Kuwaiti airspace observed a plume from a missile fired from within Iraq, the U-2 attack may herald an important change in Iraqi targeting techniques, according to the Pentagon.

In the past, Iraqi air defense batteries have concentrated their fire on faster, lower-flying fighter aircraft.

Washington and Moscow Agree To Seek New "Framework"

President Bush and Russian President Vladimir Putin struck a surprise agreement July 22 to discuss a package deal of missile defense deployments and deep cuts in nuclear arsenals.

The hope is that the talks will produce a new framework for thinking about nuclear deterrence and arms control.

Bush's national security advisor, Condoleezza Rice, traveled to Moscow on July 25 to set up a schedule for fast-track talks.

"The two Presidents have developed a good relationship and we have the basis for cooperation on these new threats," she told a Moscow television station.

In the forthcoming talks, Washington will not attempt to amend the 1972 ABM Treaty to allow missile defense deployments, said US officials. Rather, it will ask for a joint withdrawal from the treaty. Absent joint withdrawal, the US would seek some sort of political declaration about the permissibility of missile defense work.

If Russia does not agree to either withdrawal or a declaration, the US would go forward and announce its unilateral withdrawal from the ABM pact, said officials.

Now they may have modified their weapons in an attempt to reach slower-flying surveillance aircraft that pass overhead at altitudes Iraqi missiles were previously unable to reach.

To date, no US or allied aircraft has been hit by Iraq, although Baghdad occasionally claims such successes. However, the recent incidents continue the pattern of Iraqi

aggressiveness in shooting at coalition aircraft, said DOD spokesman Rear Adm. Craig Quigley.

Strategic Commander Says Go Slow on Nukes

Adm. Richard W. Mies, commander in chief of US Strategic Command, told lawmakers July 11 that deep reductions in nuclear weapons would not necessarily make the world a safer place.

Depending on how they are structured, such cuts could reduce the flexibility of nuclear arsenals, which in turn could make the nuclear balance between the US and Russia less stable.

Mies told a subcommittee of the Senate Armed Services Committee that it is "naïve" to believe that "the nuclear danger is directly proportional to the number of nuclear weapons and, accordingly, lower is inevitably better."

The Bush Administration has proposed that the current US stockpile of some 7,000 nuclear warheads be substantially reduced as part of a transition to a nuclear doctrine that depends at least partially on defensive as well as offensive forces.

Mies did not comment directly on the Administration's plans.

Rumsfeld, Chiefs Push Base Closures

Painful as it may be for local communities, the Department of Defense really, truly needs to close more bases to save money, Secretary of Defense Donald Rumsfeld said July 16.

The Pentagon wants Congress this

On Friday the 13th, It Was Over for Kelly and McClellan

Two of the Air Force's largest and most venerable bases—Kelly AFB, Tex., and McClellan AFB, Calif.—ended their tours of military duty in bittersweet closure ceremonies.

The existence of both officially ended Friday, July 13.

Both big depots were ordered closed during the Base Closure and Realignment Commission rounds of the 1990s. Both were once among the largest employers in their areas, and both are attempting to regain their former status as economic centers via reinvention as private aerospace and industrial parks.

Sen. Kay Bailey Hutchison (R-Tex.) told a crowd of 2,000 at the San Antonio-area base, "Kelly did not die. Instead, it is renewing its place in our city."

Thousands of miles away, Sacramento officials echoed the sentiment.

"This is a great day to reflect on the past, look at the present, and look into the future," said Stuart Lichter, executive vice president of McClellan Park LLC, which is working to redevelop the base in conjunction with Sacramento County.

In Texas, the industrial park KellyUSA has already attracted about 5,000 private sector workers and 37 companies. Together with 7,000 remaining Defense Department contract jobs, employment at Kelly is still 12,000, noted local officials in the *San Antonio Express-News*.

KellyUSA's goal is to create or retain 21,000 jobs by 2006.

McClellan, at one point, was home to 24,000 workers and residents. Today, McClellan LLC has attracted 67 tenants, according to the *Sacramento Bee*.

The Ups and Downs of Pentagon Research and Development

President Bush's amended 2002 Pentagon budget, released June 27, adds \$5.6 billion to Research, Development, Test, and Evaluation accounts. The total rises from \$41.8 billion (proposed in April) to \$47.4 billion, the highest level since the Reagan Administration.

As seen in Fig. 1, USAF got \$14.3 billion, more than any other service or agency. Much of the new funding, however, went to ballistic missile defense, with spending set at \$7 billion.

According to a July 18 Congressional Research Service report, some 80 percent of RDT&E funding focuses on operational hardware and software. The rest goes to the more basic Science and Technology program. The amendment actually reduced the S&T component to \$8.8 billion (Fig. 2).

As seen in Fig. 3, RDT&E spending peaked in 1987, declined for eight years, and bottomed out in 1995-96 before turning up.

Source: CRS Issue Brief, "Defense Research: DOD's Research, Development, Test, and Evaluation Program," by John D. Moteff, July 18, 2001.

Fig. 1
Defense R&D Funding: Who Gets It?

