Air Education and Training Command's

January/February 2010

The Scorpion Queen

Airman barely survives sting from one of world's most venomous creatures Page 8

HIDDEN ENEMIES

Hostile forces aren't the only worry while deployed to the world's hot spots PAGE 13

THE CATCH

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Teen snags 2-year-old who fell out of second-story window PAGE 14

'MK-1 EYEBALL'

When trying to avoid midair collisions between aircraft, there's one "high-tech piece of equipment" you shouldn't ignore ... your eyeballs

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TEABA DUO DISCUS

"According to W.H. Cameron, 'We now have unshakable conviction that accident causes are man-made and that a man-made problem can be solved by men and women.' The Air Force develops exceptional men and women to go forth and solve those problems, while striving for a mishap-free future." — Col. John W. Blumentritt, AETC director of safety





A GOLDEN TALE

Loved the article you did called Hearts Apart (November/December 2009 issue, cover story). Not only did you do a nice job of capturing Capt. David Golden's harrowing and heroic actions while fighting the war on terrorism in Afghanistan, but I thought giving his wife's perspective was especially wonderful. People sometimes forget about the family member sacrifices while their significant others are deployed.

> Erin Maleski Via e-mail

PARTICULARLY IMPRESSIVE

Torch is always a great magazine, but the November/December 2009 edition is particularly impressive! I hope (the Torch) team knows how much their efforts are appreciated!

Col. (Brig. Gen.-select) David C. Wesley Randolph Air Force Base, Texas

HELPING A NORAD ALLY

Your magazine is consistently a good read. The personal nature of the stories brings the message home that we can't rely on how unlikely an incident is to keep

us safe. These discussions bring home the truth that every assumption, every short cut, removes a layer of safeguard.

I'm sure the Three Mile Island incident appeared to be very unlikely until complacency subverted the very safeguards that were in place.

Your "Tales of the Strange" stories consistently make the point that, given enough time and just a small error, bad things will happen.

"Clear the Runway" provides the immediate connection to the heart of what we do — put planes out there

and keep them flying. The synopsis *A* approach is conducive to processing the info in the midst of a busy workplace.

Of course, your excellent calendar serves to remind

us of safety issues every time we look at it.

Keep up the great work. Keep those stories and the analysis coming! They are a great resource to stimulate discussion. You are helping more than your own Air Force; you are helping your NORAD ally (Medical Director National Search and Rescue and Aeromedical Programs Flight Surgeon, 1 Canadian Air Division Headquarters) as well!

> Lt. Cmdr. P. (Ben) Wahl Winnipeg, Canada

GETTING **'GOOGLED'**

I discovered your magazine while looking at last year's National Association of Government Communicator Blue Pencil and Gold Screen winning entries. I "googled" Torch after seeing all the awards you won, because I was interested to see what type of work deserved so many accolades.

I have been very impressed by your writing style and the design of your magazine.

Kelly Foreman Richmond, Ky.

COMPETITION IS GOOD

I'm retired Air Force and now teach at Lincoln Memorial University. I'm getting a subscription to Torch so I can display the magazine around my facility to promote the Air Force and compete with the Army Reserve Officer Training Corps instructor. Competition is good!

Wayne Wells Harrogate, Tenn.

Have a comment or complaint? Letters to Torch may be sent via e-mail to: torch.magazine@ randolph.af.mil. Or mail to Torch Editor, HQ AETC/ SEM, 244 F Street East, Suite 1, Randolph AFB TX, 78150-4328, or fax to DSN 487-6982 or commercially to (210) 652-6982. For customer service, call DSN 487-5818, or acmercially at (210)

LETTERS TO TORCH

service, call DSN 487-5818, or commercially at (210) 652-5818. Please include your name, address and phone number.

2010 TORCH CALENDAR

You have a great calendar. We send out a lot of them throughout our building here at 10th Air Force Headquarters because of the quality of the publication and outstanding pictures.

However, I'm not sure if anyone else has brought this to your attention, but there is one error that was brought to mine by a fellow aviator. The smaller picture on the lower right corner of the 2010 calendar for the month of September is not a T-1 Jayhawk but some version of the C-21 Learjet.

Thanks for putting out such a quality product, but I would be remiss as a current/ qualified T-1 instructor pilot if I didn't bring it to your attention.

Col. Scott D. Irons Fort Worth, Texas You're right. We have corrected the mistake on our Web site. We apologize for the error and appreciate your feedback.

The Torch calendar is great. I'm curious if you know what and where the bridge is in the background of the DA-20 photo for February? Is this a pedestrian type bridge? The pickup truck driving across seems to make the bridge somewhat narrow.

Also, what's the background coastline in the C-130 photo for June?

Tim Jaccarino Luke Air Force Base, Ariz. The DA-20, flown by Col. John Blumentritt, Air Education and Training Command director of safety, and Maj. Jeff Yost, of the 1st Flying Training Squadron, is part of the Air Force's Initial Flight Screening program at Pueblo, Colo. It is flying over the Royal Gorge Bridge (billed as the highest suspension bridge in the world) in Canon City, Colo. As far as the C-130, which is out of Little Rock Air Force Base, Ark., the body of water you see in the photo is the Arkansas River.

The Torch calendars are great ... love the pics. Master Sgt. Michael Scott Lackland Air Force Base, Texas

I received the 2010 calendars, and once again you all did an outstanding job selecting the best action packed photos. I gave one of the calendars to my assistant, and her son grabbed it before she got a chance to show it to her husband. However, her husband will get it back soon enough because their son is waiting for his Air Force Basic Training report date in January. Thanks again for the calendars, and keep up the good work.

> John Forslund Leavenworth, Kan.

