

Letterkenny Army Depot Awarded Seventh Shingo Medallion

ARMY NEWS SERVICE (AUG. 11, 2011)

CHAMBERSBURG, Pa.—Army Col. Cheri Provancha, Letterkenny commander, informed the workforce on Aug. 9, 2011, that the Aviation Ground Power Unit (AGPU) rebuild program was selected to receive the Shingo prize for Excellence in Manufacturing, Bronze Medallion.

Provancha visited various buildings across the depot and personally thanked and congratulated the employees that had a direct hand in bringing the prestigious recognition to the depot.

“You guys did it. You pulled it off,” she said. “The one thing they [Shingo auditors] walked away with was the heart and soul that was demonstrated down here.”

The award is the first Shingo prize in which the cost center owned the entire process. Employees briefed the review team about their role in AGPU’s continuous improvement process.

James Ehrenreich, electrical equipment repairer, demonstrated the AGPU harness test in Building 51.

“This test used to take four to five hours to run,” Ehrenreich said. “Now the entire process is completed in less than three minutes.”

The AGPU Rebuild program was established in 2005 and has undergone various improvements and transitions to meet increasing production numbers.

Jeremy Crouse, power support system mechanic leader said the AGPU line has undergone restructuring approximately six times in order to accommodate production at the current area of 23,374 sq. ft.

The auditors’ were impressed by LEAD employees’ alignment with the soldier, the flexibility and adaptability of the workforce, and the workforce’s pride in workmanship.

“What an amazing commitment at all levels. Very impressive,” Paul Terry, Shingo examiner, said.

Provancha commended the employees on a job well done and encouraged them to go for a gold in the future.

The audit to examine the depot’s AGPU submission was conducted on July 26-27. Four individuals from Utah State University’s Jon M. Huntsman School of Business evaluated

the depot on criteria such as proving a lean business systems model with an emphasis on customer satisfaction and profitability; quality, cost, and delivery; lean core operations; as well as leadership and empowerment enablers.

The Shingo prize was established in 1988 to educate, assess, and recognize world-class organizations for creating a culture of continuous improvement through employee-empowerment and effective leadership.

LEAD has received six Shingos in the past, the Silver Shingo in 2005 for the Patriot Missile, the Silver Shingo in 2006 for the HMMWV Recap, the Bronze Shingo in 2007 for Power Generation and a Silver Shingo for HMMWV, a Bronze Shingo in 2008 for Biological Integrated Detection Systems, and a Bronze Shingo in 2010 for the PATRIOT Missile.

Tobyhanna Army Depot Achieves Aerospace Standard

ARMY NEWS RELEASE (AUG. 12, 2011)

Anthony Ricchiazzi

TOBYHANNA ARMY DEPOT, Pa.—Tobyhanna Army Depot has joined an elite group of public and government organizations that have earned certification in internationally recognized standards for quality.

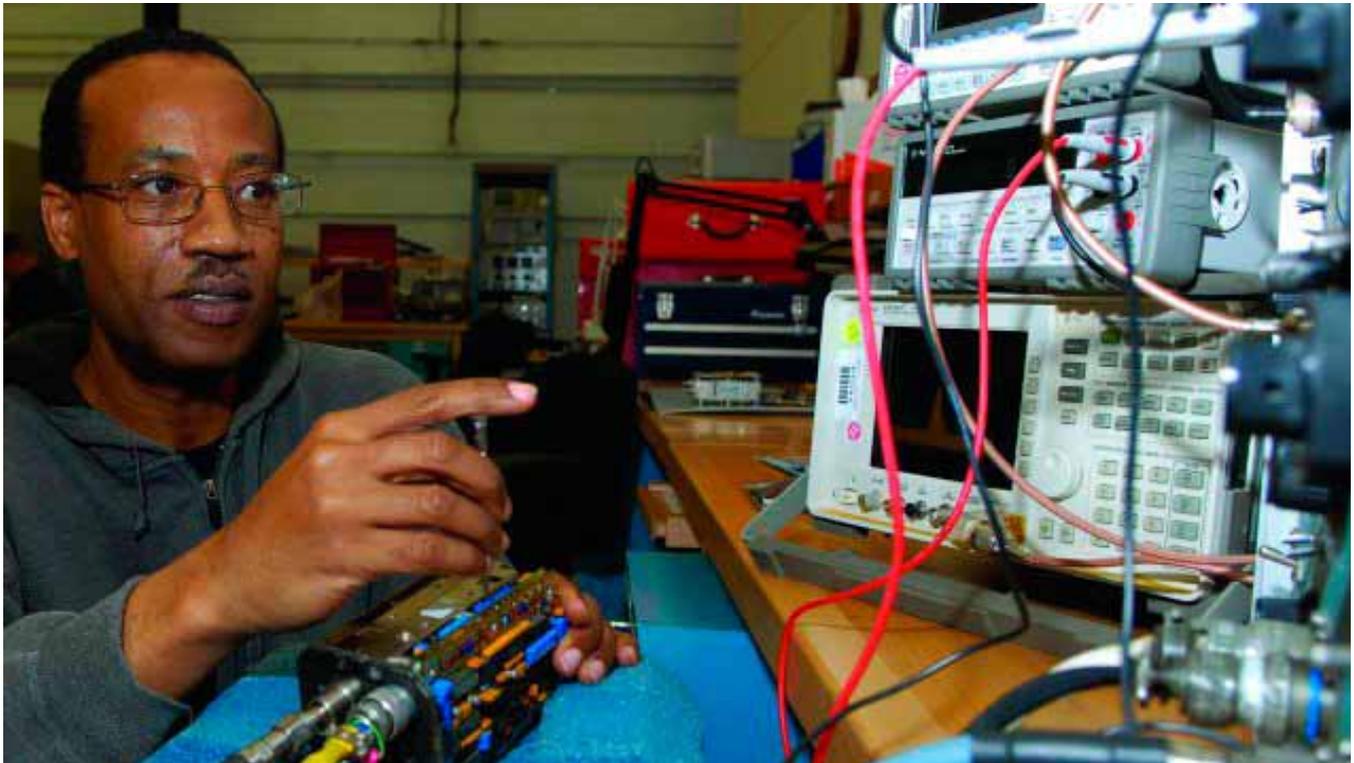
Tobyhanna is the first military installation and third organization of any type in the world to achieve certification to Aerospace Standard (AS) 9100 Revision C and AS9110 Revision A, says Larry Bulanda, quality management division (QMD) chief.