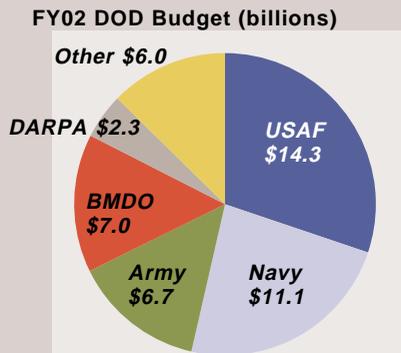


Fig. 2
... And Where Does It Go?

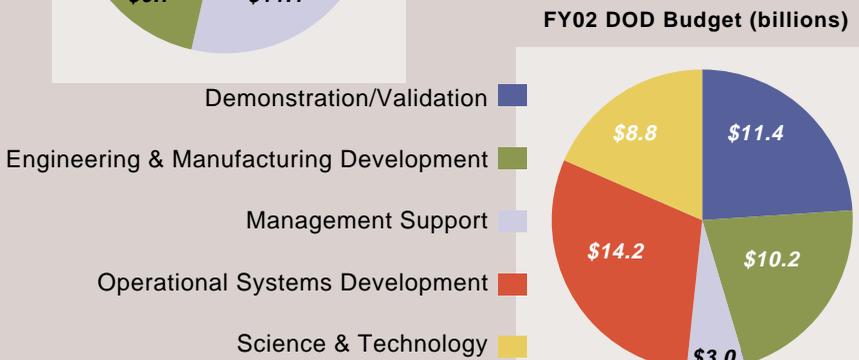
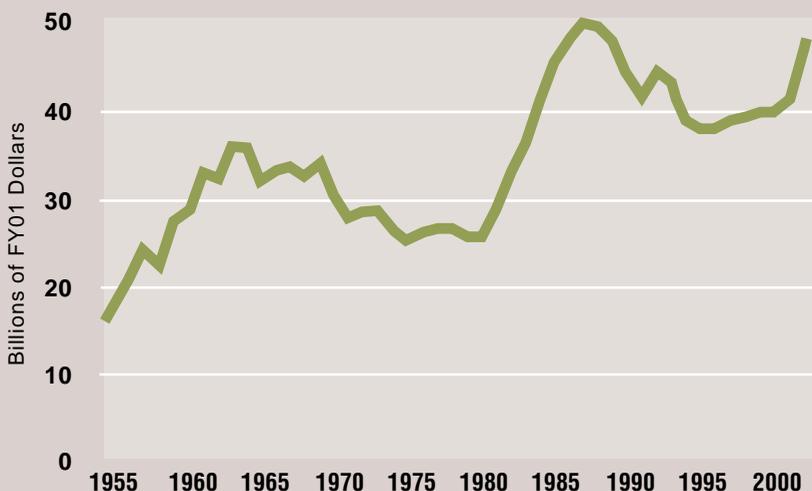


Fig. 3
RDT&E Funding Trend



year to approve creation of another commission to recommend base closings—for what would be the fifth round of closures since 1988. Administration plans call for a 25 percent reduction in the number of domestic installations, producing a projected annual savings of \$3.5 billion.

"As little stomach as I have for it, we will be coming at you on base closing," Rumsfeld told the House Appropriations Committee's defense subcommittee.

The leaders of the armed services seconded Rumsfeld's point in separate Capitol Hill appearances. The Air Force has saved about \$5 billion a year from previous closure efforts, said Gen. Michael Ryan, the Chief of Staff. "The Air Force is overbased for the force structure we have today. We think that we can save significant amounts of money in the out-years with a base closure."

Ryan appeared before the Senate Armed Services Committee.

The verbal support of Ryan and the other Chiefs makes it more likely—although far from a sure thing—that lawmakers will acquiesce to the Administration's desires.

Russia Sells China New Fighters

China has signed a deal with a Russian aircraft manufacturer to purchase upward of \$2 billion worth of Su-30 ground attack jets, reported the *Washington Post*.

The contract involved 38 airframes, according to one Russian press account. Two years ago Beijing bought an initial batch of 40 Su-30s, of which 10 are believed to have been delivered.

The Chinese air force has already developed a potent air-to-air capability via purchase of Russian Su-27 fighters. Seventy to 100 Su-27s are now thought to be in Chinese service.

The addition of ground-attack aircraft would give Beijing a more modern force and improve its ability to threaten or even attack Taiwan, said analysts.

Pilot Dies in Shaw F-16 Accident

Capt. Mitchell Bulmann, a pilot with the 77th Fighter Squadron, Shaw AFB, S.C., was killed July 6 when his F-16CJ crashed into the Atlantic Ocean about 40 miles east of Charleston, S.C.

At the time of the accident Bulmann was participating in an air-to-air training mission within a military training area.

The Coast Guard recovered Bulmann's body but did not find the aircraft. The search for the F-16 ended

GAO Warns Parts Are Big Problem for Air Force Readiness

A new report from the General Accounting Office documents the Air Force readiness problems caused by parts shortages over the last five years—but also concludes that the situation is beginning to improve.