Five years ago my husband and I were visiting our son at Vance Air Force Base, Okla., about this time of year while he was going through pilot training. The billeting office delivered a Torch calendar to our hotel room on base. We were able to get two additional copies from the front desk and enjoyed being able to display them at our work. It has become a tradition every year since to obtain copies. Our son is a captain now, and is currently deployed overseas as an F-15E pilot. Having the calendar means so much to his grandfather, dad and I. *Debbie Anderson Lancaster, Calif.*

Thanks for an awesome calendar again for 2010. We serve active duty, retirees and their dependents, and we love to offer the calendars to our customers here at Bateman Library.

Brenda Griffin Langley Air Force Base, Va.

Many thanks for getting the 306th Flying Training Group aircraft in this year's calendar. The pictures of our aircraft (TG-15s in January and DA-20s in February) look great.

Col. Patrick O. Moylan U.S. Air Force Academy, Colo.

Thank you so very much for the new calendars! We really enjoy them; it helps family members to know what our daughter is flying. Our daughter is in the Air Force Reserves and nearing the end of undergraduate pilot training. She had graduated with an aeronautics degree when she became interested in flying C-17s. So she went after a C-17 pilot slot and succeeded. She can't wait to fly one!

> Aletha Werner Walla Walla, Wash.

The calendars are fantastic as usual! I work in the Training Simulators Product Group, and we support a number of Air Force platforms. Once I hung my new calendar, everyone wanted one! So I passed them out to all my co-workers. Thank you for sharing.

> Karen Shelley Wright-Patterson Air Force Base, Ohio



HELPING HANDS CRITICAL CARE NURSE TREATS PATIENTS IN HAITI

HURLBURT FIELD, Fla. (AFNS) — The earthquake that struck Haiti Jan. 12 changed the lives of countless people forever. Perhaps no one group has been more exposed to the bare humanity of the disaster than the medics who were on the forefront, providing lifesaving care to those who survived the 7.0 earthquake.

Maj. Jon Earles, one of four critical care nurses with the 1st Special Operations Support Squadron, treated more than 100 patients during his time in Haiti Jan. 21 through 24, with other medical technicians at the U.S. Embassy in Port-au-Prince, Haiti.

"I saw the devastation in pictures and on TV, but it was surreal to see it when we were flying over or driving through a city," he said. "There would be one building still standing and 10 in a row completely leveled. It reminded me of when I saw a building get imploded in Las Vegas. They were that flat."

The quake's aftermath also took its toll on the country's hospitals, with few left to accommodate the large number of survivors.

Part of Earles' critical care nurse training taught him to perform surgery in any area of opportunity, no matter the conditions. Teams had to use lounge chairs for operations instead of the preferred hospital operating table. But patient safety was still a priority.

Prior to the arrival of medical teams, survivors were treated with whatever crude resources that were available.

"I heard a lot about Civil War-type medical conditions using hacksaws and no anesthetics for amputations," Earles said.



Working with limited resources, Airmen with the 1st Special Operations Support Squadron offer medical assistance to a Haitian girl Jan. 16 at the Toussaint L'Ouverture International Airport in Port-au-Prince, Haiti.

"Some of the people who performed amputations weren't surgeons, and that's something you don't want to see. We saw some people with bones sticking out with no dressing on it."

One of the cases that stood out to him was a woman pulled out of a wrecked hotel who had both of her arms amputated.

"She was a beautiful, young woman, and she was left with no arms," he said. "I kept thinking, 'How is she going to feed herself? Who is going to take care of her?'"

He said he was glad to help provide safer treatment.

"No matter how much you do, you wish you could do more because there's such a great need there," he said. "But I'm glad we were able to help the people we did."

> — Airman 1st Class Joe McFadden 1st Special Operations Wing Public Affairs

MEDICAL AIR TRANSPORT TEAMS NEEDED AFTER EARTHQUAKE



A 13-month-old girl with a skull fracture is transported from Haiti on a C-130 Hercules Feb. 7 to a medical facility in the United States. Critical care air transport teams from Keesler AFB, Miss., are providing medical care to airlifted victims of the earthquake. KEESLER AIR FORCE BASE, Miss. (AETCNS) — Airmen on 81st Medical Group critical care air transport teams here completed eight medical missions to provide care to victims of the Haiti earthquake who were airlifted from Haiti to hospitals in Florida, as of Feb. 7.

Emergency medicine physician Maj. (Dr.) Stephen Boskovich of the 81st Medical Operations Squadron out of Keesler said his team, including a critical care nurse and a respiratory therapist, completed three missions.

The second Keesler team went on five missions.

"We've seen the same kinds of patients from a few months old to adults, with traumatic injuries and medical emergencies," Boskovich said. "My most recent patients included a 34-year-old man with a left leg amputation stemming from a crush injury that later developed tetanus, and a 13-yearold girl with sepsis and multiple intraabdominal abscesses from a ruptured appendicitis."

Boskovich went on to say that missions fly daily to and from Haiti, and their teams fly every three days.

"We've distributed earthquake patients to hospitals as far north as Atlanta, and occasional flights go to a burn center in North Carolina and even one to Walter Reed in D.C., for an active-duty soldier who had symptoms of multiple sclerosis," the doctor said.

— Steve Pivnick 81st Medical Group Public Affairs

MOTORCYCLE MISHAPS SPIKE DURING SPRINGTIME

Motorcyclist deaths have more than doubled since 1997 across the nation, hitting a record 5,091 in 2008, according to the Insurance Institute for Highway Safety. Air Education and Training Command, during the last decade, lost 30 Airmen to motorcycle mishaps — and 40 percent were killed during the spring timeframe.

The Air Force Safety Center has started a "Spring Spike Focus" aimed at curbing that trend. Safety center officials were concerned by the high number of springtime Air Force motorcycle mishaps in fiscal 2009. Seventyseven percent of the service's springtime private motor vehicle mishap fatalities last year involved motorcycles, according to safety reports.

"During the spring, people pull their motorcycles out after a long winter 'sleep' and hit the road with rusty riding skills,"

said Robbie Bogard, AETC safety and occupational health specialist. "Not only that, but passenger-vehicle drivers don't have to contend with motorcycle riders nearly as much during the winter, then all of the sudden they are out in droves in spring. Drivers aren't as used to watching out for them, which leads to more collisions."