AS9100C, titled “Quality Management System Requirements for Aviation, Space and Defense Organizations,” and AS9110A, titled “Quality Management Systems Requirements for Aviation Maintenance Organizations,” were developed with input from aerospace personnel from the Americas, Asia/Pacific, and Europe.

On July 6, the depot was notified by NSF, the depot’s AS registrar, that AS9100C and 9110A certification had been granted.

The AS9100/9110 certification signifies the depot’s commitment to meet or exceed increasingly stringent industry requirements as a world-class supplier of defense systems and related products to civil and military markets, according to QMD officials. The division is part of the productivity improvement and innovation directorate.

“Companies and other private and government public organizations here and abroad require AS certification before



Abe May, an electronics mechanic at Tobyhanna Army Depot, performs an analog adjustment for the AN/APN-209 radar altimeter. May works in the depot's airborne communications/instrument branch. The branch is one of several depot organizations that have earned certification in Aerospace Standard 9100/9110.

U.S. Army photo

they will consider doing business with another organization," Bulanda said.

The depot was audited by AS officials in July. Rimas Bildusas, a senior quality assurance specialist in QMD, said the four auditors pointed out several strengths, including the depot's experience and expertise in core products.

"They noted that our workforce is very knowledgeable and skilled in many areas to accomplish customer requirements, and that depot personnel are committed to a professional work environment," Bildusas said.

"Not only are the work areas organized and refined by Lean events and 6S audits, but continual improvement to enhance operations was evident from ongoing upgrades."

Although the auditors were impressed with depot personnel and operational efficiency, some improvements were made to earn certification.

"During the preparation period, there were a lot of questions on requirements and processes that did not have established

answers; there were many mid-process changes as they became available," said Paul Sumski, multipurpose cable fabrication branch, electronic assembly division, systems integration and support directorate. "Everyone worked hard to help achieve certification. Everyone became aware of all the potential good things that certification could bring, such as increased avionics workload. The cost center benefited as a whole by improving efficiency and working together as a team."

Bulanda said there are three standout accomplishments.

Tool Control

"Tool control is one. We worked with John Jastremsky and personnel in the tool crib operations branch to build hundreds of process tool boxes that were placed in AS shops," he explained. "This gives the technicians in those shops improved tool control, helping to eliminate potential foreign object damage (FOD) from loose tools."

"I was temporary supervisor [of the navigation branch] at the time of audit," said Chester Schultz, avionics division, command control and computer systems/avionics director-

ate. "We were fortunate to be in the Depot Maintenance of the Future facility and already started to implement most of the 9110 practices. We increased the number of personnel entering data into the LMP [Logistics Modernization Program] database, including parts used and work done. And we increased awareness to FOD and ESD [electrostatic discharge].

"The branch now has more control over parts, and awareness to counterfeit parts. I couldn't be more proud of how the employees handled the audit, and the cooperation with getting prepared. They displayed a positive attitude towards the future of the depot."

Foreign Object Damage Program

Another important accomplishment was the development of the FOD program. FOD is basically loose equipment or other objects that may damage equipment if not stored or disposed of correctly. QMD personnel, in conjunction with information management personnel, developed a voice-over slide show and hands-on training to identify and eliminate FOD problem areas. American Federation of Government Employees (AFGE) Local 1647 assisted with the implementation of Depot Regulation 702-23, "Foreign Object Debris and Foreign Object Damage Prevention, Control, Awareness Program, and Tool Control," which governs the program. And FOD posters were distributed around the depot to further raise awareness.

"We established standard tool boxes in our branch, and technicians are paying more attention to FOD and prevention," said Carol Kubilus, chief of the satellite systems support branch, electronic assembly division, systems integration and support directorate. "All team members, both federal and contractor, came together as one team and worked side by side to meet or exceed all requirements set forth by AS9100/ 9110."

Qualified Task Listing

The third standout is the development and implementation of the Qualified Task Listing (QTL), a document that meets the AS requirement to have a record of an employee's qualifications to perform assigned tasks.

"The QTL is like a resume," Bildusas said. "It is a record of an employee's education, training, skills, and experience. If a branch needs help, the supervisor can access QTLs to identify employees from other shops who are qualified in that branch's mission. One important note is that QTLs are not used to rate performance, only what an employee is qualified in."

Bulanda and Bildusas noted that there were several other achievements made by personnel and organizations across the depot.

