
OUR VEHICLES OUR SUPPLIES OUR COURAGE YOUR GUARD

Your Guard can be counted on when called to respond to wildfire or other natural disasters that threaten your community's safety and property. The Citizen-Soldiers and -Airmen of the National Guard fight fires on the ground and from the skies, while providing food, water and shelter to victims, and evacuating those in harm's way. Striking back at wildfire is just one way that the more than 459,000 men and women of your Guard protect our homeland in times of need, demonstrating their commitment to be *always ready, always there*.

When wildfire strikes, your National Guard
is always ready to strike back.



Always Ready, Always There.
THE NATIONAL GUARD
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CHRONICLING THE 460,000+ MEN AND WOMEN OF THE NATIONAL GUARD

ON GUARD

JUNE 2010 • VOLUME 2 • ISSUE 2

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From the Editor:

I've been at the helm of the On Guard for four years now, and it always amazes me the array of missions the Guard is asked to do. It seems that whenever there are lives or property at risk, the Guard is part of the response effort, in numbers few and large.

From a sole helicopter and crew rescuing a stranded hiker in Denali National Park, to thousands called up to protect shoreline from toxic crude in the Gulf, the Guard is what the states turns to in an emergency.

"Disaster on the horizon" on page 5 gives an overall picture of what's been done by hardworking and ingenious troops fighting an environmental disaster in the Gulf Coast.

From energy lost to energy saved: the Guard is doing a lot to shrink its utility bills at its many facilities as we found out. From painting roofs a lighter color so that they reflect the hot summer sun, to installing solar arrays that turn it into electricity, the Guard is working hard to meet federal goals on energy use.

*Soldiers rarely show emotions in combat, but you'd be hard pressed **not** to find tears in the eyes of fathers and sons who reunite while in Iraq in Afghanistan. We highlight three pairs in "Unlikely Reunion."*

Along with our talented staff, we feature several stories from the field.

Army Maj. Craig Heathscott from the Arkansas Guard will put you at attention in "Out of respect," an article about Guardmembers in a rigorous military funeral honors course. Only perfection will do in the presence of a grieving family. One student said it all: "We are a reflection of what they lost."

Tech. Sgt. Oshawn Jefferson chronicles the efforts of a handful of Ohio Air Guard civil engineers in Afghanistan that are "laying the foundation for a successful troop surge."

We scooped up an article from the Indiana Guard on caffeine use and re-ran it here so you can brew over your use of the Guard's number-one stimulant. Thanks for lifting our awareness Sgt. David Bruce.

There's also some "news you can use"—a few safety messages and a list of summer family discounts.

As always, thanks for reading and let us know what you think.

-Master Sgt. Greg Rudl

ON GUARD

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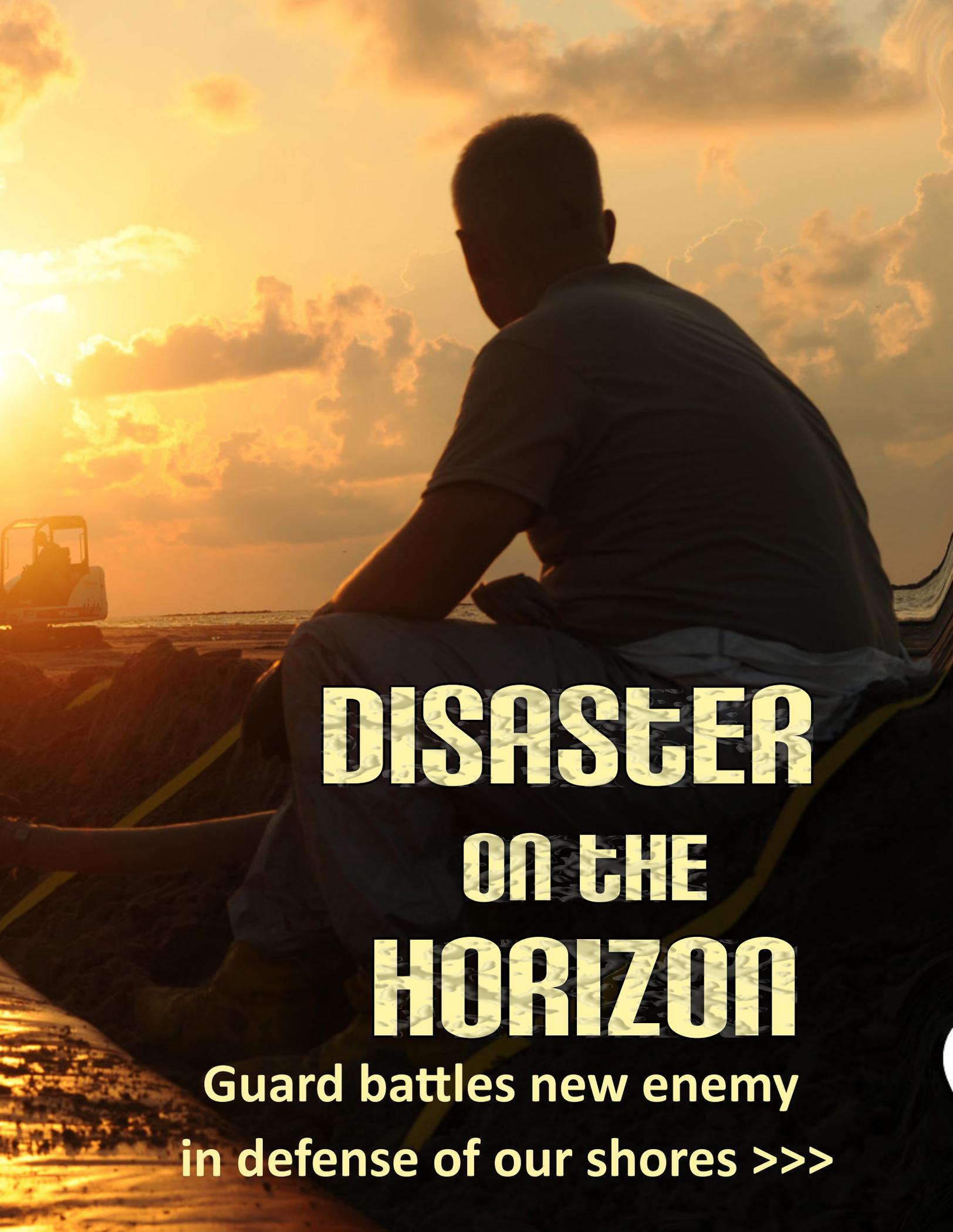
SUBMISSION