Speed and inexperience tend to be the biggest culprits when it comes to motorcycle mishaps, Bogard said.

Just last year in Tennessee, a combination of these hazards cost a 26-year-old staff sergeant his life. On April 17, he bought a new motorcycle and picked it up from the dealership at about 4 p.m. Only three hours later he was dead, leaving behind a wife and two kids, as well as grieving parents.

"Something like this is tragic," Bogard said. "The day he purchased his new bike he told his wife that the steering handled differently from his old one and that it was going to take some time to get used to it. Then, that same day, he drove it to his parents' house to show them his new ride. Along the way, he took a curve a little fast, went over the center line and hit a Ford Contour head-on.³

Bogard pointed out that while history shows that younger riders will be involved in the most accidents, among motorcyclists killed nationwide in 2008, half were 40 years or older.

"So no one is exempt," he said.

"In the past 10 years, we did not have a single year where we did not experience a motorcycle fatality," Bogard said. "Our vision for this decade is to reduce motorcycle fatalities to zero."

— Tim Barela

A 10-YEAR HISTORY OF AIR FORCE MOTORCYCLE MISHAPS

- 2,170 total mishaps
- 144 Airmen dead
- 73 percent staff sergeant or below
- 44 percent killed in springtime
- 42 percent occurred at night
- 27 average age of mishap cyclist
- **23** killed in April, making it the deadliest month for riders
- **17** percent were not wearing their helmet
- 15 percent involved alcohol

– Air Force Safety Center



against a man who weighed 275. The man pushed Stokes in the back as he jumped for a layup, causing Stokes to lose his balance and crash into the metal basketball pole face first. Ironically, the incident happened the last day of fall.

"He was a lot bigger than me, but I was faster and in better shape," Stokes said of the on-court encounter. "He was winded, and I guess he got tired of me getting easy points. I don't think he was trying to hurt me, but he definitely meant to foul me hard."

Because Stokes was already in the air and the momentum of the speedy guard was already launching him forward, the forceful push in the back by a man outweighing him by 115 pounds sent him sprawling awkwardly toward the pole.

"It all happened so fast I didn't have time to react," Stokes said. As his face bounced off the pole, the stunned hoopster didn't realize he had lost two teeth until he swallowed hard and felt something slide down his throat. He tried to hack it back up, and when he did, he spit one tooth out. But it was too late for the other one.

"When I went to the dentist to get my teeth fixed and told him I had swallowed one, he recommended I go to the emergency room as a precaution," Stokes said.

Not only did the basketball player have to suffer the indignation of two missing teeth, but the doctor told him he should keep an eye on his restroom "visits" for the next few days to ensure the tooth passed safely through the digestive track.

"I had lost a tooth before playing basketball when I got elbowed, but I guess I hadn't learned my lesson," Stokes said, shaking his head. "But trust me, I'll be wearing a mouthpiece when I play from now on. ... I'm running out of teeth."

MAN SWALLOWS BUSTED TOOTH DURING PICKUP BASKETBALL GAME

27711

A 21-year-old man from Los Angeles bit off a little more than he could chew when he drove for a lay-up against a player nearly twice his size during a pickup basketball game ... an encounter that left him missing two teeth, one of which he accidentally swallowed.

Matthew Stokes had been having a good day on the asphalt court until the 160-pounder went to the hole one too many times

SPRING SKIING WHEN DASHING THROUGH THE SNOW, DON'T FORGET THE SUNSCREEN

With warmer weather, sunny skies and fewer crowds, many people say spring is the time to be on the mountain. However, slope conditions during the late season can be dicey, and skiers need to be aware of some potential hidden dangers.

Avoid sunburn. The intensity of the sun at high altitudes, combined with reflection off the snow, can cause sunburn — fast. Use sunscreen with an SPF of 15 or higher every day. Apply sunscreen to exposed skin 15 to 30 minutes before going outdoors. Reapply every two hours.

Prevent abrasions and lacerations. While exposed skin may feel great while skiing in warmer weather, falls on spring snow can cause painful scrapes and cuts similar to road rash. So it's still best to cover exposed skin.

Prevent dehydration. Regardless of the time of year, it's important to drink plenty of fluids when engaging in physical activity. People tend to underestimate their fluid needs, especially when they are having fun. Know how to layer clothing. Dressing for spring skiing can be challenging as the temperature can change drastically throughout the day. Layer your clothing. Slushy conditions mean you may want to wear something waterproof, as well.

Shield yourself from the elements. Even though the temperatures are warming up, you need to beware of the possibility of cold weather emergencies, such as frostbite and hypothermia.

Protect your eyes. The glare from snow can be very intense and burn the eyes or cause snow blindness. Wear high-impact resistant eye protection or sports goggles with polycarbonate lenses. They should also filter UV rays.

Be wary of changing conditions. Avoid skiing when snow is frozen solid or melting into puddles. Both types of conditions can lead to injuries. Frozen snow is too fast; melting snow exposes rock.

Prevent injury. Experts attribute the increase of head and spinal cord injuries on the ski hill to increased speed

and jumping among boarders and skiers. Stay in control and wear a helmet.

CONSTRUCT

Prevent altitude illness. If you are traveling to the mountains from low elevations, you may feel symptoms of altitude sickness, including dizziness, lightheadedness, nausea, fatigue and weakness. Drink plenty of water, and get lots of sleep.

Watch out for avalanches. When backcountry skiing in the mountains, there is a danger of avalanche any time of the year. But spring brings conditions that are often ideal for an avalanche. The warm afternoons soften, loosen and can create snow slides. To minimize your risk of getting trapped, always check the latest avalanche reports and weather forecasts in the area where you'll be skiing before you go.