"Obtaining AS certification is a big accomplishment by the total depot team," said Brad Jones, director of productivity improvement and innovation. "Almost every part of the depot had a hand in the success. It shows that the quality of work performed by the depot workforce meets very rigorous industry expectations."

"Now that we've earned certification, we can't just put it on a shelf and pull it out whenever we want to impress customers; sustainment is very important," Bildusas said. "We will continue to meet with shops personnel to maintain our certification, but the bulk of sustainment will be handed over to the shops. From now on, there will be regularly scheduled audits and AS officials will publish a list of organizations that no longer maintain the high level of quality needed to stay certified."

Tobyhanna Army Depot is the Defense Department's largest center for the repair, overhaul, and fabrication of a wide variety of electronics systems and components, from tactical field radios to the ground terminals for the defense satellite communications network. Tobyhanna's missions support all branches of the armed forces. About 5,600 personnel are employed at Tobyhanna, which is located in the Pocono Mountains of northeastern Pennsylvania.

Ricchiazzi is with Army Materiel Command.

Acquisition Employees Graduate from Excellence in Government Fellows Program

U.S. ARMY ACQUISITION SUPPORT CENTER (AUG. 22, 2011)

Marques Chavez

WASHINGTON—Nineteen members of the acquisition workforce were among 263 federal employees, spanning 23 government agencies, that graduated from the Excellence in Government Fellows (EIGF) program at a graduation luncheon held in their honor at the Capital Hilton Hotel in Washington, D.C., Aug 18.

The EIGF program is a year-long leadership development program designed to build and enhance the skills of government employees to help them increase their effectiveness in their positions and to work toward becoming an executive. The program is organized by the Partnership for Public Service, a non-profit, non-partisan organization that aims to help revitalize the federal government.

“Over the course of a year, what we try to do is remind folks of the importance of public service. We refocus the emphasis on public service. It’s a personal vision and a mission statement. It’s thinking about how that aligns with the work of the agency,” said Tom Fox, vice president for leadership and innovation at Partnership for Public Service.

There are seven sessions over the course of the program year. Conducted about six weeks apart, each three-day session centers on a particular topic or theme. In each session, students are introduced to key theories and content associated with the selected topic. Practitioners from the private and public sectors that have implemented the strategies speak to the classes and explain how they make the transition from learning the skills in the classroom to implementing them into their work. The students are also given opportunities to practice the skills through interactive exercises and year-end projects.

“We surveyed all of the best practices in the private and public sector and developed a program that includes everything from formal classroom training, 360-degree assessments, executive coaching, and site visits to high-performing benchmark organizations, and mentoring and peer networking,” Fox said.

“It’s a leadership training opportunity. The participants focus on how to be a leader and how to enhance their leadership skills,” said Gloria King, acquisition training and education manager at the U.S. Army Acquisition Support Center.

The individual federal agencies are charged with selecting the candidates for the EIGF program. In the case of USAASC, applications are accepted from workforce members who meet the criteria for the program. Those candidates are referred to a selection board for evaluation and recommendation. The board is a three-person panel composed of senior level individuals from the major commands. The board members review applications and make recommendations to Craig Spisak, deputy director, Acquisition Career Management for the final selection of students for the program.

Those who have completed the EIGF program explain that it not only teaches and enhances leadership skills, but also provides the opportunity to interact with employees of other government agencies.

“This program was amazing because it was government wide. We could build off of other agencies and people who have similar projects or problems within the Department of Defense,” said Kerry Henry, chief, technology and prototyping division, Program Executive Office (PEO) Ammunition,

who graduated from the EIGF program. “It was also great to step out of the work environment, learn new skills, and take what we learned and put it back into the workplace.”

Wen Lin, acquisition training development manager at USAASC, completed the program in 2010 and has been able to implement those strategies into her current position.

“You are able to see what’s been done that works well and not so well. Then you can benchmark your organization. I’ve been able see what good leaders have done and apply that to my job,” Lin said.

With smaller budgets and an increased emphasis on streamlining efficiencies, Fox explained that the EIGF program has taken on an elevated meaning.

“Right now, programs like this are really important, not just to the individuals, but to the organizations,” he said. “The problems confronting our country are getting more difficult. So let’s make sure folks are ready to tackle these problems successfully because we need an effective and efficient government.”

Army Acquisition Executive Describes Efficiency Measures During Visit to Aberdeen Proving Ground

ARMY NEWS SERVICE (AUG. 23, 2011)

Claire Heining Schwerin

ABERDEEN PROVING GROUND, Md.—With praise for an Army acquisition workforce “on the front lines” of supporting soldiers, the Service’s top acquisition official recently outlined key steps the Army is taking in its drive for efficiencies.

“We’re facing fiscal realities,” said Heidi Shyu, acting assistant secretary of the Army for Acquisition, Logistics and Technology, or ASA(ALT), during a town hall meeting Aug. 19 at Aberdeen Proving Ground. “We’re all sharing the pain.”

Shyu described ASA(ALT)’s progress on the Department of Defense-wide Better Buying Power initiative, saying “we have become a poster child” for successfully identifying opportunities for cost savings and cost avoidance.

“The message absolutely is getting through” to the contracting community, Shyu said. “We’re going to bring a lot more competition into the system.”

At the same time, open communication with industry can result in smoother processes and better targeted investments in current and future capabilities, she said.