The Congressionally mandated study looked at the E-3 Airborne Warning and Control System and C-5 transport aircraft programs and the F-100-200 engine.

“Specifically, the Air Force did not meet its mission capable goals for the E-3 or C-5 during Fiscal Years 1996–2000, nor did it meet its goal to have enough F-100-200 engines to meet peacetime and wartime goals during that period,” said the study.

Overall Air Force mission capable rates ranged between a high of 78.5 percent in 1996 to a low of 72.9 percent in 2000.

Rates for the systems GAO studied were similar: The E-3 mission capable rate varied between a high of 82.5 percent in 1996 to a low of 71.9 percent in 1998, while the C-5 rate swung from a high of 64.2 percent in 1996 to 59.5 percent in 1999.

Parts shortages were a major cause of downtime, though far from the only one. And the most-cited reason for parts shortages was underestimation of need, according to GAO.

One three-month projection put the F-100-200 program requirement for a particular engine bolt at 828, based on past experience. Actual new demand in one quarter: 12,000.

July 8. The Air Force has a board investigating the accident.

Navy Seeks Vieques Alternative

A panel headed by retired Adm. Leighton W. Smith Jr. and retired Marine Gen. Charles Wilhelm has begun drawing up a list for live-fire sites suitable to replace the Navy's Vieques training range, the Pentagon announced July 19.

Defense Department officials have long called Vieques's combination of deep water, sandy terrain, and relative isolation a virtually irreplaceable training asset. But intense local opposition has led the Bush Administration to rule that the Navy must abandon the Puerto Rican island by May 2003.

At least one proposed alternative has already generated its own local controversy. Texas officials have expressed reservations about a Navy plan that would involve approach corridors over Padre Island National Seashore and amphibious training on the nearby Texas Gulf coast.

Nor is the Navy the only service with a recent no-bombing-in-my-backyard problem. On July 16 a federal judge barred the Army from resuming live-fire training in Hawaii's Makua Valley until at least Oct. 29, pending resolution of a lawsuit brought by a local environmental group.

State Mulls Blocking Vaccination of Guardsmen

The Massachusetts legislature is considering a bill that could protect members of the state's National Guard from being forced to participate in the Pentagon's anthrax vaccination program.

The legislation would require Guard members to give personal consent before receiving drugs or vaccines that are not licensed for their intended use or have not been proved safe and effective in tests on humans. The military could circumvent these restrictions only via Presidential executive order.

State Rep. Mary Rogeness, sponsor of the bill, has termed the anthrax vaccine experimental and cited at least one constituent who had life-threatening blood clots develop in one leg following vaccination.

Similar legislation was introduced in the legislature of Connecticut, the

only other state that has considered imposing a stricture. That bill failed to win passage out of committee.

Officer Trainee Dies at Maxwell

Angel A. Castro Jr. collapsed during a morning run and died July 2 at Maxwell AFB, Ala. Castro was in the officer training program at the Officer Training School at Maxwell.

Prior to entry into OTS, the 15-year Air Force veteran served as an avionics technician at Elmendorf AFB, Alaska.

Two trained medical technicians, who were also in the OTS class, immediately provided CPR, but Castro was pronounced dead after arrival at a local hospital.

Castro's death came just two weeks after a trainee death at Lackland AFB, Tex. Darryll M. Logans, who was in basic military training at the Texas base, also collapsed during routine physical conditioning. (See "Aerospace World: Trainee Dies at Lackland," August, p. 23.)

The Air Force is investigating the causes of both deaths.

Privatization Plan Draws Fire

The Department of Defense wants to conduct an experiment in the privatization of a few base commissaries.

Less than a month after Defense Secretary Donald Rumsfeld broached the issue with Congress, a key House panel said not so fast.

“Our major legislative accomplishment this year may be what we will not do,” Rep. Roscoe Bartlett (R-Md.), the chairman of the House Armed Services panel that oversees

Spectacular Test Success Buys Missile Defense Effort

A successful intercept test cheered the Pentagon's missile defense program officials following two previous failures.

In the July 14 event, a prototype interceptor launched from Kwajalein Atoll in the Marshall Islands flew for 10 minutes then hit and destroyed a mock warhead, launched from Vandenberg AFB, Calif., at an altitude in excess of 140 miles.

The interceptor's sensors were able to distinguish between the intended target and its decoy balloon, said officials.

The Administration is proposing to accelerate and expand missile defense testing, with six more flight tests scheduled in the next year. Plans call for the Ballistic Missile Defense Organization to conduct at least 20 intercept tests over the next five years, said Secretary of Defense Donald Rumsfeld.

“These tests are designed to demonstrate that ballistic missile defense is no longer a problem of invention but rather a challenge of engineering,” said Rumsfeld in a taped message for a meeting of defense proponents in Huntsville, Ala., on July 16.

Not every aspect of the test went perfectly. The X-band radar located on Kwajalein Atoll that was used to steer the interceptor toward its target was overwhelmed by the many data points produced by debris following the collision.