— National Ski Patrol and sportsmedicine.about.com

Sunburn, snow blindness and avalanches are just a few of the things skiers have to be wary of during the spring season.



The Scorpion Queen

Airman barely survives sting from one of world's most venomous creatures

By TIM BARELA Photos by Tech. Sgt. SAMUEL BENDET Digital composite by SAMMIE W. KING

lot of Airmen are given nicknames or call signs for various reasons, but Staff Sgt. Monique Munro-Harris can honestly say she earned hers. She's known as "The Scorpion Queen." And all she had to do to claim that title was nearly die.



Deployed to Kirkuk Regional Air Base, Iraq, in August 2006 to support the fight against terrorism, Munro-Harris knew she might face rocket and mortar attacks, snipers, car bombs and improvised explosive devices. But it was an arachnid smaller than her pinky finger that nearly took her life. While she laid in bed during the wee hours of Nov. 16, 2006, the world's third most venomous scorpion a deathstalker — stung her ... twice!

The sergeant, who was sent to the desert for five months to repair medical equipment, couldn't fix this.

"Truthfully, I wasn't that worried when I got stung," the 28-year-old New York native said. "But I didn't know what I was up against yet."

Munro-Harris had gone to bed late that night because she stayed up to watch the Michigan-Ohio State college football game. Her husband is a die-hard Ohio State fan, so she wanted to watch the rivalry match-up so they could talk about it the next day. But she had drifted off during the game and didn't wake up until she felt something crawling on her left ear.

"I was still half asleep, and I swiped at my ear with my left hand," she said. "Whatever was on there stung my ring finger. It hurt, but I guess I was still groggy because I really didn't react to it."

When she felt another sting on her side near her left armpit, however, she shot out of bed like a rocket, dancing around a bit and brushing herself off wildly as if she had ants crawling on her.

She calmed down quickly and started cautiously searching for her attacker.

"This time it had my full attention,"

she said. "I knew there was something in my room that shouldn't be there, and I wasn't going back to bed until I found it."

That's when she spotted the tiny scorpion lying between her feet.

It was dead.

Apparently, it fell on the floor after she jumped out of bed, and she unwittingly stepped on it during the ensuing commotion.

"When I saw the scorpion, it was so small that I really wasn't that worried,"

The deathstalker is the third most venomous scorpion in the world.

"I knew there was something in my room that shouldn't be there, and I wasn't going back to bed until I found it." **Asleep in her bed,** Staff Sgt. Monique Munro-Harris felt something crawling on her left ear, just before being stung.

she said. "Maybe I was still a bit dazed because of awakening from a sound sleep, but I wasn't afraid. I felt 100 percent, not even a bit sick."

Still, her training took over. She grabbed an empty Q-tip box, scooped up the "bedbug" and walked it over to the base hospital.

When Munro-Harris entered the medical facility with the scorpion carcass and two puncture wounds not much bigger than the period at the end of a sentence, Maj. Amy Gammill, the doctor on duty, wasn't overly concerned.

"We weren't really expecting anything to happen," Gammill said. "We checked her vital signs, which were normal. She wasn't having any symptoms ... just swelling on her finger."

Nevertheless, the doctor told Munro-Harris that she'd have to stay at the clinic for the next six hours for observation. Meanwhile, Gammill started doing some detective work. Since she didn't have any experience with scorpion stings, she started making phone calls to poison control centers and contacting other physicians to ensure she followed the proper protocol.

The doctor also wanted to figure out what type of scorpion they were dealing with as soon as possible.

"Because if it was something really dangerous, time would be of the essence," she said.

Gammill took the scorpion and compared it to preserved samples they kept in the office. ... No match.

"So I decided it was time to wake up our public health officer to help in the identification," she said.

When the public health officer arrived, he looked down at the container, and his face turned white.

"This is a deathstalker," he said. *"That's bad, isn't it?"* Gammill asked.

"Yes," he replied, the anxiety apparent in his hushed tone.

"I immediately went back to Sergeant Harris again to ensure her condition hadn't changed," Gammill said.

At first, the only reaction Munro-Harris had was the swollen finger that caused her to remove her wedding ring and attach it to her necklace. But now she was starting to feel differently.

"I thought my mind was playing tricks on me," she said. "I thought I just needed to calm down."

But her breathing became labored, and her throat tightened. Her hands started to shake uncontrollably. "All of the sudden, I felt weak," she said. "I didn't know what was going on."

According to Gammill, the sergeant's cardiac and respiratory systems were starting to fail from the deadly cocktail of neurotoxins.

"This particular scorpion can cause cardiotoxicity — basically kill you through heart failure," the doctor said.

"I remember them putting an oxygen mask on me," Munro-Harris said. "Then I don't remember anything else."

She had blacked out.

"The stakes rose when we found out that it was a deathstalker because we didn't have antivenin at our facility," Gammill said.

They woke up Col. Patrick Storms, the base's only flight surgeon.

"I was struck by the fact that they'd even call me at that point," Storms said. "Because usually with a scorpion sting, you just put a little ice on it, sit over in the corner for a couple of hours, and then go home as good as new."

By the time Storms got to the hospital, however, Munro-Harris was on a stretcher appearing in pretty bad shape.

The only scorpion antivenin stock that existed in Iraq was at Joint Base Balad, a perilous 45-minute helicopter ride away.

"Simply flying to Balad is very risky, because the reality is that you can be shot down," Storms said.

So they never decide to airlift someone out on a whim.

But the decision became quite simple when it came to Munro-Harris: Get her to Balad, or she would die. "We had 20-odd minutes left on the flight, and she had no blood pressure. You can do that for about four minutes before you die."

With her eyes taped shut, a ventilator tube in her lungs, and her body "wired" to monitors that tracked her vital signs, they loaded Munro-Harris into an Army UH-60 Black Hawk helicopter.