E-mail your stories and photos for possible inclusion. We prefer that photos be high-quality digital (300 dpi or more) and e-mailed to: Editor.OnGuard@ng.army.mil

On Domestic Response



Soldiers with the Louisiana Army National Guard work through the night to construct a Tiger Dam interlocking water diversion system in Grand Isle, La., May 31 in support of the Deep Horizon oil spill clean-up efforts. (Photo by Staff Sgt. Jeffrey T. Barone)

A man in silhouette is sitting on a boat, looking out at a construction site on the water during a sunset. The sky is filled with orange and yellow clouds, and the sun is low on the horizon. In the background, a large piece of construction machinery is visible on the water.

DISASTER ON THE HORIZON

Guard battles new enemy
in defense of our shores >>>

Guard in epic battle to protect Gulf Coast from oil contamination

Just days after oil was detected leaking from where the Deepwater Horizon drilling rig once stood, thousands of Guardmembers from at least six states were called up to assist local communities in the cleanup and removal of oil and to protect critical habitats from contamination.

But as hundreds of thousands of barrels of oil continue to billow out of a broken riser pipe almost a mile down, and with many experts saying that the leak won't be stopped until as early as August when relief wells are drilled, can the Guard really make a difference?

The answer is simple: They already have. From building barriers that protect sensitive marshlands to giving officials a bird's eye view of oil slicks, Guardmembers are a much-needed asset in the fight.

As with any national crisis, the Guard is once again part of the solution, supporting federal, state and local organizations.

Heavy equipment operators, communications and security specialists, civil engineers and

strong-backed sergeants went to work immediately. They deployed boats, all-terrain vehicles, dump trucks, security vehicles and communications equipment to the affected area.

The Guard has made a difference on land:

One of the Guard's biggest feats occurred June 7 when it filled eight breaches on Pelican Island in coastal Plaquemines Parish, La., with sandbags ranging from 2,000 to 4,000 pounds each. The same day it finished installing almost six miles of a shoreline protection system near Venice, La.

In the air:

Helicopters have sling-loaded sand bags weighing thousands of pounds and have dropped them into island breaches to stem the flow of oil into critical waters and marshes. Many of the same helicopters are also employed to transport Soldiers and Airmen to

This is Cajun ingenuity. This is south Louisianians at our best to fight and protect our way of life

-Louisiana Gov. Bobby Jindal after observing oil suction operations June 9

These Tiger Dam systems are interlocking rubber bladders filled with water which create a continuous barrier to prevent oil from washing ashore. (Photo by Staff Sgt. Jeffrey T. Barone)



and from remote work sites, and to transport the critical pieces of engineering the troops need to perform their missions, such as fuel pallets and generators.

In the water:

The Louisiana National Guard deployed a 380-foot, floating bridge to serve as temporary wharf; it was once used by U.S. forces to cross the Tigris and Euphrates Rivers during the invasion of Iraq.

Non-Gulf states are pitching in too:

Helicopters and aircrews from the Illinois, Missouri, Florida, Mississippi and Nebraska, some of them veterans of Hurricane Katrina and Gustav relief, were brought in.

Though the work ahead may seem daunting, the Guard knows what to do in a disaster and how to recover from one. It has removed fallen tree limbs after tornados in the Midwest, plowed snow-drifts after blizzards in the North and West, and used special equipment to check for toxic wastes after hurricanes in the South.

Though the cleanup and the capping of the leak may have most people's attention, the Guard is providing security, medical capabilities, communications support and command and control functions.

What began as a "potential" environmental disaster has, by most accounts, become America's worst.

As the scope of it intensifies over the summer and with the threat of hurricanes and tropical storms looming, Citizen-Soldiers and -Airmen in the affected Gulf states will continue to do battle.

While many of us will enjoy the lazy days of summer, Guardsmen will be toiling in the heat, humidity and a toxic environment—in a fight never before seen by them or America. 🇺🇸

-Compiled from news articles

Defending our shores

Current Ops in the Gulf

ERECTING BARRIERS

When these 7,500 pound bags of sand are placed together, they form a barrier wall that protects from encroaching oil. A 1,000 of them were used to erect a 2.5-mile barrier wall by Soldiers of the Louisiana National Guard May 29 on the shoreline of Port Fourchon to protect Bay Champagne.

HELICOPTER SUPPORT

UH-60 Blackhawks and CH-47 Chinooks are sling-loading sand bags, often weighing up to 6,000 pounds, and dropping them into island breaches to stem the flow of oil into critical waters and marshes. They also transport Soldiers and Airmen to and from remote work sites, and carry critical pieces of engineering the troops need to perform their missions, such as fuel pallets and generators.

TIGER DAMS

Tiger Dam systems are interlocking rubber bladders filled with water which create a continuous barrier and are being used as a preventive measure in case oil washes onto shore. Guardmembers are building miles of them, including a 5-3/4 mile one near Venice, La.

VACUUM BARGES

Operated by Guardmembers, these oil vacuum cleaners are made from pumps connected to tubes that can be individually operated by Soldiers to collect oil up to a mile out in the gulf. The two vacuum barges currently in operation, one comprised of military float bridges and the other on a civilian barge, are recovering about 1,000 gallons of oil each per day.

CLAIM INFORMATION

About 200 Alabama Guard members are working with local officials to ensure the paperwork to make any claims to British Petroleum is getting into the hands of those who may be eligible to file a claim

AERIAL RECONNAISSANCE

Specialists from the Florida Fish and Wildlife Conservation Commission have been flying in a Florida Army National Guard C-23 Sherpa airplane and an LUH-72 Lakota helicopter over the Gulf of Mexico each day, to spot oil encroaching near the beaches of Florida's Panhandle.