The malfunction shouldn't be a reason for concern, said the Pentagon. It was the first time the X-band radar had been used in a post-collision assessment mode.

“It is through trying things and experimenting with things that you learn from them,” said Rumsfeld.

the issue, declared July 26. "Specifically, we will not authorize the Department of Defense to test commissary privatization."

Key lawmakers are concerned that any such effort would undermine the value of what many in the military consider a key benefit—discount prices for groceries.

Currently, the 284 military commissaries are managed by the Defense Commissary Agency. They receive about a \$1 billion subsidy from the Defense Department every year.

The Congressional Budget Office estimates that military families save about 20 percent on their grocery bill due to this subsidy.

The Administration's privatization plan was contained in the Fiscal 2002 budget submission for Congress. It asked lawmakers to approve an experiment in which retail grocers would be allowed to manage commissaries at a few Army and Marine Corps bases.

Pentagon Wants To Discard 50/50 Rule

The Pentagon wants to make major changes in the law that now requires it to assign at least half of its maintenance and repair workload to public depots.

Under a proposal submitted to Congress earlier this year, the so-called 50/50 rule would be replaced

PACAF Intensifies Anti-Terror Drive in Tense Times

In response to the continuing threat of terrorist attack, the head of Pacific Air Forces on July 16 intensified PACAF's protective preparations.

Gen. William J. Begert, PACAF commander, announced a commandwide force protection awareness campaign.

Throughout the early summer a string of intelligence reports indicated a significant increase in planned terror attacks on US targets, according to officials. PACAF, as well as other US commands, has been on force protection alert.

Begert said he does not want personnel under his command to become numb to the condition and treat Force Protection Condition Alpha as "Force Protection Condition Normal."

"Just as we used to be on constant alert during the Cold War when the Soviet Union was our biggest threat, we now need to resume that posture toward the very real presence and threat of terrorist attacks," said Begert.

The new directive calls for all PACAF units to take prudent force protection measures. In addition, each base must implement a force protection training day to review evacuation plans, operations security, and computer security, among other things.

"We are now on a constant state of alert for terrorist attack," said Begert. "Each of us needs to practice what we have learned about personal and organizational security on a daily basis."

by legislation allowing defense officials to outsource repair work that is not considered core to the military mission and that would strain public depot capacity.

In presenting the amended Fiscal 2002 budget, Defense Comptroller Dov Zakheim said the proposal, which needs a Congressional waiver, "would save \$140 million immediately."

Many Pentagon officials have long chafed at what they perceive as Con-

gressional protection of big, job-producing public depots. More outsourcing would save much-needed cash, they contend—as much as \$140 million next year alone, if their current proposal is adopted.

Roche Sees Bright Depot Future

USAF's three large depots will experience a strong demand for their services in the years ahead, said Secretary of the Air Force James

Failure Is Only the First Step

Fear of failure does not exactly haunt the officials in charge of DOD's ballistic missile defense program, if the words of Deputy Defense Secretary Paul Wolfowitz are any guide.

"We expect there to be test failures," Wolfowitz told the Senate Armed Services Committee at a July 12 hearing on the Bush Administration's plans. "There is not a single major technological development in human history that did not begin with a process of trial and error, and many of our most successful weapons developments have been marked by testing failures."

As evidence, Wolfowitz cited the following examples:

- The Corona satellite program, which produced the first overhead reconnaissance satellites, suffered 11 straight test failures.
- Thor Able and Thor Agena launch programs failed four out of five times.
- Atlas Agena launches failed five out of eight times.
- Scout launches failed four out of six times.
- The Vanguard program failed 11 of its first 14 tries.
- The Polaris failed in 66 out of 123 flights.

Concluded Wolfowitz, "From these failures came some of the most effective capabilities ever fielded. Failure is how we learn. If a program never suffers test failures, it means someone is not taking enough risks and pushing the envelope."



A Thor missile explodes at launch.

F-22 Flight Test Picks Up the Pace

USAF has greatly accelerated the F-22 flight test program, said Darleen A. Druyun, a top Air Force acquisition official.

Druyun told a July 10 Senate Armed Services Committee panel that the fighter's flight test "experienced a significant turnaround" in spring 2001, both in sorties and hours.

In March, April, May, and June, test F-22s averaged some 37 sorties and 88 flight hours per month—a marked increase over the prior year's record of about 11 sorties and 23 hours per month, as seen in Fig. 1.

Druyun attributed the change to delivery of additional test aircraft and more efficient operations. The Raptor had racked up more than 1,230 hours of flight test through June, as it neared a production decision, she said.

"At this stage in development, the F-22 is far more mature than any other aircraft weapon system program at this point in the development cycle," said Druyun. "No other fighter program has accumulated as many hours at their production decision as the F-22 program."

Fig. 2 provides a comparison of the four most recent US fighters.