"They want more open exchange of information for them to judiciously invest," Shyu said.

Austerity-driven budget drills and a recent optimization study issued by a joint ASA(ALT) and Army Materiel Command task force also stand out as proactive steps in a cost-cutting environment, she said. They also show the Army is carefully weighing potential cuts to ensure key priorities are protected, she said.

Despite the fiscal constraints, Shyu stressed the need to maintain the strength and quality of the acquisition workforce—calling it one of the areas "we're trying to protect and grow."

Shyu also answered employees' questions on various topics, from her own professional background to streamlining the acquisition process to more quickly meet the needs of troops. The session, with several hundred employees attending from the Program Executive Office—Command, Control and Communications-Tactical, known as PEO C3T, and Intelligence, Electronic Warfare and Sensors, or PEO IEW&S, was part of a series of town hall visits with the ASA(ALT) workforce Shyu has assembled since taking over her position in June.

PEO C3T provides soldiers with the computer systems, radios, and communications networks they require to succeed in a full spectrum of operations. The organization develops, acquires, and fields to all Army units a range of products including specialized software applications, generators, radios, computers, servers, and communications systems; and integrates these and other systems together so they function seamlessly, while providing on-site training and support for these systems deployed worldwide.

The PEO IEW&S provides soldiers with affordable, world-class sensor and electronic-warfare capabilities, enabling rapid situational understanding and decisive action. PEO IEW&S products are used for targeting; situational awareness; force protection; and reconnaissance, surveillance, and target acquisition, or RSTA. These critical systems are integrated into the network's layers and enable persistent surveillance, allowing the joint warfighter to control time, space, and the environment, while greatly enhancing survivability and lethality.

"You guys are the core of ASA(ALT), who are on the front lines doing the real work," Shyu said. "This is incredibly useful to me."



Acting Assistant Secretary of the Army for Acquisition, Logistics and Technology Heidi Shyu speaks during a town hall meeting Aug. 19, 2011, at Aberdeen Proving Ground, Md.
U.S. Army photo

Shyu is also conducting monthly program reviews with the 13 PEOs that make up ASA(ALT), as well as visits with troops. She recently met a soldier injured in theater who had a prosthetic replacement for a fused right ankle.

"Next month, he's running a marathon," she said, adding that he will deploy again in November. "That's our soldier. That's why we're here on a daily basis."

Schwerin is with Program Executive Office—Command, Control and Communications-Tactical.

Providing Full Spectrum Contracting and Acquisition Services at the Tip of the Spear

ARMY NEWS SERVICE (AUG. 23, 2011)

Larry D Mccaskill

PICATINNY, N.J.— Responsible for executing the contracting mission of the Joint Munitions and Lethality Life Cycle Management Command and other federal agencies, the Army Contracting Command-Picatinny prides itself on providing contracting support that places the tools of war directly into the hands of warfighters worldwide.

Located in a picturesque corner of New Jersey's Picatinny Arsenal, the organization is one of the U.S. Army Contracting Command's six major contracting centers.

"We provide the full spectrum of contracting and acquisition advisory services in support of the Army's firepower and lethality requirements, inclusive of weapons, armaments and munitions systems, and subsystem components," said Bruce B. Berinato, ACC-Picatinny executive director. Execution of our mission includes contracting for all phases of research and development as well as initial and follow-on production and involves use of both FAR (Federal Acquisition Regulation) based contracts as well as non-FAR instruments such as cooperative agreements and other transactions."

"We continually strive to push the envelope in getting requirements awarded in expedited timeframes utilizing innovative approaches," said Paul Milenkowic, ACC-Picatinny deputy director.

One recent and noteworthy accomplishment for the team was the urgent fielding of the Accelerated Precision Mortar Initiative in Afghanistan.

"The technology within the round is a real game changer, and our getting it awarded through the urgent material release process, fielded, and delivered within a year is testimony to trying new approaches," Milenkowic said.

Using everything from cooperative research and development agreements to transitioning to FAR-based production contracts to working the process in parallel layers—executing one phase and at the same time planning for the next—the Northern New Jersey team ensures they do everything they can to get items to the warfighter as quickly as they can. Berinato said surrounding himself with talented people makes him believe anything is possible.

"One important aspect is having talented people that are naturally curious and like to seek knowledge. We believe many of our associates have this attribute and are truly top notch. Communication up, down, and across contracting and the acquisition community really is helpful too. We have a high percentage of new associates in our center and they all quickly learn that they can't be in a position to know-it-all," he said. "So sharing and building a personal network becomes apparent and really important, no matter where you sit in the organization. The bottom line is listening, clearly communication, reading, knowledge sharing, and more reading."

Like other contracting organizations within the government, it's been a challenge for ACC-Picatinny to develop and retain contracting officers

"We're aggressive in getting our employees' DAWIA [Defense Acquisition Workforce Improvement Act]- level training accomplished timely and ensuring they are gaining good work assignments and broad experiences. The hardest part is trying to figure out how to accelerate an individual's experiences as part of overall career development," Berinato said.

"We've started a rotational developmental program involving assignments in a program management office and offices within the command. The end goal is to broaden some of our graduating intern's experiences in acquisition, build relationships with our core customers, and based upon these experiences, be a better educated buyer when they finish the assignment."

Six Decades of Government Service No Small Feat

U.S. ARMY GARRISON REDSTONE (AUG. 25, 2011)

Skip Vaughn

REDSTONE ARSENAL, Ala.—After 60 years of government service, Rosa Smalls figures she'll do what she wants to do.