Time line to disaster

April 22

Deepwater Horizon oil rig sinks

April 24

First oil leaks discovered; USCG elevates response

April 25

Overflights indicate the oil spill size is approximately 48 miles wide by 39 miles long

April 30

The secretary of defense authorizes under Title 32 the mobilization of the Louisiana National Guard to help in the ongoing efforts to assist local communities in the cleanup and removal of oil and to protect critical habitats from contamination

May 1

Coast Guard Commandant, Adm. Thad Allen appointed to serve as national incident commander

May 4

SECDEF authorized use of Title 32 status for up to 17,500 Guard members in four states: Alabama (3,000), Florida (2,500), Louisiana (6,000) and Mississippi (6,000).

May 7-8

A 125-ton container dome is placed over the largest of the well leaks; it fails when gas leaking from the pipe combined with cold water to form methane hydrate crystals that blocked up the steel canopy at the top of the dome

May 13

1,304 Guard personnel supporting oil response—952 from the Louisiana are



A Louisiana Guardsman works through the night in Grand Isle, La., May 31. (Photo by Staff Sgt. Jeffrey T. Barone)

**... that leaves a lot of Guardsmen ready to help.
And if our governors call on them, I know they'll be
ready, because they're always ready**

-President Barack Obama June 15 referring to the 1,600 Guardmembers already called up and the 17,500 that could be



Louisiana Guardsmen hook sling cables, attached to sandbags, to the bottom of a Florida Guard CH-47 Chinook helicopter in Buras, La., June 5. (Photo by Spc. Tarell Bilbo)

providing command and control and sandbagging support to St. Bernard and Plaquemines parishes, supporting marina operations and conducting HAZMAT training; 323 from the Alabama are deploying protective barriers around Dauphin Island and conducting sandbag and security operations; 25 from the Mississippi National Guard personnel are providing helicopter support and liaison officers to aid local officials with emergency response

May 17

Elements of Louisiana Guard's 205th Engineer Battalion work with 1st Battalion, 244th Aviation Regiment fill and airlift sandbags to fill 16 breaches spanning more than seven miles from Pelican Island to Scofield Island, La.

May 20

Personnel and vessels from the USDA's Natural Resources Conservation Service assist the Louisiana Guard with technical engineering recommendations for stabilizing beach and headland areas where sand and earthen material is being placed to plug openings to prevent the oil from entering the wetlands

May 26

BP starts "top kill" attempt to seal the blown-out well

May 26

Missouri Guard UH-60 Black Hawk helicopters from Fort Leonard Wood, Mo., help with the response

May 29

Soldiers of Louisiana Guard's 527th and 769th Engineer Battalions complete a 2.5-mile wall of sand-filled Hesco Concertainer

Historical perspective

Not the Guard's first oil spill

By Bill Boehm

NATIONAL GUARD BUREAU

During the country's last, large-scale national oil spill, the crash of the Exxon Valdez in Spring 1989, the Alaska National Guard assigned 130 Guardsmen to duty after that ship ran aground on a reef in Prince William Sound and leaked over 10 million gallons of oil. The accident caused a tremendous amount of environmental damage and calls to halt all oil tanker traffic in the Sound. Until the Deepwater Horizon mishap, the Valdez tragedy evoked images of environmental catastrophe to millions.

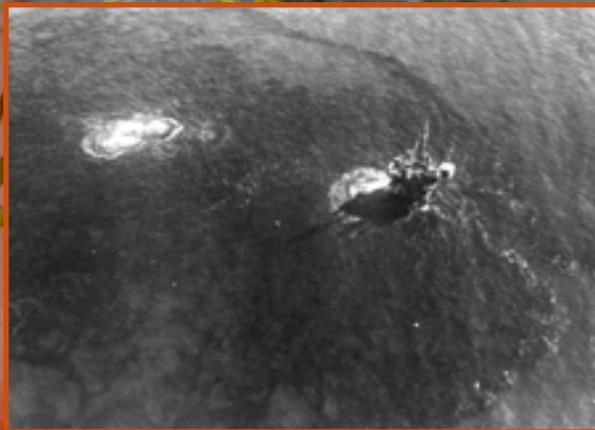
Another oil spill that holds a stronger parallel to today's current tragedy took place Jan. 28, 1969, near Santa Barbara, Calif. An offshore oil platform wellhead there blew out and spewed over 3 million gallons of crude into the Pacific Ocean, killing thousands of birds and other marine life. It will be remembered by thousands of images of volunteers along the shoreline trying to save wildlife and minimize coastline damage.

The tragedy ultimately led to the start of the modern environmental movement. Soon afterward, the Environmental Protection Agency was founded, and other legislation put in place nationally in the interest of minimizing offshore drilling to protect wildlife and seaside habitats in waterway areas.

The Santa Barbara spill did not, however, spur Gov. Ronald Reagan to call out the California National Guard to assist in the cleanup or provide any security or crowd control. The decision to sideline the Guard may well have been a political one, since the presence of uniformed Soldiers or Airmen may have agitated local citizens on the beachfront. The Guard's force structure could have provided security at the disaster site, expediting volunteer efforts to clean birds and other animals by hand.

Now juxtapose the absence of Guardmembers in 1969 with the prominent role it's playing in the Gulf today. The fact that the National Guard has been tasked to assist in fighting the environmental damage of an oil spill speaks to how the Guard has evolved in the last 10 years. It has acquired equipment and capabilities that allow it to battle natural and chemical disasters. It underscores its transformation from a reserve force to a strategic fighting force, ready to tackle any challenge with which it is presented.

-Boehm is an NGB historian



Overhead photograph of oil spilled from the drilling platform, Santa Barbara, Calif., January 1969. Courtesy of the U.S. Geological Survey.

units in Port Fourchon, La., to help keep oil-tainted water from reaching Bay Champagne near Port Fourchon, La.