Fig. 1
F-22 Flight Tests—Recent Results

Monthly Flight Hours and Sorties

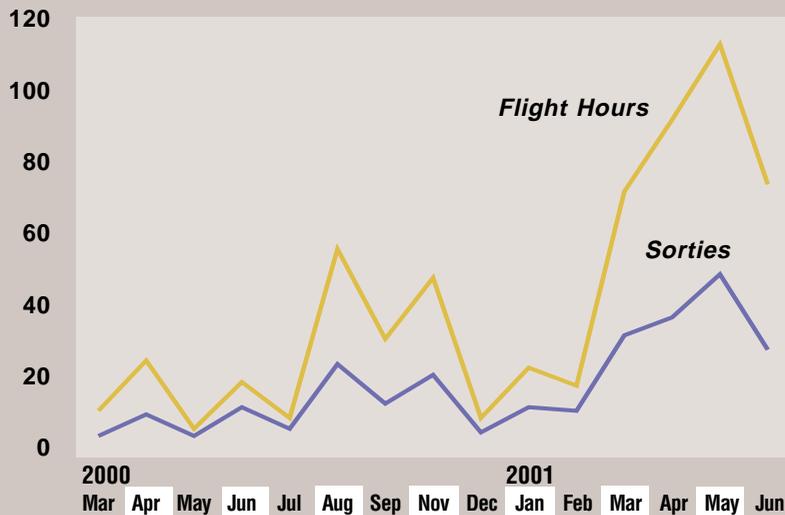
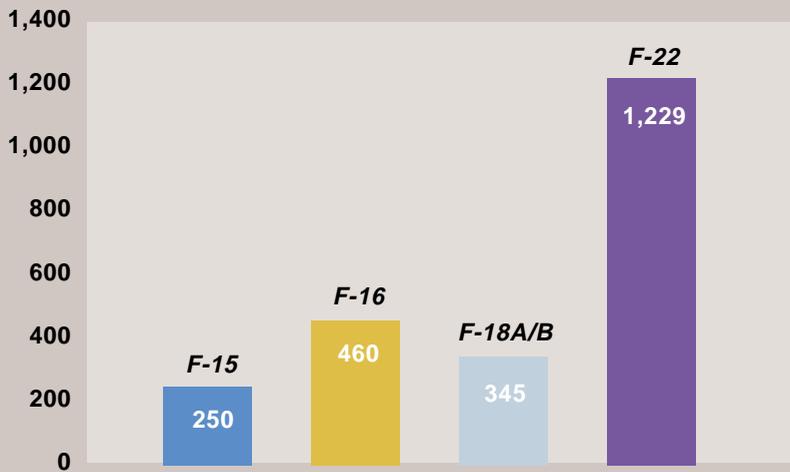


Fig. 2
F-22 Flight Test Hours at Production Decision



Roche on a July 20 visit to Tinker AFB, Okla.

The Air Force still has more installations than it needs, he added, but the Air Logistics Centers are a different matter. The three are Oklahoma City ALC, Okla., Ogden ALC, Utah, and Warner Robins ALC, Ga.

"You can't just do away with maintenance," Roche said. "I want a long-range plan for the three ALCs we have and how we should load them and how we should deal with them over time."

A long-term management plan should be in place sometime next year, he said. Among the changes he wants to encourage are more effective partnerships with private industry.

"We have older aircraft that we will be phasing out and hopefully newer aircraft coming in, and we've got to be able to allocate those well so that they're well-maintained over time," Roche told Tinker personnel.

Beale To Be First Global Hawk Base

The Air Force has picked Beale AFB, Calif., as the first Global Hawk main operating base, officials announced July 27.

A recently completed environmental assessment concluded that basing 18 of the big Unmanned Aerial Vehicles at Beale would have no significant environmental impact.

Other installations under consideration were Edwards AFB, Calif., Ellsworth AFB, S.D., Tinker AFB, Okla., and Wright-Patterson AFB, Ohio.

The Global Hawk should fit in well with Beale's 9th Reconnaissance Wing and its U-2 mission, said officials.

No Bull Fights, Please; We're American

Military commanders at Lajes Field in the Azores islands of Portugal are cautioning US service personnel against participating in the street bullfights that are popular with locals.

The Portuguese bullfights do not look as dangerous as the famous "running of the bulls" in the Spanish town of Pamplona. The animals in question are restrained by ropes.

However, the fights still cause fatalities every year, since the ropes and surrounding low stone walls do not always hold back an angry, 1,200-pound animal.

In the past, personnel coming through Lajes on temporary duty have proved particularly vulnerable to the

DOD, Vet Groups Seek to Enhance Funerals

The Department of Defense has begun working with national veterans service groups in an effort to improve funeral ceremonies for those who wore their nation's uniform.

At a June 28 meeting at American Legion headquarters in Washington, Pentagon officials met with representatives of vet organizations to discuss their augmenting Defense Department-provided personnel at military funerals with volunteer color guards, rifle details, pallbearers, and buglers.

"We want to provide the appropriate honors to veterans who pass away," said Charles S. Abell, assistant secretary of defense for force management policy. "The veterans organizations want to help us, and we would like to have their help."

The new Authorized Provider Partnership Program was included in the Fiscal 2000 defense bill. Under the program, vet volunteers will be trained and certified by local military installation commanders. They will be eligible for reimbursement for travel costs and other expenses incurred in the course of funeral duties.