So she's retiring and returning to her native Philadelphia.

"I'm going home," Smalls said at her retirement celebration in the Sparkman Center. She served as a logistics management specialist in the lead AMC integration support office since 1993.

Gen. Ann Dunwoody, commander of the Army Materiel Command, presented a four-star letter and coin to Smalls.

"I just want to say thank you for your service," Dunwoody said. "You look like you are ready to do another 60, though."

But that's not in her plans. Smalls plans to move to Philadelphia at the end of September to be with her family. She has a daughter, granddaughter, grandson, and great-granddaughter. Her husband Leroy died in 2000.

"I want to do everything that I wasn't able to do during the time I was working," she said. "I'm serious—everything I desired to do but couldn't do because I was working. Next year they're having a retirement cruise for me."

She said her family plans to give her that cruise in May 2012.

During the retirement celebration, she recalled her government career. Born and raised in Philadelphia, she graduated

from high school and didn't have enough money for college. So she looked for work. After no success finding a government job, her parents convinced her to try one more time.

"Fortunately I believe in being obedient, especially to your parents," she said. This time her doorbell rang and it was Western Union—"so you know I'm going back 60 years," she quipped—with the good news that she was hired for 90 days.

"I want to tell you 90 days turned into 60 years," Smalls said.

Mccaskill is with U.S. Army Contracting Command.

Army Announces Greatest Inventions

RESEARCH, DEVELOPMENT AND ENGINEERING COMMAND
(SEPT. 12, 2011)

David McNally

ABERDEEN PROVING GROUND, Md.—Army officials announced the winners of its greatest inventions competition Aug. 23. Earlier this summer, a panel of combat veteran soldiers reviewed and voted for the most innovative advances in Army technology.

"The contributions made by these teams promise to improve the well being of soldiers and the Army's capability to contribute to quality of life and our national security," said Maj. Gen. Nick Justice, U.S. Army Research, Development and Engineering Command commanding general. "I would like to expressly thank you for submitting your Army Greatest Inventions nomination packages, which continue to make the Army Greatest Inventions program a success."

The winners, in alphabetical order:

40mm Infrared Illuminant Cartridge, M992: Soldiers now have capabilities to engage the enemy far more effectively during nighttime operations. The Army's new infrared illuminating cartridges/projectiles produce infrared light that is invisible to the naked eye, but is clearly visible through night vision devices that U.S. soldiers use in Iraq and Afghanistan. (Source: Armament Research, Development and Engineering Center)

5.56mm M855A1 Enhanced Performance Round: Since June, the Program Executive Office for Ammunition at Picatinny Arsenal has fielded about 30 million new 5.56mm M855A1 Enhanced Performance Rounds in Afghanistan. The bullet has been redesigned and now features a larger steel penetrator on its tip. A notable feature of the EPR is that its bullet features a copper core. (Source: Armament Research, Development and Engineering Center)



Rosa Smalls, a logistics management specialist in the lead AMC integration support office. Smalls recently retired with 60 years of federal civilian service.

U.S. Army photo

Green Eyes-Escalation of Force Kit Integration with the CROWS System: The system emits a wide band of green light that temporarily disrupts a person's vision so that driving a vehicle or aiming a weapon becomes difficult if not impossible. One application would be to warn civilians away from checkpoints and other areas where their safety is at risk. At closer distances, the lasers provide an immediate, non-lethal capability to deter aggressive actions. (Source: Armament Research, Development and Engineering Center)

Husky Mark III, 2G 2-Seat Prototype: This landmine detection vehicle is blast-survivable, overpass-capable and field-reparable. Officials said the second generation 2-seat prototype is a natural evolution of the larger MK III Husky. The Husky Mark III/2G 2-Seat Prototype responds to the immediate warfighter need to mitigate the risks of task overload on the Husky operator, increases the Route Clearance Package's ability to find and neutralize improvised explosive devices, or IEDs, and provides direct fire capability for the lead vehicle of the RCP.



One of the Army's Greatest Inventions of 2010: The M240L 7.62mm Medium Machine Gun (Light) reduces the weight of the existing M240B without compromising reliability.

U.S. Army photo

The kit allows for the platform to be transported with air assets in a roll-on-roll-off configuration, increasing the readiness level and, at the same time, decreasing the logistical footprint and costs of maintaining the equipment in the theater of operations. (Source: Aviation and Missile Research, Development and Engineering Center)

Jackal Explosive Hazard Pre-Detonation System: The Jackal is an IED defeat system designed to remove the threat of IEDs against soldiers, tactical vehicle platforms, and overall mission success. In 2010, the Armament Research, Development and Engineering Center developed and fielded Jackal to soldiers throughout Iraq to help counter roadside bombs. In particular, Jackal neutralizes the lethal IED threats putting soldiers at risk during route clearance and convoy-related missions.