June 12

Hesco barrier wall equipment staged in Cameron to be placed along eight miles of shoreline by Louisiana Guard members

June 16

President meets with BP executives at the White House

June 22

Construction of 8.5 miles of wall barriers by Louisiana's 225th Engineer Brigade continues in six areas along the coast of Cameron Parish in an effort to keep oil-tainted water from reaching inland

June 30

Tropical Storm Alex turns into a hurricane and threatens Texas' coast; hampers efforts to control the spill; Texas Guard on standby

July 2

Louisiana governor announces that the Guard is providing a special team to assist the Coast Guard. The team will provide real-time information of skimming operations and oil collection

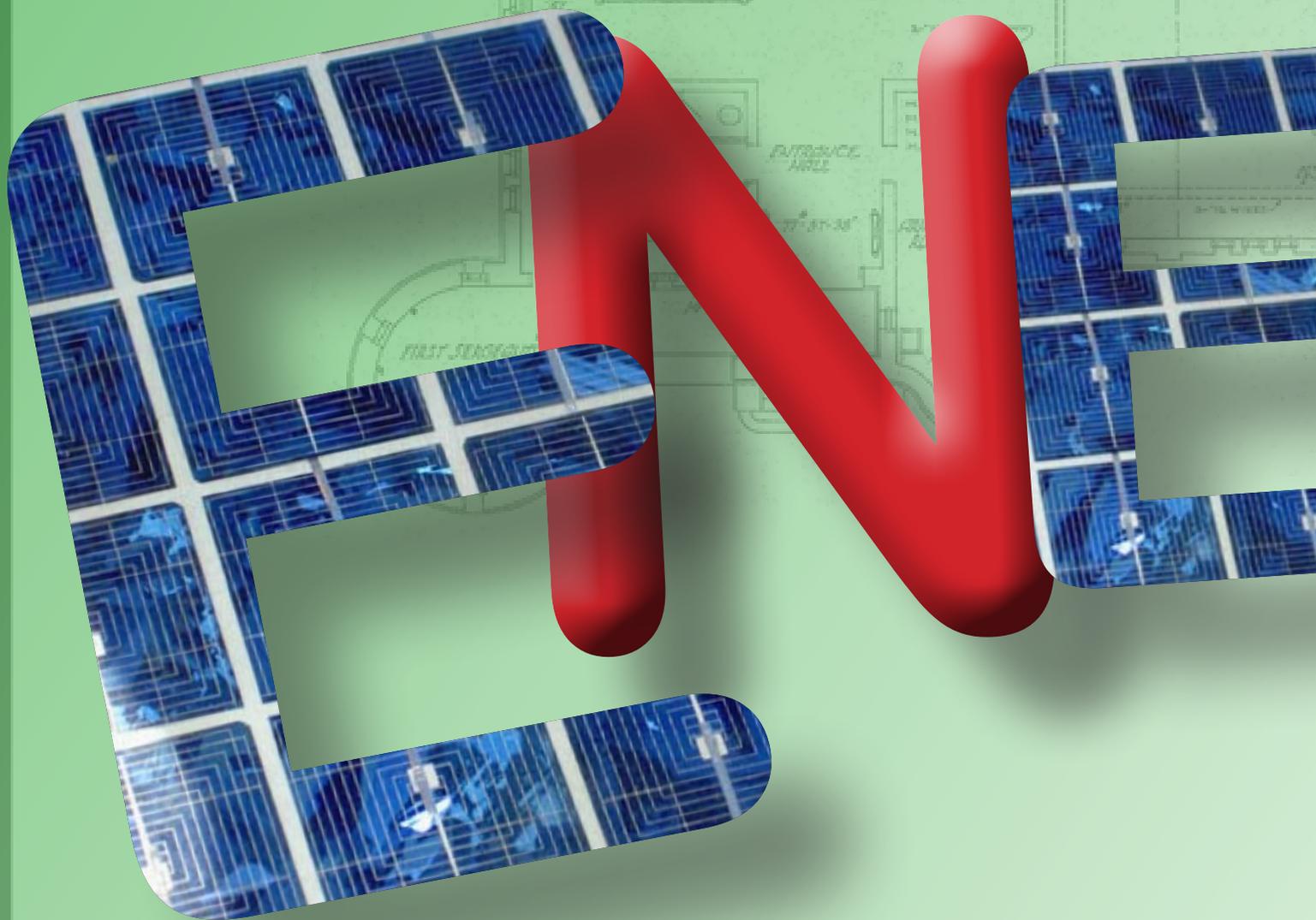
July 8

Officials announce that the Mississippi Guard has successfully taken part in the first monumental use of a state-of-the-art secure digital interoperable radio system that enables direct communications with the Coast Guard and civilian state agencies to guide cleanup vessels

-Compiled from www.whitehouse.gov and various National Guard news articles

With several green initiatives

Guard facilities are using less



The environmental disaster in the Gulf got us thinking about how the Guard uses energy and what's being done to use it more efficiently. Like the rest of America, we rely on petroleum products to power our tanks, trucks, aircraft and ground equipment, allowing us to operate whenever and wherever needed.

Though the Guard won't be operating any solar-powered jet fighters or battery-

powered tanks any time soon, and its demand for petroleum products is unlikely to wane, it is making great strides in how it heats, cools and lights its many facilities.

Like never before, the Guard is installing renewable energy systems based on solar and wind power and constructing more sustainable buildings. It's all part of a plan to use less energy but still remain a formidable fighting force.

RECO



STATE ARMY GLENS FALLS NEW YORK		PROJECT NO. 5692
DESIGNED BY J.P.M.	HEATING	SPECIFICATION NO. 10698
LOCATED BY J.P.M.	FIRST FLOOR PLAN	DATE JULY 21, 1941
CHECKED BY J.P.M.		SCALE 7/8" = 1'-0"
CROSS CHECKED BY J.P.M.		DRAWING NO. 41/2002
STATE OF NEW YORK DEPARTMENT OF PUBLIC WORKS DIVISION OF ARCHITECTURE WILLIAM E. HALL COMMISSIONER OF ARCHITECTURE		DATE AUGUST 20 1941

Air Guard works to lower its utility bills

By Air Force Master Sgt. Greg Rudl
NATIONAL GUARD BUREAU

The Air National Guard is working to lower its utility bill or at least slow the increase over the next few years.

Last year, it paid \$82 million for power to its 100 or so bases and 77 geographically separated units (GSUs), according to the ANG Renewable Energy Office. Two-thirds of that cost came from electricity and one-third from gas.

The Air Guard and the entire DoD must meet a goal of reducing energy intensity by 30 percent by 2015. It's a 10-year, 3-percent-a-year requirement that started in 2005.