"The first couple of minutes (into the flight), it's business as usual," said Storms, who monitored and treated her with the assistance of an Army flight medic. "She's got a good pulse, her blood pressure is good, her tubes are in good position. I'm actually starting to get pretty comfortable, and thought, 'This is going really well so far.' ...

"You should never think that."

For just as the doctor allowed himself to feel somewhat at ease, Munro-Harris's blood pressure bottomed out like a rock.

"We had 20-odd minutes left on the flight, and she had no blood pressure," the flight surgeon said. "You can do that for about four minutes before you die."

Her heart didn't stop, but it couldn't

generate an effective pulse that would pump enough blood to sustain her organs, the doctor said. They were now on the clock, with precious seconds ticking down toward doom.

Storms pulled out a syringe of epinephrine, the drug used to jolt the heart into pumping faster and more forcefully, increasing blood pressure.

"She responded just a bit," the flight surgeon said.

Storms was "walking a tightrope." Deliver too much medication, and it can throw the heart into a dangerous irregular rhythm called ventricular fibrillation, he said. But give too little, and the patient's system wouldn't have enough squeeze to generate blood pressure, he added.

Walking this fine line made the last half of their flight a second-by-second juggling act.

"I would dribble a little bit (of the epinephrine) in, assess her response, then we'd lose some ground," Storms said. "I'd dribble a little more in, assess her response again, then we'd lose some more ground. Probably more concern swept through my mind at that point than at any other time — about not just having her arrive in one piece, but having her arrive and not end up a vegetable."

Hampering blood flow to the brain over an extended period of time can lead to severe brain damage, he said. And Munro-Harris had actually lost her pulse several times during the flight.

At one point, Storms considered administering an electrical shock. But using the paddles to send a jolt of electricity



With no antivenin at Kirkuk Regional Air Base, Iraq, Munro-Harris had to be aerial medevaced by an Army UH-60 Black Hawk to Joint Base Balad, Iraq. A flight surgeon kept her alive long enough to reach Balad, but he thought that she might end up with brain damage.

in-flight made him a bit nervous because the patient was on a stretcher with metal feet, resting on a metal litter stand in a metal helicopter. Luckily, they were able to regain a pulse each time with the adrenaline-boosting medication.

While the doctor had taken four syringes of epinephrine, he never expected to come close to emptying them all.

"But just a couple of minutes out (from Balad), I had to start using my final dose," he said.

When the helicopter finally touched down, medics carried Munro-Harris, whose heart was failing, at a full run.

"We got her situated in the trauma bay, and then administered antivenin very quickly," Storms said.

While the doctor desperately wanted to stay to see his patient through this ordeal, he knew his team couldn't leave the helicopter on the ground any longer.

"I was the only flight surgeon at Kirkuk," he said.

He had to return.

"It's difficult to leave one of your family members behind — even when you know they are in good hands," said Storms, who is now the 31st Medical Group commander at Aviano AB, Italy.

As he boarded the helicopter, a dire thought swept through the colonel's mind like a desert sandstorm.

"I was of the opinion that we saved the patient, but lost the brain," Storms said. "I worried she'd be a vegetable."

As Munro-Harris clung to life, she spent about 11 hours at Balad, and then was transferred to Landstuhl Regional Medical Center in Germany.

After being unconscious for 14 hours, she awoke, and to everyone's relief,

was responsive. She'd suffered no brain injury or other long-term effects.

"I woke up confused — didn't know what had happened, where I was or how close to death I'd come," she said. "And I was in pain. It felt as though someone had been standing on my chest."

She tried to speak but couldn't, as she still had a tube running down her throat.

"I consider the day I got stung my second birthday, because I came so close to not being here. So it's like I'm celebrating life all over again."

When she could talk, the first thing she did was call her husband and father, both military veterans, to let them know she was OK.

She had to stay in Landstuhl for another week and a half to remove fluid from her lungs and to meet with a cardiologist to get her heartbeat back in a normal rhythm after all the trauma.

"But as soon as I was better, I couldn't wait to get back to Kirkuk and finish my job," she said.

When she returned to the Iraq base, which is seemingly nothing but concrete,

dust and suffocating heat, she felt only appreciation and contentment.

"I was so happy to be back," she said, "which is ironic because I cried like a baby when I had to leave my husband to first go there."

"As soon as she saw me, she ran up and gave me a big hug," said Gammill, who is now an internal medicine consultant at the Air Force School of Aerospace Medicine, Brooks City-Base, Texas. "We were thrilled she came back to us alive, healthy and with a big smile on her face."

Munro-Harris said, "I'm just grateful the military has such awesome doctors — I definitely wouldn't be here today without them"

While she was gone, entomologists found a nest of deathstalkers and eradicated them.

"You have to remain vigilant and never get complacent when deployed," Munro-Harris said. "I had bought a bunch of Iraqi blankets from a bazaar, and the scorpions could have been in them. We are constantly warned about dangers including those from creatures such as scorpions, snakes and spiders. You just can't let your guard down."

When her deployment was completed Jan. 26, 2007, Munro-Harris decided it was time to expand her family.

"I realized how short life is," she said. The sergeant welcomed her daughter, Monet, into this world May 9, 2008.

"Monet is the love of my life," said Munro-Harris, who has transferred to medical supply in the 111th Medical Group, Willow Grove, Pa.

"I consider the day I got stung my second birthday, because I came so close to not being here," she said. "So it's like

I'm celebrating life all over again."

Only this time she's doing it as "The Scorpion Queen" and with a title she treasures even more ... "Mommy."

Munro-Harris's story is featured on a current episode of the Animal Planet Network series called "I'm Alive." To find out viewing dates and times, visit animal.discovery. com/tv-schedules/series.html.

With her daughter Monet, who will be 2 in May, Munro-Harris said her brush with death made her focus on what's really important in life ... family.