Jackal functions to keep soldiers outside the IEDs area of lethality and increase the survivability of vehicle platforms. Unlike its predecessors, the Jackal is designed to be modular and adaptable to new and emerging IED devices. Therefore, the Jackal provides significant capability to the soldier and their mission and, more importantly, saves lives. (Source: Armament Research, Development and Engineering Center)

M240L 7.62mm Lightweight Medium Machine Gun: The new machine gun reduces the weight of the existing M240B

without compromising reliability. "The titanium M240L represents a leap in weapons technology inspired by soldier feedback. The lessons learned from this program will undoubtedly benefit future weapons systems that will maintain our continued advantage on the battlefield," said Col. Douglas Tamilio, project manager soldier weapons for PEO Soldier. (Source: Armament Research, Development and Engineering Center)

mCare Project: mCare, short for mobile care, is a cell phone based bi-directional messaging system developed by the U.S. Army Medical Research and Materiel Command's Telemedicine and Advanced Technology Research Center. mCare was developed by modifying commercial off-the-shelf technologies to meet the unique needs of the Army Medical Department. A secure, HIPAA-compliant messaging system was needed to operate on wounded warriors' existing mobile devices, in a manner uniquely distinct from text messaging or email.

This allows members of the care team to connect with warriors-in-transition throughout their outpatient recovery process through a device they already own and are familiar using—their personal cell phone. (Source: U.S. Army Medical Research and Materiel Command)

Mortar Fire Control System—Dismounted: The MFCS-D reduces time to fire first round from eight minutes during the day and 12 minutes at night to less than two minutes for both day and night. The kit consists of ruggedized computers, battery power supplies, displays, navigation and pointing hardware, and associated mounting hardware.

The system enhances the responsiveness of the M120A1 120mm Towed Mortar System, enabling digital coordination of multiple systems and fire support network and significantly reducing time required to emplace, fire, and displace the weapon. (Source: Armament Research, Development and Engineering Center)

RG-31 Robot Deployment System: The need for a low-cost and lightweight solution in transporting and deploying route clearance robots in combat brought on the development of the TARDEC RG-31. The system enables soldiers to comfortably transport, deploy, and operate road clearance robots from the protected area inside the vehicle.

The RDS kit allows for route clearance units to use the full range of robotics capabilities without having to physically unload and deploy the equipment out the back of the vehicle by hand, exposing them to enemy threats. The system will have a positive impact on how soldiers transport, deploy, and engage roadside threats in combat for years to come, officials said. (Source: Tank Automotive Research, Development and Engineering Center)

Soldier Wearable Integrated Power Equipment System: The Soldier Wearable Integrated Power Equipment System, or SWIPES, utilizes the MOLLE vest and integrates force protection electronics and communications equipment with an advanced battery power source. The use of BA-8180/U and BA-8140/U Zinc-air batteries for direct power of equipment allows for extended mission times without the burden of power source swaps or power source charging due to their high-energy density.

This combination can extend operating times of communication systems and surveillance equipment for search and rescue operations. The SWIPES allows for individual tailoring by the warfighter and is designed to accept new applications as they become available. (Source: Communications-Electronics Research, Development and Engineering Center)

Ironman Pack' Ammunition Pack System for Small Dismounted Teams: Staff Sgt. Vincent Winkowski and fellow members of the 1st Battalion, 133rd Infantry Regiment of the Iowa National Guard originally rigged their own prototype design for this high-capacity ammunition carriage system

enables a machine gunner to carry and fire up to 500 rounds of linked ammunition from a rucksack-like carrier.

Culvert Denial Process: Cpl. Eric DeHart, 428th Engineer Company, designed and built a culvert-denial system to stop the placement of roadside bombs in culverts. The device looks like a screen across the opening and allows water and debris to pass through but doesn't leave enough space for improvised explosive devices.

The Army's Greatest Inventions awards are truly Soldiers' Choice awards, Justice wrote in an announcement to the Army's research, development and engineering workforce.

"All of the nominated inventions demonstrate significant contributions to the warfighter," he said.

A panel of noncommissioned officers with recent combat experience as well as hands-on, practical experience, in addition to a panel of TRADOC field grade officers, judged the nominations.

McNally is with RDECOM.

Army Demonstrates New Agile Acquisition Process to Industry Partners

ARMY NEWS SERVICE (SEPT. 15, 2011)

Katie Cain

WASHINGTON—The Army hosted an Industry Day for defense contractors Sept. 8 to introduce its new agile acquisition process and how the Network Integrated Evaluation supports it.

The event took place in El Paso, Texas, and at White Sands Missile Range, N.M.

More than 150 representatives from 60 companies—both large defense corporations and smaller business entities—came to learn more about the Army's testing and evaluation process and how they can participate in the Network Integrated Evaluations, or NIEs.

The NIEs are semi-annual evaluations designed to integrate and mature the Army's tactical network and are a key element of the Army's emerging Network Strategy.

The first evaluation—termed NIE 11.2—was conducted in June/July and involved nearly 3,800 soldiers and 1,000 vehicles of the 2/1 AD. The second iteration in the series, dubbed NIE 12.1, is slated for November 2011.

Entrance, evaluation and exit criteria, along with test and evaluation conditions were explained by leadership, while soldiers emphasized the importance of working concrete training plans for the systems inducted in the NIEs as part of the Army's new Agile Process.

"The Agile Process is truly a new way of doing business, and this first Industry Day provided an important environment for industry and Army collaboration," said Paul Mehney, chief of public communications for PEO Integration.

By employing the Agile Process, the Army is able to keep pace with technological advances, accelerating the pace of network modernization to a rate unachievable by traditional acquisition strategies. The Agile Process focuses primarily on meeting identified and prioritized capability gaps by integrating emerging technological solutions through iterative, pre-defined, predictable windows for testing and insertion that are aligned with the Army Force Generation, or ARFORGEN, process.