"Energy intensity" is based on the power used per square foot of facility space.

Helping to meet that goal is Bob Bossert, the ANG's facility energy program manager, and his team at the Civil Engineering Technical Services Center at Minot Air Force Base, N.D. They support the field in all facility-related issues, including heating and

air conditioning and roofing systems.

They also make sure that the Air Guard achieves its energy goals by "reducing consumption and generating energy using renewables." The blueprint for that plan is conducting energy audits, installing smart meters and performing retro commissioning.

Energy audits

One way that Bossert's team helps the field save money on utility bills is by facilitating energy audits.

They contract with a team that visits a facility, identifies energy conservation opportunities and measures and assists them with programming projects.

He said the team will visit all ANG bases by the end of 2010.

The teams are typically made up of four to five people that spend two weeks on location.

"We'll take those energy audits and [from them] generate projects that upgrade our systems to make the buildings more efficient," said Bossert.

For the record, ANG facilities consumed 4.2 million MMBTUs (one million British Thermal Units), split roughly between electricity and natural gas, he said.

Smart meters

It's not using only less power, but consuming it at the right time. Energy used during peak hours costs more.

Bossert's office has facilitated the installation of smart meters at ANG facilities that monitor electric, gas and water consumption in real-time.

"We can track building by building the energy used ... every 15 minutes" and identify high-consumption buildings and high-demand times, he said.

The data supplied can be used to change work processes, like staggering the startup of shop equipment, which decreases the use of electricity during peak demand.

"Let's take washing an aircraft: Can we do that in the morning when the electricity is cheaper than in the afternoon when we'll pay more for it?" said Bossert.

Efficient systems

Along with energy audits and the smart meters, his office is doing the "blocking and tackling" of the ANG's energy program, so that bases can win at the utilities game.

They are doing facility retro commissioning – a process that seeks to improve how building equipment and systems function together – of between 1 to 1.5 million square feet of space at ANG bases per year.

"That's where a contractor will go in, evaluate how the heating, AC and lighting systems are working ... calibrate what needs calibrating, fix what's broken and get those systems working as efficiently as they can," he said.

Homemade green energy

Another way the Guard is controlling its utility bill is by producing its own renewable energy. Several facilities have installed or will be installing solar and wind systems. These systems produce power for the base and power that can also be fed back into the grid for energy credit.

The Air Guard must meet a goal of having at least 25 percent of its energy come from renewable, domestically produced sources by 2025.

Fresno Air National Guard Base in California has been operating solar arrays for about three years that produce 700-750 kilowatts per year, said Mark Bailey of the ANG renewable energy office, who works with Bossert. The 180th Fighter Wing (FW) of the Ohio Air Guard has also built one.

Bailey said that the Air Guard realizes that solar power can be produced in places where one wouldn't normally think it could and during the winter.

"Toledo [180th FW] found out that even when they have snow on the ground and snow on the solar panels, they're still producing electricity," said Bailey, adding that newer technology that improves performance is making this possible.



Arizona's 162nd Fighter Wing installed mobile solar floodlights on its flight line at Tucson International Airport. (Photo by Maj. Gabe Johnson)

On a smaller scale, Arizona's 162nd FW set up six trailer-mounted solar lighting systems to replace fuel-burning generator flood lights around its base at Tucson International Airport.

Even micro wind farms are being considered in geographically unlikely Guard bases like Duluth, Minn., and Columbus, Ohio, said Bailey. The base at Great Falls, Mont., home of the 120th FW, is looking into putting a fair-sized wind generation system in, which could be the largest so far for the Air Guard, he said.

The Virgin Islands Air National Guard on the island of St. Croix is considering one



Truax Field in Wisconsin is installing geothermal power. (Photo by Tech Sgt. Ashley Bell)

as well, which could satisfy all of its energy needs. "They get a lot of wind and they pay a lot for power [too]," said Bailey.

Bailey said some bases, like Truax Field in Madison, Wis., home to the 125th Fighter Wing, are specifying in their contract with their power supplier that they only want power from renewable sources.

"They are 100 percent-purchased green power—their power comes from wind sources from throughout the Midwest," he said.

But renewable for renewable sake is not in the ANG's energy plan. "We're trying to implement and install it where it makes sense, and not where it doesn't," said Bossert.

Bases in sunny areas that are paying a lot for electricity are prime candidates. Also important is whether the state supports it. Bossert singled out New Jersey, California and the Northeast.

Even if installing solar panels isn't economically feasible today, the Air Guard is constructing buildings that can be retrofitted later: "So, if all of sudden three years from now panels are half what they cost today, a facility will be ready for them."

Other efforts

Roofs are being scrutinized as well. The nearly completed ANG Readiness Center at Joint Base Andrews, Md., will be topped with Sedum, a small plant with special water-storing leaves. The plants will not only insulate but reduce storm-water run-off, an issue in the Chesapeake Bay watershed.

Bailey said Rickenbacker International Airport in Columbus has installed white "cool roofs" on several of its buildings. They reflect sunlight better, reducing heat transfer to the building and cooling costs in the summer.

And then there's mother earth.

"About 25 percent of the bases either have or are putting in at least one geothermal system – either a retrofit or a new construction," said Bailey. A building at Truax Field is putting in a geothermal system that consists of 70 wells with pipes inside to tap mother earth's energy potential.

New construction

The ANG is saving on its utility bills now and will be in the future by erecting buildings that use less energy. It's called sustainability.

Bossert said it's done by, "orientating the building on the lot so it takes best advantage of daylight and any existing trees ... so that you have to use less heating and cooling and lighting."

The ANG Readiness Center received a Leadership in Energy and Environmental Design (LEED) silver certification – the industry standard for green buildings – and more are on the way.

Ben Lawless, chief of the operations division for the ANG's Installations and Mission Support directorate, said recently that "green" buildings "are lower cost to operate, lower cost to maintain and provide a better

work environment for the folks who have to do the day-to-day work in them."

Using less

Along with information campaigns that remind troops to turn off lights and computers during off-hours, and installing sensors that do that for them, the ANG is even looking at other energy drainers. The cost of lighting pop machines at bases got the attention of process managers with the ANG's waste-busting AFSO21 office. They saw thousands of dollars in energy savings by dimming the machines.