The Fiscal 2000 defense legislation also requires the Pentagon to provide at least two active, National Guard, or Reserve military members to fold and present a ceremonial flag at military funerals. If military musicians are unavailable, officials will provide a high-quality recording of "Taps" for ceremonial use.

In 2000, according to Department of Defense records, the military participated in 91,074 funerals, a 110 percent increase over the previous year.

That figure is predicted to increase in coming years. Enhancing these ceremonies is "the right thing to do," said Abell. "We asked them to put their lives on the line for the freedoms we all enjoy today. As they reach the end of their lives, the nation has a commitment to them, owes them an honor as they pass."

resolution—which did not list specific off-limits areas—will be taken up in the course of regular consultations.

"The anger of Okinawan people is at its peak against frequent and rampant incidents committed by service members," said the city council resolution.

News Notes

- Boeing named former Deputy Secretary of Defense Rudy de Leon head of its Washington, D.C.-area corporate offices. De Leon served the Pentagon in various high posts throughout both terms of the Clinton Administration.

- Anthony J. Tether has been appointed director of the Defense Advanced Research Projects Agency, Secretary of Defense Donald Rumsfeld announced June 18. Tether worked in DARPA's Strategic Technology Office from 1982 through 1986. His subsequent jobs included vice president

temptation to participate in an activity that residents know is more dangerous than it looks.

"There's no organization, virtually no safety measures, and absolutely no safety rules," said Joe Raposo, 65th Air Base Wing ground safety manager. "Everything is left up to chance."

Okinawa To Constrain US Troops?

The Okinawa City Council passed a resolution July 25 that calls for making portions of Okinawa City off-limits to US servicemen and -women, reported the *Pacific Stars and Stripes*.

In the wake of an alleged rape of an Okinawan woman by a US airman in June, local officials had previously called for curfews on the many American military personnel based nearby. US military commanders said the new

China and Russia, Together Again

In a move harking back to the earliest days of the Cold War, China and Russia in July shook hands over a new friendship pact.

It is not something that bothers the US all that much, says the White House.

The agreement, signed by Chinese President Jiang Zemin and Russian President Vladimir Putin in Moscow on July 16, is an informal expression of mutual interests and not a binding treaty recreating the anti-US Sino-Soviet axis of the 1950s, said US officials.

"They have a long border in the region, and it is important for them to get along," said State Department spokesman Richard Boucher, "so we don't see it as any particular threat to us or to our plans."

Washington does feel some anxiety about a recent spate of Russian arms sales to China. Beijing has bought four diesel-electric Kilo-class submarines from Russian manufacturers, as well as Su-27 and Su-30 fighter aircraft.

Bush Administration officials maintain that both Russia and China view their relationship with the US as being more important than their relationship with each other. As evidence, officials point to US trade with China, which, at \$115 billion a year, exceeds Sino-Russian commerce by a factor of more than 10.

"We have never felt that this was a zero-sum game," said Boucher. "We have felt that it is important for us to have good relations with Russia and China, and we have always felt it is important for them to have good relations with each other."

Airman's Rape Case Stirs Anti-US Sentiment in Okinawa

The case of US Air Force SSgt. Timothy Woodland, who is accused of raping a woman outside an Okinawa bar early in the morning of June 29, has reignited anti-US sentiment among local residents.

To Okinawans, the incident raises memory of the infamous 1995 rape of a 12-year-old girl by three US service personnel. Crime, noise, and pollution caused by the 23,000 American troops based on the island have long been large issues for those who live nearby.

"As long as there are US military bases here, these crimes will not stop," said a statement issued by a meeting of 500 residents of the town of Chatan, where the alleged attack took place. The statement was reported by *USA Today*.

Woodland has told authorities that anything that took place that night involved consensual activity. He was turned over to Japanese law enforcement officials July 6. A district court rejected a bail request on July 25, saying Woodland might destroy evidence.

of Science Applications International Corp. and president and chief executive officer of The Sequoia Group, a program management and strategy development company.

- Suzanne D. Patrick assumed the job of deputy undersecretary of defense for industrial policy on July 9. A former Wall Street analyst and Navy acquisition specialist, Patrick is also a commander in the US Naval Reserve.

- TSgt. Richard T. Lucio Jr., a military training leader from the 34th Training Group, US Air Force Academy, Colo., was recently named the 2001 United Service Organizations'

Khobar Bombing Suspects Face Saudi—not US—Justice

Saudi Arabian officials are insisting that they—not the US—will try the Khobar Towers bombing suspects.

Nineteen US servicemen were killed and hundreds wounded in the 1996 terrorist attack, which targeted an eight-story Dhahran building used to house American military personnel. On June 21, a US federal grand jury in Alexandria, Va., indicted 13 Saudis and one Lebanese national on charges of carrying out the bombing.

Eleven of the indictees are in prison in Saudi Arabia. Saudi officials, however, say they were surprised by the US indictments and subsequent statements by then-FBI Director Louis Freeh that Khobar trials might take place in US courts.