While setting up surveillance for terrorist activity, Airman 1 st Class Matt Leeper, a sniper with the 506th Expeditionary Security Forces Squadron at Kirkuk Regional Air Base, Iraq, demonstrates how camouflaged gilly suits blend into their surroundings. But enemy forces are far from the only threats to deployed personnel. From animals and insects, to fires and fatigue, many other hidden hazards can lead to injury or death.

Hidden Enemies Ten ways to end up at the clinic while deployed

When deploying to Iraq or Afghanistan, many Airmen feel threatened by enemy snipers, improvised explosive devices or even driving mishaps in a foreign land. But there are some hidden enemies that can threaten life and limb as well.

1. Sports: Sprained ankles, broken noses and fingers are the fastest way to a medical evacuation. Don't let competitiveness get out of control.

2. Critters: There's nothing worse than putting your foot into a shoe with an angry insect or arachnid at the bottom. Sealoff your boots at night with your blousing straps, and keep them off the floor. Keep your area clean and uncluttered, and inspect it thoroughly for uninvited "guests."

3. Fire: "Fire! Fire! Fire!" is the last thing you need to hear at o'dark-thirty in the desert. Tents can burn in a matter of seconds, and hard billets aren't far behind. Find out where your closest fire extinguisher is located, and know emergency evacuation procedures so you can escape if flames do break out.

4. Electricity: Electricity is at a premium when deployed. Don't "piggy-back" power strips, and know the load limitation on your transformers. They can get hot quick and start a fire.

5. Walking: That's right – walking. Numerous injuries are reported from stepping on uneven grounds and into potholes in poorly lighted environments, as well as icy or wet floors. Inattention in unfamiliar areas also is a contributor.

6. Lack of personal protective equipment: While PPE isn't a substitute for engineering controls, it can save fingers, toes, eyes and noggins. If you don't have the gear you need, tell someone and get it fast.

7. Lifting: Pro gear feels like it weighs a ton. It's not uncommon to carry bags, water cases and gear great distances. Don't overextend yourself, and don't be afraid to ask for help.

8. Heat: Don't be a hero until you're acclimated. Summer temps can get 130-plus in Iraq for days on end. Stay hydrated, find shade if possible, and conserve energy.

9. Fatigue: Fatigue affects everybody differently. When you arrive, more often than not, you'll be tired and ready for a shower and a cot. Try to get in sync with your new time zone, as degradation in performance and situational awareness can be a dangerous combination.

10. Complacency: Once you have been in the area awhile, you will find even the most stressful environments can become somewhat routine. But don't let your guard down. Constantly remind yourself to stay focused and task oriented. Complacency is a killer.

Master Sgt. Scotty J. Johns
Air Education and Training Command
Ground Safety superintendent

The Cotch Eighth-grader snags 2-year-old boy who fell out of second-story window

By TIM BARELA Photos by Tech. Sgt. SAMUEL BENDET

Clevenger says this will be his last year of football. At 5-foot-1, 105 pounds, the eighth-grader has deemed himself a bit too small to continue in the sport he started four years ago. After a catch that captivated the nation, however, perhaps the receiver should reconsider.

Two-year-old Cannon Jamison peers out of the second-story window from which he fell 17 feet. Thankfully, 14-year-old Cary Clevenger caught him before he hit the concrete driveway.



Cannon, who loves airplanes, took his first "flight" when he pushed the screen out of this second-story window and both he and the screen went airborne.

Fourteen-year-old Cary snagged 2-year-old Cannon Jamison out of midair after the 25-pound toddler had fallen headfirst out of a second-story window in his parents' Buda, Texas, home Jan. 30. With a concrete driveway at the bottom of that 17-foot drop, Cary is being hailed a hero for saving Cannon's life.

"Cannon pushed on the screen, the screen popped out, and then he popped out," said Cary, who goes to Dahlstrom Middle School in Buda (13 miles southwest of Austin). "I just reached my arms out and caught him."

Ironically, Cary had been visiting his best friend, Gavin, Cannon's older brother, that weekend, to watch a movie called "To Save a Life" through the family's church youth retreat program.

"The day before they were set to see the movie, Cary saved our son's life," said Christie Jamison, Cannon's mom. "I guess he kind of upstaged the show."

The weekend started out like many others. The teenage boys went upstairs to play Xbox, while mom prepared dinner. Cannon loves to "hang with the guys," so he followed the teens up the stairs.

"It gets hot upstairs, so Gavin opened the window," Christie said.

But when the boys later went back downstairs to ride their skateboards, they forgot to close the window and didn't notice that little Cannon had stayed behind.

While Gavin went to ask his mom if a couple of more friends could come over, Cary set about doing tricks on his skateboard in the driveway. Meanwhile, another neighbor, 14-year-old Kathleen Shoemaker, arrived.

"I heard Cannon say, 'Hi!' and thought he was outside right behind me," Cary said. "But when he wasn't there, I looked up and saw him standing in the windowsill. He was making funny faces and laughing. But he was also pushing on the screen. I talked to him and tried to get him to step away from the window and come downstairs."

Unsuccessful in his coaxing, Cary turned to go tell someone Cannon was still upstairs.

"Then Kathleen started to freak and screamed that the screen was popping out," Cary said.

Cary whirled back around, and sure enough, the corner had popped out. In the next instant, the entire screen came loose and sent Cannon flying through the air. That's when Cary stepped forward and made the catch of his life ... not to mention the catch of Cannon's life. The force of the fall knocked Cary down to a sitting position, but he held on to his best friend's little brother.

"Kathleen walked into the house, and vou could see the fear in her eyes and hear it in her voice as she told us, 'Cannon just fell out the window!"" said Tyson Jamison, Cannon's father. "But I caught him." Cary tried to reassure, as he entered right behind Kathleen cradling Cannon like an infant.

Stunned, it took a moment for the words to sink in. Then Christine grabbed Cannon, who was crying, and stripped him down to check for blood and broken bones. Tyson, meanwhile, ran outside. Chills crawled up his spine as he saw the window screen lying ominously in the driveway.