Bossert said leadership has bought-in to the energy conservation movement. He credited Col. Bill Albro, who leads the ANG's Installations and Mission Support Directorate, for his vision in many of the areas mentioned. He has been proactive and even ahead of the Air Force, not only in discussion and planning, but allocating money for energy audits, meters and an improved ANG energy plan.

That plan states that facilities need to reduce and change their energy use because of rising utility costs, national security and energy independence issues, limited resources, climate change and the need to meet federal goals.

And it also states that "it's the right thing to do."

In a world that's getting smaller every day, who could argue that it's not? 🌱

ANG's renewable energy systems

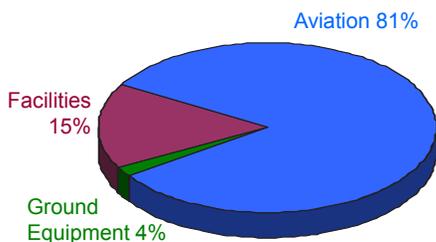
Operational

Fresno, CA – 660 KW
Toledo, OH – 734 KW
Camp Perry, OH – 220 KW
Phoenix, AZ – 16.8 KW

In development

Burlington, VT
Otis, MA
Tucson, AZ
Channel Island, CA
Buckley, CO

Total Energy Cost = \$7 billion



Sources: DESC FY07 Cost Data, Air Force Total Ownership Cost Data, Fuels Enterprise System, Federal Automotive Statistical Tool, and Annual Energy Management Report to Congress

Facility energy consumption is only a small part of the Air Guard's total. This was the energy cost for the entire Air Force in 2007.

States going green with renewable power

The Kentucky National Guard is a little “greener” with the help of its partners in state government and the private sector.

Crews installed solar panels at the



Kentucky installed 400 solar panels on the three buildings this year.

Wendell H. Ford Regional Training Center in Muhlenberg County earlier this year. This state-of-the-art 10,000-acre training facility for the Kentucky Guard will be partially powered by the 84 kilowatt photovoltaic solar arrays found on the administration building and two of the center’s barracks.

The 400 solar panels on the three buildings are “grid-tied,” meaning that the power produced will first be used by electrical loads within the facility. Any excess power produced will flow back onto the grid, running the facility power meter backward and creating a credit. The net effect of the system will be to reduce the cost of electricity for the facility.

This initiative was driven by Kentucky’s Comprehensive Energy Plan released by the governor and presidential executive orders. Both the state and federal directives strive for a greener environment and reduced CO2 emissions through the utilization of renewable energy sources such as solar.

“The Kentucky Guard and the Department of Military Affairs continue to implement energy projects that include geothermal, solar and high-efficiency energy upgrades,” said Maj. Gen. Edward W. Tonini, adjutant general for Kentucky.

The project was completed in association with Finance and Administration Cabinet through the utilization of \$553,499 in Ameri-

can Recovery and Reinvestment Act funds.

One of the largest solar installations in Kentucky, the system is capable of producing about 100,000 kilowatt hours of renewable green energy annually. Reductions in greenhouse emissions by 79.2 tons are expected, equivalent to the CO2 emissions from 8,078 gallons of gas consumed, or the amount of carbon sequestered by the planting of 1,841 tree seedlings grown for 10 years. The subsequent reduction in commercial power, potential flow-back credits to the utility companies and the sale of sustainable/renewable energy credits on the open market should reduce the training center’s annual utility expense by \$40,000 to \$60,000 or more.

In Nevada

A 1.2 megawatt solar panel was recently installed at the Joint Force Headquarters in Carson City, Nev. Large arrays of solar panels now tower over portions of the parking lot like an energy efficient shade for cars.

The solar panels are expected to be completed by August. Once they’re up and



Nevada Joint Force Headquarters' solar project is nearing completion. (Photo by Sgt. 1st Class Erick Studenicka)

running, the solar panels will be able to completely power the facility in prime conditions when skies are clear and the temperature in the ‘70s. The facility also will feed unused energy back into the power grid.

Over the next 20 years, the energy savings are expected to be in the millions, McElroy said.

The project is being funded and constructed by the private firm Sierra Solar, which

What YOU can do to save

Preserving resources starts with the individual. The increased cost of energy has made a significant impact on everyone’s finances, including the base you work at. Adopt some of the below suggested energy-saving ideas, and you can make a difference at work (and home):

- ☀ Close off unoccupied rooms
- ☀ Lower thermostat at night
- ☀ Use window blinds; open when sunny to heat room
- ☀ Utilize natural lighting when possible
- ☀ Use compact fluorescent bulbs
- ☀ Use task lighting in place of overall room lighting when possible
- ☀ Examine potential for lighting occupancy sensors
- ☀ Reduce the number of lamps in corridors without significant reduction in lighting levels
- ☀ Select energy-efficient office equipment
- ☀ Put air conditioner adapters on a power strip that can be switched off; adapters draw continuous energy
- ☀ Unplug battery chargers when the batteries are fully charged or chargers are not in use
- ☀ Attach door sweeps to the bottom of doors leading outside

will sell the power back to the National Guard at a fixed rate of 15 cents per kilowatt hour for the next 20 years.

McElroy said the project is estimated to cost about \$18 million.

In Ohio

The Ohio National Guard cut the ribbon July 6 on a new photovoltaic solar field at Beightler Armory in Columbus.

The state also has fields at Guard facili-

Army Guard readiness centers conserving energy

The Army Guard has about 3,000 readiness centers (armories) across the country. While older ones have been demolished and others returned to the community for other purposes, several are scheduled for preservation, restoration or reuse. Some armories are being replaced by newer, more energy efficient structures or renovated with energy-saving enhancements. Some recent "green" accomplishments include:

☛ The Arizona Army National Guard's 5,200 square-foot Eco-building in Phoenix is an adobe-style office building that is completely independent of conventional utilities, including electricity, sewer and municipal water. It is constructed with many recycled materials, including 5,000 used tires and windows taken from buildings previously scheduled for demolition. Other sustainable strategies include a closed-loop wastewater treatment system; passive solar design; day-lighting; solar-powered evaporative cooling; and rainwater harvesting and collection. The building is powered by four, 400-watt wind turbines and an 18 kilowatt photovoltaic array. Each year the building saves about \$6,750 in electricity costs and 60,000 gallons of water.