"We listened to feedback that industry provided on how we are managing the Agile Process and we intend to make improvements based on that. As we continue through solidifying the Agile Process, it needs to be a collaborative activity with industry, and events like this are important steps in making that happen," he said.

The full-day event familiarized industry with the NIE process, introduced the major Army organizations involved and their missions, and showed how the NIE's evaluation brigade—2nd Brigade, 1st Armored Division—is structured and what equipment it possesses.

"By allowing industry leaders to see how this unique brigade is structured and to talk with soldiers who operate the equipment, [they] were able to familiarize themselves with potential integration challenges as they bring capabilities into the NIE process," Mehney said.

Industry representatives were provided a first-hand look at the test/evaluation ranges and environmental conditions at WSMR. Various facilities where they will operate out of pre-, during- and post-NIE were toured.

During the inaugural Industry Day, leaders from the Brigade Modernization Command, Army Test and Evaluation Command, and Program Executive Office Integration, known as PEO I—a group known as the "TRIAD"—demonstrated how the NIEs support the Army's overarching network strategy to create a mobile, secure, wireless battlefield network for our soldiers.

Keying off lessons learned from NIE 11.2, Service leaders repeatedly stressed the Army's commitment to providing network connectivity and Mission Command capabilities to the small unit (company and below)—the dismounted soldier at the tactical edge who represents the Army's most challenged and vulnerable user.

Future NIE players left Industry Day with a better understanding of the Army's new business model.

"This is an incredible industry day," commented one industry representative. "The Army has set the mark really high by using the panel presentations and motor pool tours to clearly articulate the process and address industry concerns."

Approximately 50 networked and non-networked technologies will be assessed during NIE 12.1. The primary purpose will be to continue required evaluations in support of Program of Record milestones, and advance the integration and understanding of the Army's objective and bridge network architectures.

It will also begin to establish the Objective Integrated Network Baseline, common connectivity across the Brigade Combat Team structure, and introduce industry participation in the NIE evaluation cycle.

This second NIE will build off lessons learned from the June and July NIE evaluation in order to support the Army's holistic focus to integrate network components simultaneously in one operational venue.

Cain is with U.S. Army PEO Integration.

Army Technology Leader Inspires Engineers

RESEARCH, DEVELOPMENT, AND ENGINEERING COMMAND
(SEPT. 22, 2011)

Joseph Ferrare

MONTEREY, Calif.—Engineers have to change how they think and challenge every assumption if they want to develop the best equipment for America's fighting men and women, said Maj. Gen. Nick Justice at the Naval Postgraduate School System Engineering Lessons Learned Conference yesterday.

"Look at our vehicles. It's amazing the amount of equipment we put in a vehicle, and the only integration we do on that vehicle is to ask that 18- or 19-year-old soldier to integrate it in his mind," Justice told attendees at the conference held Sept. 20-21 in Seaside, Calif.

"Those systems were designed to make things easier on those soldiers, but we're complicating their lives instead of

making them easier. Those engineers set out to do a good thing—we all do,” he said. “We are going to build a good system. But we do it in a vacuum. We do our little piece.”

The lesson, Justice said, is that engineers need to make sure their systems integrate with the other systems—and with soldiers.

“When you’re doing systems engineering, you’ve got to think about people as part of that system, if not the system itself.”

Putting soldiers at the heart of the system is just the beginning of how the Army has asked engineers to challenge every assumption, he said.

“For example, our systems in the military today are bounded by the infrastructure. What does that mean? Take electricity. The light bulb was invented around 1880. It hasn’t changed much. How does that limit what we do today? Some of our modern equipment draws very little power, but what kind of electricity do we plug it into? One hundred and ten volts because that’s what was needed in 1880.

“We have to think about the legacy systems we have to deal with and what they do to our thinking. You have to be careful how you define the problem, because that defines how you think about it,” Justice said.

Army engineers are now rethinking how they design equipment for soldiers, Justice said.

“How we equip soldiers is really a great example of non-systems thinking. Look at the redundancies. They have a scope for their weapon and another set of optics in their night vision. They have a weapon that hasn’t really changed that much since it was invented. If they’re in charge, they probably have a couple of radios—one for talking to up the chain and one for talking with the people around them, and so on.

“We need to bring that down to one set of optics and one radio. We’re looking at radical infrastructure changes that will make that soldier’s life better,” he said.

Such changes also allow the military to have a system ready to adapt to new threats and new environments without having to reengineer systems from the ground up.



Maj. Gen. Nick Justice tells those attending the Naval Postgraduate School System Engineering Lessons Learned Conference in Seaside, Calif., they must change the way they think and challenge all their assumptions to bring all the benefits of system engineering to America’s fighting men and women.

U.S. Army photo by Joseph Ferrare

“Many of the challenges we face in DoD today are challenges over time. Many of the things we put in the field today are state of the art when they’re fielded, but we have to invest over time. Look at the B52 bomber. It may end up having a longer lifespan than anyone in this room.”

An example of how to address these issues is the Victory Architecture, a successful example of changing the infrastructure, Justice said.

“We wanted to get away from what we have now where we have multiple systems bolted onto a vehicle, and to something unified with a set of standards we can design to so everything works together for the soldier, instead of the soldier working to make everything work.

“So we went out to industry and asked them to participate in looking at our vehicles,” Justice said. “What we got was what we call the victory architecture. It took us about three years, but the victory architecture will allow us to go back

to the beginning and design in integration and get greater capability and take burden off the soldiers.”