"I stood there a second in disbelief," Tyson said. "I knew my son had just been a hair away from death."

Tyson ran back inside the house where Christie had

carefully looked over her baby boy. "I was in shock," Christie said as her eyes welled up. "Ev-

erything goes through your mind. Does he have internal bleeding? Is something broken? And at the same time, you're just thankful he's alive."

His parents only found a small scrape near Cannon's hairline. Nevertheless, they took him to the emergency room to be sure. "He was perfectly fine," Christie said with a sigh of

> relief. "We were lucky Cary had such an amazing reaction. He's our hero." When word got out

> > about the

incident.

"Cannon pushed on the screen,

the screen popped out, and

then he popped out."

the Jamison's had to think about whether or not they'd talk to the media.

"At first you feel like an awful parent for letting something like that happen," Christie said. "But any parent knows it only takes a second of distraction for something bad to happen. And we felt strongly that we needed to advise other people to put locks on their windows. We didn't want this to happen to anyone else.

> It was a big eye-opener." While the Jamison's had thought to put child locks on all of the cabinets in their

house, it hadn't occurred to them to childproof their windows. The morning after the incident, Tyson purchased childproof locks for the windows and installed them that same day. Now the windows can only raise about 5 inches without an adult.

That should keep Cannon, who loves airplanes, from taking his second "flight" anytime soon.

As for Cary, he says all the media attention has been both "cool" and "weird."

"At school they are calling me a hero, and a boy from New Jersey said he saw me on CNN," Cary said, flashing his braces as he smiled shyly.

As far as a future football career goes, Cary says his mind is definitely made up.

"I'm going to stick with skateboarding," he said.

After all, how does one top "The Catch?"

Cary and Cannon hang out in the driveway where Cary caught the toddler after his fall.

A Window of Opportunity

Keep your windows closed and locked when children are around.

Set and enforce rules about keeping children's play away from windows or patio doors. Falling through the glass can be fatal or cause serious injury.

Keep furniture — or anything children can climb — away from windows.

If you have young children in your home and are considering installing window guards or window fall prevention devices, be aware that the window guards you install should have a release mechanism so that they can be opened for escape in a fire emergency. Window guards without a release mechanism can trap you during a fire.

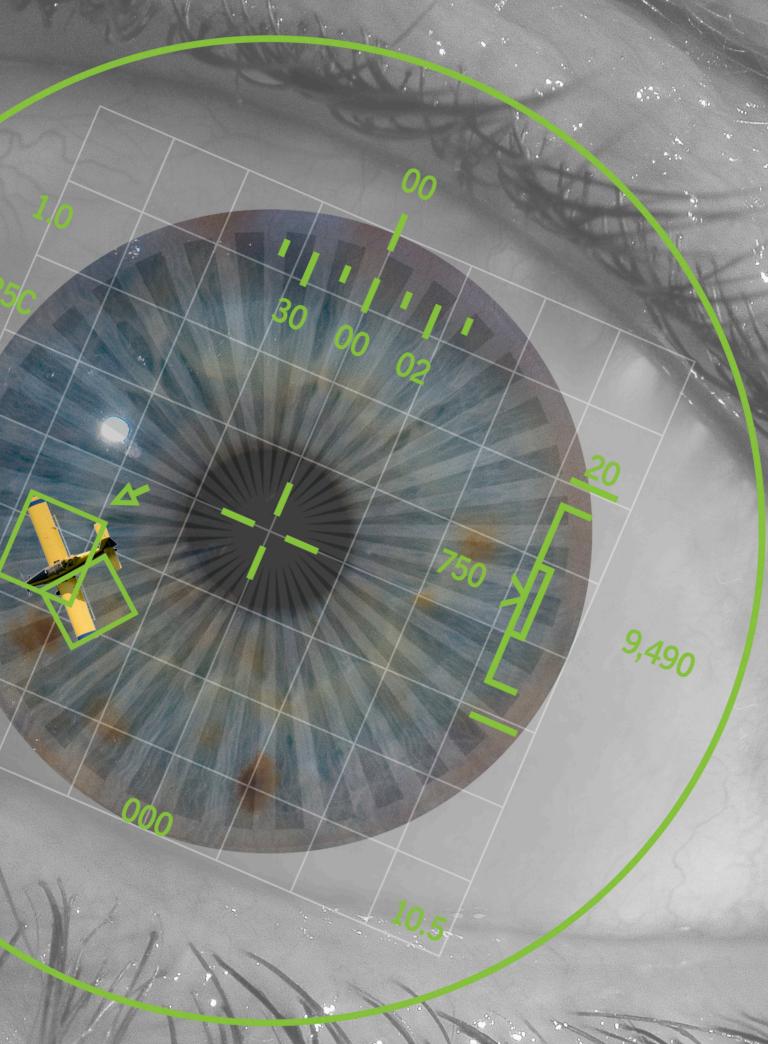
The degree of injury sustained from a window fall can be affected by the surface on which the victim falls. Shrubs and soft edging like wood chips or grass beneath windows may lessen the impact if a fall does occur.

— National Safety Council

'MH-l Eyeball'

The best piece of 'equipment' to avoid a midair collision

By Lt. Col. ANDY WOODROW Digital composite by DAVID M. STACK





e flew. We saw. We avoided. Only when flying, that's not always the case. As

far back as you can remember, the "Mk-1 eyeball" has not let you down. The concept of scanning is probably first identified as "important to remember" during infancy when you initially run your "nugget" into non-moving objects strewn around your play space (like chairs, tables, walls, etc.). You learn to keep your eyes moving as you "fly" through the terrestrial environment, and confidence grows in those orbs that bracket your nose.

Yet, no matter how fundamental the concept of keeping your eyes open and scanning may seem, in the flying environment, there are dozens of events each year that record how close two aircraft come to a failure to maintain appropriate spacing ... or even crash midair.