☛ The Colorado Guard has a new Army Aviation Support Facility that was constructed primarily from recycled and locally-made materials. In addition, the facility is lighted almost entirely (over 90%) by sunlight during day-time operations. The facility uses roof runoff to irrigate drought-resistant plants and makes use of waterless urinals. The facility also has a unique modular design that accommodates a full-time staff of 70 people and "expands" to handle the drill weekend staff of 350 Soldiers.



☛ The Hawaii Guard is breaking ground on a new facility they will share with other agencies and that will make use of photovoltaic panels to help reduce energy usage and costs.

☛ The New Mexico Guard is building a 30-module, 54-kilowatt photovoltaic solar farm. This solar project will not only reduce the amount of electricity bought from the service provider but will also reduce the amount of green house gases generated.

☛ The New Jersey Guard recently completed a 170-kilowatt photovoltaic car port. It takes under-utilized space to provide shelter for parked vehicles and generates electricity for some of its Sea Girt training site facilities. The renewable energy produced will reduce approximately 165 tons of green house gas emissions annually.

*-Compiled from 2010 Army Posture Statement and www.solar-
ipedia.com*



Eco-friendly in Pennsylvania

Two recent construction projects Fort Indiantown Gap, Pa., have illustrated what the Pennsylvania Army Guard and other states are doing to build more sustainable and eco-friendly structures.

The recently remodeled Unit Training Equipment Site there was made of renewable, recycled and regionally manufactured materials that take less energy to build and deliver. The facility used 27,000 square feet of translucent light panels that maximized natural light and reduced the need for the artificial kind. It also used light-

colored material for concrete mixtures which decreases heat islands in the parking areas.

The Ammo Supply Point at Fort Indiantown Gap achieved the LEED Silver certification by having many of the aforementioned eco-friendly initiatives. It also created hybrid parking and car pool sections in the employee parking lot and included parking for bicycles

Additionally, the dozens of readiness centers that are being built or upgraded throughout the state are being outfitted with many eco-friendly features, to include: energy management control systems, oil-water separators, storm water detention facilities, high-efficiency lighting with occupancy sensors.

-Sgt. Matthew E. Jones, Indiana National Guard

ties in Toledo and Newton Falls. All three projects, including the 374-panel solar array in Columbus, were funded through the American Recovery and Reinvestment Act of 2009.

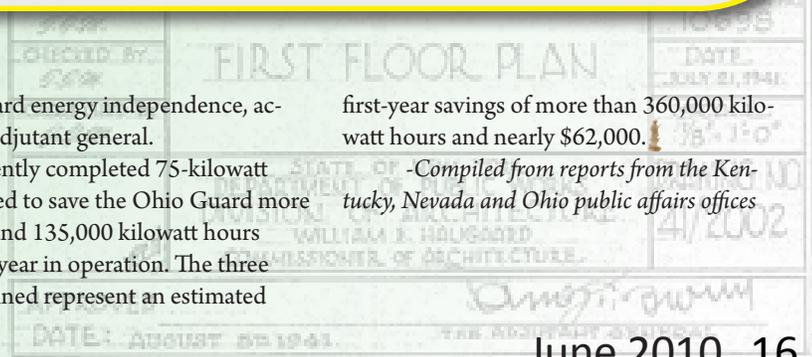
The state currently has five solar fields in operation and is determined to continue its efforts to explore renewable energy sources

and move toward energy independence, according to its adjutant general.

The recently completed 75-kilowatt array is expected to save the Ohio Guard more than \$11,500 and 135,000 kilowatt hours during its first year in operation. The three projects combined represent an estimated

first-year savings of more than 360,000 kilowatt hours and nearly \$62,000.

-Compiled from reports from the Kentucky, Nevada and Ohio public affairs offices



Small team



Ohio RED HORSE Airmen build facilities for warfighters

By Tech. Sgt. Oshawn Jefferson
USAFCENT COMBAT CAMERA TEAM

As the troop surge continues in Afghanistan, a 15-man team of Airmen are paving the way to ensure warfighters here at Camp Leatherneck have facilities they need to win the fight.

“Our mission here is to construct the facilities that directly support the joint-Coalition war-fighter,” said Capt. Nick Anderson, 1st Expeditionary RED HORSE Group officer-in-charge, deployed from Nellis Air Force Base, Nev. We have a young and energetic team, we’re small but we are making a big impact.”

The team he’s describing is made up of Airmen from the Ohio Air National Guard’s 200th RED HORSE Squadron.

Although the team has been in country less than a month, it’s working on several projects worth about \$2 million. The projects include a new RED HORSE compound, a K-SPAN metal tent for the U.S. Army’s inbound 502nd Bridge Maintenance Brigade, a foundation for a new fire station, grading a burn pit, constructing an evaporation pond to collect waste water and a river bed extension to prevent flooding, all to be completed by mid July.

“As soon as we arrived and we saw an immediate push for us to get started on our projects,” said Tech. Sgt. Alfredo Perez, 1st ERED HORSE Group river bed project manager deployed from Nellis AFB. “As Air Force engineers, we are playing a big role in preparing our camp for the troops coming in. I feel like every project we are working on is making a difference and adding something useful to the fight.”

While a regular RED HORSE squadron has between 70 to 130 Airmen; the team of Total-Force Airmen has had to adjust with their limited recourses and personnel. Normal decisions that may take a month can take just two days.

“When we do surveys, we normally have an officer and an engineering assistant survey a site and put it into a system we use called CAD to calculate the exact dimensions of a work site,” said Master Sgt. David Hughes, 1st ERED HORSE Group site supervisor deployed from the Ohio ANG’s 200th RED HORSE Squadron at Camp Perry, Ohio.

“Our guys have to do it with their equipment and draw plans by

hand in a couple of days. With the troop buildup we don’t have time to sit around to make a decision we have to trust our guys and make a decision. It speaks volumes about the quality of Airmen we have out here doing what they’ve got to do to get the job done.”