Asked on June 30 if the suspects would be extradited to America, the *New York Times* reported that Saudi Interior Minister Prince Nayef bin Abdel Aziz said, "Impossible."

An understanding with the US that it would help Saudi officials track down and capture the remaining suspects appears to have stalled, he said. The Saudi government had been delaying any trials, pending their capture; now it is likely to forge ahead on its own.

As to whether Iran had a hand in the bombing, as the US indictments charge, the prince was unspecific.

"We can never point a finger of accusation at any side until we are sure they were involved," he said.

None of the 33rd's HH-60G Pave Hawks were on alert, as it was a no-fly day for them, but a fast response produced takeoff within 14 minutes and a completed rescue mission within 39 minutes.

■ Lt. Col. Bruce McClintock, deputy chief of the Space Operations School for the Joint National Test Facility, Schriever AFB, Colo., has been named one of 12 White House fellows. During his one-year tenure, McClintock will serve as an assistant to a senior member of the White House staff.

■ A court-martial panel of 11 officers sentenced Capt. John Buck on May 22 to a reprimand, forfeiture of \$21,000, and restriction for 60 days to base, for "willfully disobeying a lawful order by not taking the anthrax vaccine," according to a USAF release. Buck, an emergency room physician at Keesler AFB, Miss., applied for discharge but only after the presiding judge ruled that the order was lawful. Buck had previously waived nonjudicial punishment, requesting a court-martial instead.

■ Pararescuemen from the Alaska Air National Guard's 210th Rescue Squadron, Camp Denali, Alaska, hoisted four stranded boaters to safety in late June. The canoers had been floating in the Delta River, near Fairbanks, when they hit rough water and were left stranded on a rock near a waterfall.

■ The Airborne Laser program has received its first set of infrared sensors—the "eyes" that will make the initial detection of theater ballistic missiles in flight. On July 11 Lockheed Martin Missiles and Fire Control of Orlando, Fla., delivered four sensors

Spirit of Hope award winner. Lucio won the leadership honor for being a positive Air Force ambassador and mentor to some 115 Air Force cadets, said his commanding officer, Lt. Col. Michael Boera.

■ SSgt. Joseph A. Cormier, a flight engineer with the 4th Special Operations Squadron, Hurlburt Field, Fla., has been named the 2001 American Legion Spirit of Service winner. Cormier and his wife, Melissa, manage a foster home for mentally and physically handicapped adults. He has also served as bowling coach for the Okaloosa County Special Olympics Regional Games and spearheaded a

fund-raiser that netted \$20,000 for needy Hurlburt families.

■ A1C Nathaniel A. Malli, a weapons-load crew member with the 18th Fighter Squadron, Eielson AFB, Alaska, drowned June 26 in the base's Polaris Lake. Malli and a fellow member of a five-person base clean-up crew attempted to swim across the 100-yard-wide lake, but Malli became tired and disappeared.

■ A six-man crew from USAF's 33rd Rescue Squadron, Kadena AB, Japan, helped save the life of a US Marine who suffered severe head trauma as the result of a boating accident off Okinawa on June 29.

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Carrier Airpower

“[The claim that] aircraft carriers are increasingly vulnerable to attack ... is simply incorrect. Highly mobile, well-defended naval forces are hard to find, harder to hit, and nearly impossible to kill. While conducting routine flight operations at a speed of 30 knots, an aircraft carrier can be anywhere within an area as large as 700 square miles within 30 minutes. The modern aircraft carrier is a highly armored target that is extremely difficult to disable. It is also a source of high-volume, sustained firepower. The carrier and its embarked air wing represent the capacity to strike more than 600 distinct targets every flying day—1,000 later this decade, with the introduction of the F/A-18E/F strike fighter. Any suggestion that its time is past is out of step with reality.”

—Navy Vice Adm. John B. Nathman, commander, Naval Air Force, US Pacific Fleet, in July 11 Christian Science Monitor.

ceived the Medal of Honor from President Bush during a July 16 White House ceremony. Freeman flew 14 rescue missions to a stranded Army battalion in the Ia Drang Valley in 1965. Originally awarded the Distinguished Flying Cross, his honor was upgraded in part due to the efforts of Sen. John McCain (R-Ariz.).

■ The Air Force selected 20,793 of 32,170 eligible senior airmen for promotion to staff sergeant for the 01E5 cycle, an overall 64.63 percent selection rate. That marks the highest promotion rate to staff sergeant in the history of the Weighted Airman Promotion System, officials said. ■

to a Boeing facility in Wichita, Kan., for installation into ABL aircraft and two to Boeing in Seattle for testing with missile tracking software.

■ SrA. Jason A. Huchel, 721st Communications Squadron, Cheyenne Mountain, Colo., was recently found guilty of 10 drug charges at a general court-martial. Huchel was sentenced to a dishonorable discharge and five years' confinement for the use and distribution of LSD, Ecstasy, marijuana, and ketamine.