Ferrare is with RDECOM.

Air Force GPS Program Receives International Award

AIR FORCE PUBLIC AFFAIRS AGENCY (OCT. 5, 2011)

Air Force Staff Sgt. Richard A. Williams Jr.

ARLINGTON, Va.—The Air Force Global Positioning System program was recognized Oct. 4 by officials at the International Astronautical Federation with a special award during the 62nd International Astronautical Congress in Cape Town, South Africa.

The IAF, which celebrates its 60th anniversary this year, established a one-time 60th anniversary award to honor the occasion and “recognize an organization or key individual for a singular and successful project in the field of space applications, space science and exploration, which could demonstrate through its implementation, that measurable benefit to humanity has been achieved,” according to the IAF website.

Nominated by the American Institute for Aeronautics and Astronautics, the space-based navigation and timing system was selected as the award recipient by the IAF for the “uniqueness of the GPS program and the exemplary role it has played in building international collaboration for the benefit of humanity.”

Gen. William L. Shelton, the Air Force Space Command commander, accepted the award in Cape Town on behalf of the Air Force.

“This is a tremendous honor for the Air Force, Air Force Space Command, and everyone on our GPS team,” said Under Secretary of the Air Force Erin Conaton. “We are proud to have developed and invested in this remarkable system that our airmen continue to operate, sustain, and modernize for the benefit of billions of people.

“In addition to being a vital asset for our military and our nation, GPS is an international treasure that enables countless economic transactions,” she said. “Its contributions to the global economy are enormous—by one estimate more than \$100 billion every year.”

GPS is a space-based radio-positioning system that provides precision navigation and timing information to military and civilian users worldwide, officials said. Since its origin more than 30 years ago, GPS has evolved into an indispensable resource that enables technologies employed by users every

day in a variety of government and private sectors, to include agriculture, banking, transportation, weather, and defense.

In its official award nomination package to the IAF, the American Institute of Aeronautics and Astronautics stated, “No other single space product, program, or system has led to human benefits that are even remotely close to those that have resulted from GPS.”

Official Lauds Business Task Force for Success

AMERICAN FORCES PRESS SERVICE (OCT. 5, 2011)

Army Sgt. 1st Class Tyrone C. Marshall Jr.

WASHINGTON—The Task Force for Business and Stability Operations’ ability to find ways of creating growth, prosperity, and optimism about the future in Iraq and Afghanistan is praiseworthy, a senior Pentagon official said today.

“You have made an extraordinary impact in both Iraq, and now beginning in Afghanistan, in a very short time with, frankly, very limited resources,” said Michele Flournoy, under secretary of defense for policy, during an awards ceremony in the Pentagon’s Hall of Heroes honoring task force members for their service.

The task force was established in June 2006 to aid in the revitalization of Iraq’s economy and to create jobs for the Iraqi people, and since then, has transitioned to Afghanistan. The group focuses on initiatives to restore the core industrial capability of a country’s economy through direct investment, banking and financial networks, industrial revitalization, corporate development, private-sector development, procurement assistance, and agriculture revitalization.

“The task force deployed more than 600 business leaders, engineers, subject-matter experts, [and] accountants to work in every province across Iraq,” Flournoy said. “By the time the organization wound up its operations last January, you really helped to lay the ground work for Iraq’s economic stability and future growth across a wide range of critical sectors.”

Flournoy provided examples of progress in Iraq, including establishment of a national investment commission that issued more than \$2 billion in investment licenses for new business development.

“You all facilitated more than \$8 billion in private investments to re-open a number of state-owned enterprises across Iraq,” Flournoy added. “Through the task force’s initiatives, 66 factories throughout the country ... were re-opened or increased production, creating something like 100,000 jobs restored across Iraq—critical industrial revitalization.”

Flournoy also lauded the task force for its effective transition to Afghanistan.

“As the war in Iraq began to wind down and our focus shifted over to Afghanistan, so too did many of you,” she said. “And this was really above and beyond the call of duty to go from serving in one war zone, pick up, and go to serve in another. In Afghanistan, Flournoy said, economic and social conditions are even more challenging than what the task force encountered in Iraq..

“But your mission in Afghanistan is just as crucial to our objectives there,” she added. “President Obama has been very clear: our core goal in Afghanistan is to disrupt, dismantle, [and] defeat al-Qaida, and make sure Afghanistan is never again a safe haven for terrorists to attack the U.S. homeland—an absolutely vital interest.”

Flournoy cited the death of Osama bin Laden as part of “genuine and hard-fought progress” in Afghanistan.

“But there are many others,” she noted. “Afghan and coalition forces in Helmand, Kandahar, throughout the south and southwest, have denied the Taliban their former strongholds and steadily degraded the insurgency where it used to be strongest.”

Flournoy emphasized how “absolutely essential” economic and governance progress has become to consolidate and sustain gains over the long term.

“This is where you all come in,” Flournoy said. “This task force, and all of its members, has risen to the challenge in Afghanistan.”

Flournoy commended the task force for its “outstanding contributions” to progress in Afghanistan.

“There’s a story for each and every one of you, but it’s just a handful of these stories that really underscore key qualities of all of you—courage, sacrifice, incredible patriotism, resourcefulness, and ingenuity,” she said. “Those are the characteristics that define the people on the task force and the task force’s work, and we are so incredibly grateful for the work that you have done.”