As the team works from sun up to sun down to get projects completed, the 14 pieces of construction equipment and three trucks the RED HORSE team utilizes have to continue running in peak condition.

Big

“If there is daylight outside we are working,” said Staff Sgt. Terry Broshious, 1st ERED HORSE Group vehicle maintainer deployed from the 200th. “We cannot afford to have one vehicle out of order, we have a small team so we have to stay on top of all of our projects and as long as we are working my team is going keep them running”

RED HORSE Airmen may be building the facilities to improve the quality of life for Coalition Forces here, but they credit Prime BEEF Airmen stationed at the camp for having a plan in place for the camp before the RED HORSE Airmen arrived.

“It’s great that Air Force RED HORSE and Prime BEEF engineers have the opportunity to team up at Camp Leatherneck,” said Anderson. “The outstanding infrastructure and contract management that they provide the Marine leadership here has enabled the camp growth to happen smoothly.”

As RED HORSE continues to support Joint and Coalition Forces, they’re enabling expeditionary combat power on the air, and the ground Airmen are laying the foundation for a successful troop surge.

“I love getting the chance to show people what we got,” said Tech. Sgt. Bill Walter, 1st ERED HORSE Group vehicle maintainer deployed from the 200th. “The Air Force is here doing our part in Afghanistan and as the facilities go up, people will see the big impact a small team of Airmen can have.”

RED HORSE

Rapid Engineering Deployable Heavy Operational Repair Squadron Engineer

Left: Tech. Sgt. Bill Walter, vehicle maintenance NCO-in-charge assigned to the 1st Expeditionary RED HORSE Group, puts away an elevation measuring tool at a work site at Camp Leatherneck, Afghanistan. Bottom: Staff Sgt. Terry Broshious left, a vehicle maintainer, and Walter stand outside their CONEX workshops.



impact



Have**a safe**

Readiness Center Airmen pause to reflect on safety, well-being

By Air Force Master Sgt. Mike R. Smith
NATIONAL GUARD BUREAU

Airmen from the Air National Guard Readiness Center (ANGRC) participated in the Air Force-wide “Wingman Stand-Down” by reflecting on safety and being good wingmen.

A group of about 1,000 Airmen from the ANGRG gathered June 9 at the theater on Joint Base Andrews, Md., to hear leaders talk about safety and the wingman concept.

“In order to accomplish our mission effectively, each of us has to be a wingman, leader and a warrior,” said Air Force Lt. Gen. Harry Wyatt III, director of the Air Guard. “We all have personal stories illustrating the wingman concept, when either we have helped someone overcome a problem or they have helped us in a time of need.”

The wingman concept can be as simple as being aware of risky behavior and looking out for fellow Airman to prevent injury, accidents and death, said officials.

Wyatt said the Air Guard lost seven Airmen to suicide this year and another 10 were killed in automobile, motorcycle, recreational and other ground mishaps.

“These numbers are alarming, and should serve as a wake-up call for all of us,” he said.

Wyatt called motor vehicle and motorcycle accidents preventable with good judgment.

“At least 70 percent of those accidents involve reckless behavior, such as speeding, distracted driving involving cell phones or text messaging, drinking and driving and failure to wear personal protective equipment, including seat belts and helmets,” he said.

Wyatt also noted that the purpose of the stand-down was to reenergize the wingman concept as a foundation to suicide prevention.

“The chief of staff’s guidance for stand-down 2010 emphasizes awareness, accountability, team building, communication and interaction – not one-sided lectures,” said Wyatt. “I encourage you to develop activities that enhance awareness of these issues and promote communication and development of the wingman concept.”

Air Force Col. Michael McDonald, the ANGRG commander, and Col. John Slocum, the Air Guard’s safety director, also spoke.

“We need to take care of each other,” said McDonald. “If you don’t like the term ‘wingman,’ then think of a brother-in-arms, or a best friend, or a buddy, or a partner; whatever you want to call it, the concept is there, and it means we are going to take care of each other.”

Army Guard urges commanders to ‘make a difference’

By Air Force Master Sgt. Greg Rudl
NATIONAL GUARD BUREAU

The Army Guard experienced an increase in non-duty, or off-duty, fatalities during last year’s “Critical Days of Summer,” said John L. Cicilese, a safety & occupational health specialist at the Army Guard Readiness Center.

He said that the Army Guard suffered 37 off-duty fatalities in 2009:

Of the nine personal injury-type accidents, two drowned, two died from electrocution, one from a lightning strike, one in a house fire, one fell in a cave, one died from an accidental shooting, and one died from a hit and run.

Of the 28 vehicle fatalities, 12 died in a car or truck, 15 on a motorcycle and one on an ATV. The common causes for all POV fatalities were loss of control, excessive speed and struck by another driver.

In 2008, the ARNG had 32 off-duty fatalities:

Of the four were personal injury-type accidents, three drowned while swimming and one was an accidental shooting.

Of the 28 vehicle fatalities, 11 died in a car or truck and 17 on a motorcycle.

The common causes for all POV fatalities were excessive speed, failure to stay attentive and loss of control, he said.

Cicilese said that despite the increase, he believes the states are getting the message out to Soldiers to be safe all year round and especially during the summer.

“NGB [National Guard Bureau] encourages all commanders to get involved with their Soldiers and to make a difference,” he said. His office has been receiving more requests than normal for motorcycle training, a well as a greater awareness of the hazards

e summer

Keep in mind this summer...

Now that warmer weather is here, keep the following points in mind while planning your activities:

👉 Risk management is a tool to assist us in fighting these summer hazards. It can be done on the fly, anywhere, anytime, by anyone. Simply ask yourself: What am I doing? What can go wrong? Could I hurt myself or others? What actions can I take to reduce or eliminate danger?

👉 Be a good battle buddy/wingman. This involves

watching each others' backs to prevent injury or loss of life. A good wingman will recognize risky behavior and have the courage to speak up.

👉 Make safety a habit. Wear seatbelts in cars and required protective equipment on motorcycles. Remain alert while at the wheel and plan rest breaks at frequent intervals. Don't speed - it is better to arrive late than not arrive at all. Don't drink and drive. Anticipate the unexpected and be ready to react.

-Courtesy of the 129th Rescue Wing, California National Guard