■ Capt. Phil Preen, Air Force Operational Test and Evaluation Center, Kirtland AFB, N.M., was awarded the Airman's Medal for heroism July 9. In Hawaii on temporary duty in 1999, Preen spearheaded an emergency rescue effort after a tragic Mother's Day rock slide at Hawaii's Sacred Falls State Park that killed several hikers and critically injured dozens more.

■ Air Force officials have recommended that a nuclear training bomb jettisoned off the coast of Savannah, Ga., in February 1958 not be disturbed. The training weapon contains 400 pounds of conventional explosives but no nuclear material.

■ SMSgt. Jere Garvin, a flight engineer with the 2nd Air Refueling Squadron, McGuire AFB, N.J., has surpassed the 10,000-mishap-free flying hours milestone. Garvin has logged some 2,400 sorties on C-130, C-141, E-3, and KC-10 aircraft—more flights than many fellow crew members have hours.

■ A temporary shortage of Td vaccine has impacted Air Force supplies of the two-in-one vaccine that protects against tetanus and diphtheria. Officials are deferring all routine boosters of Td vaccine for previously immunized adults and children older than seven until 2002.

■ Edward W. Freeman, a Vietnam War-era Army helicopter pilot, re-

Air Force Is Force Multiplier in Strategic “Third Way”

Advances in the Air Force's “core competencies” may serve as multipliers allowing the Pentagon to stop aggression with smaller forces than in the past, according to Maj. Gen. David Deptula, head of the Air Force Quadrennial Defense Review effort. He identified the core competencies as aerospace and information superiority, agile combat support, global attack, precision engagement, and rapid global mobility.

USAF's reach may soon be such that airpower can provide a middle ground between a truncated national strategy sized to available forces or increasing the size of available forces to meet a more ambitious strategy.

Pentagon leaders should study how transformational aerospace capabilities might enhance the joint concept of operations, Deptula told a conference in Washington. The US can retain the ability to conduct multiple warfights if we fully leverage the capabilities of modern aerospace power—one of which is to “rapidly halt aggression” using precision engagement, said Deptula.

Senior Staff Changes

PROMOTIONS: To **Lieutenant General:** Richard E. **Brown III**, Lance L. **Smith**, Thomas C. **Waskow**.

CHANGES: Brig. Gen. (sel.) Kurt A. **Cichowski**, from Cmdr., 80th FTW, AETC, Sheppard AFB, Tex., to Vice Cmdr., 21st AF, AMC, McGuire AFB, N.J. ... Brig. Gen. Trudy H. **Clark**, from Dir., C⁴, STRATCOM, Offutt AFB, Neb., to Dep. Principal Dep. Asst. SECAF, Business & Info. Mgmt., Asst. SECAF, Acq., OSAF, Pentagon ... Brig. Gen. John H. **Folkerts**, from Principal Dir., Combating Terrorism Policy & Spt., OASD, Special Ops./Low Intensity Conflict, Pentagon, to Cmdr., 347th Rescue Wg, ACC, Moody AFB, Ga. ... Maj. Gen. (sel.) James A. **Hawkins**, from Cmdr., 89th AW, AMC, Andrews AFB, Md., to Vice Dir., Jt. Staff, Pentagon ... Lt. Gen. Paul V. **Hester**, from Cmdr., 5th AF, PACAF, Yokota AB, Japan, to Cmdr., AFSOC, Hurlburt Field, Fla. ... Brig. Gen. Richard B. H. **Lewis**, from Dep. Dir., CSAF's Developing Aerospace Leaders Prgm. Office, DCS, Personnel, Pentagon, to Dir., Jt. Theater Air Missile Defense Orgn., Jt. Staff, Pentagon ... Brig. Gen. John W. **Rosa Jr.**, from Cmdr., 347th Rescue Wg., ACC, Moody AFB, Ga., to Dep. Dir., Current Ops., Jt. Staff, Pentagon ... Lt. Gen. Lance L. **Smith**, from Cmdr., AF Doctrine Ctr., Maxwell AFB, Ala., to Cmdr., 7th AF, PACAF, Osan AB, South Korea ... Brig. Gen. (sel.) Glenn F. **Spears**, from Exec. Officer to C/S, USAF, Pentagon, to Cmdr., 89th AW, AMC, Andrews AFB, Md. ... Maj. Gen. Garry R. **Trexler**, from Vice Dir., Jt. Staff, Pentagon, to Dir., Air & Space Ops., PACAF, Hickam AFB, Hawaii ... Lt. Gen. Thomas C. **Waskow**, from Dir., Air & Space Ops., PACAF, Hickam AFB, Hawaii, to Cmdr., 5th AF, PACAF, Yokota AB, Japan.

COMMAND CHIEF MASTER SERGEANT RETIREMENT: CMSgt. Marc A. **Mazza**.

CCMS CHANGE: CMSgt. David D. **Mimms**, to AFMC, Wright-Patterson AFB, Ohio.

SENIOR EXECUTIVE SERVICE RETIREMENT: Tommy B. **Jordan**.

SES CHANGE: Milton C. **Ross**, to Dir., Contracting, ASC, AFMC, Wright-Patterson AFB, Ohio. ■