On Nov. 28, 2007, for example, two T-6A Texan II training aircraft collided over Mississippi. The instructor and student pilots in the first aircraft simply didn't see the second plane, also manned by an instructor and student, even though it was flying straight and level in the traffic pattern. All four pilots ejected, suffering only minor injuries. But both aircraft were lost ... \$10 million down the drain.

On Feb. 20, 2008, two F-15 Eagles collided off the coast of Florida when both pilots failed to clear their flight paths. One

pilot was killed; the other ejected. The two destroyed aircraft cost \$83.3 million combined.

Applying see-and-avoid while walking through a crowded street is reasonably easy considering the ground speed, closure rate and relative ease of maneuvering around objects. Applying principles of vision in flight is physically and mentally more challenging by far.

Early records of commercial aviation are strewn with examples of the failed scans of the eyeballs. In the period 1958 to 1988, there were some 40 airliner accidents in the United States that involved midair, killing a total of 908 people, according to the National Transportation Safety Board. The number of midairs has gone down only slightly in subsequent decades. In the period 2005 to 2009, the National Transportation Safety Board reports there were 33 midairs and 53 associated fatalities in civil aviation.

Typically, midair collisions occur with a mix of high-speed traffic operating instrument flight rules and low-speed traffic operating visual flight rules with one aircraft climbing or descending. Stunning in this analysis is the fact that midair events typically take place in daylight, under good visibility, with the low-speed aircraft within 30 degrees relative bearing of the other aircraft's flight path.

The most common cause cited in midair mishap reports to date is "failure of the pilots to see and avoid each other."



Photo by Tech. Sgt. Jeff Allen; digital composite by David M. Stack

arc, visual angle, is going to depend on the size of the object, the anticipation of the object, and visibility factors (weather and conspicuity). In other words, as long as your eyes are open and the squishy gray blob between your ears is in the "ON" position, there is no physical reason to miss a target of reasonable size entering your space.

If only we were restricted to single, well marked, pre-briefed objects in the airspace!

Objects in our visual world are not packaged with a convenient code according to shape, size or color, so the brain (visual cortex) has to decipher and analyze every snapshot that arrives at the door. Now tie in the reaction time to the physical recognition of a midair target. According to measurements taken in military studies, the time necessary for a pilot to recognize a potential midair target and take

evasive action is 12.5 seconds. Nice figure in a perfect world. Possibly a more relevant factor to consider is where the object appears on your retina.

Unfortunately, there is a precipitous drop in visual acuity as the target moves out of central vision to peripheral vision.

History provides a stunning analysis of midair events: Most typically take place in daylight, under good visibility, with the low-speed aircraft within 30 degrees relative bearing of the other aircraft's flight path. In other words, the aviators should see each other, but often don't.

It's hard to deny that the conditions for midair are ripe in a high density environment pocked with inexperienced pilots earning their wings; skills of scanning and accurately perceiving the threats are still being developed in the young aviator. Two aircraft occupying the same space when there is a well experienced aviator scanning the horizon is harder to explain.

Visual science can help unbind some of the dilemma.

The smallest image that can be perceived at the fovea (central region of the retina) ranges from 0.5 to 1.0 minutes of arc. Probability of detection for targets which exceed 1.4 minutes (0.023 degree) of The scanning technique is central to the lecture on vision during initial physiological training and becomes a practiced and conscious skill developed as you break lock from the instrument panel long enough to assemble outside visual references. But here's the "big whammy" you may have overlooked: The peripheral eye is highly sensitive to moving objects and less sensitive to non-moving objects. Unlike central vision, if an object is projected on the peripheral viewing area with little or no movement, the receptors register "no factor" and a potential airspace conflict (e.g. target) is missed and may actually become a factor.

Despite relative motion of the aircraft, the object will only enlarge and not move across the retina. This was the case that involved a T-37 and a crop duster. Neither the student nor instructor in the Tweet saw the large yellow air tractor soaring to their right on a hazy midday in January 2005, and the aircraft collided, killing the civilian pilot. Size does matter, but so does perceived movement across the visual field.

How closely do bold, black letters set against a white background compare to complex targets against a low contrast background? In practice, not so much. But using this standardized measure, vision scientists have come to the consensus that the minimum visual angle to ensure somewhat reasonable accuracy and probability in detecting another aircraft is about 12 minutes (0.2 degrees) of arc.

One more ripple in this estimation is important to note. Most mathematical models account for closure rate, target aircraft size, meteorological visual range, but do not attempt to model physiological or mental processes underlying pilot performance. Individual situational awareness influences the speed and accuracy of time critical actions, and situational awareness can be bolstered or blasted by technology.

Work completed at the Massachusetts Institute of Technology that led to Traffic Alert and Collision Avoidance System advisory systems in the mid-1980s implied that the presence of TCAS increased traffic search effectiveness by a factor of eight (e.g. one second of search with TCAS was as effective as eight seconds of search without TCAS). Collision avoidance technology available in modern aircraft has been measured to speed acquisition time by up to 15 seconds and improve the probability of visual acquisition. Some estimates claim probability approaches 100 percent by the 10 seconds prior to collision mark.

> Audio warnings and visual displays are well known to markedly improve visual-search effectiveness and TCAS computations for optimal avoidance maneuvers complete the trifecta of see-and-avoid strategies. The sobering reality is that see-and-avoid has significant limiting factors when relegated to a purely visual task.

> Nevertheless, the "Mk-1 eyeball" is as much a primary line of defense for the modern aviator as it was for the pioneers of flight. Combining the scan and cranium swivel technique with technology is a learned skill that must be practiced. Instructors and students deep in the weeds on knocking out syllabus objectives while perfecting flight techniques and skills-based learning need to remember to keep all available systems switched in the "ON" position when entering the pattern or

maneuvering through a military operations area.

It's worth a second look. Check-6!

"The most common cause cited in midair mishap reports to date is 'failure of the pilots to see and avoid each other.""

Colonel Woodrow is an Air Education and Training Command aerospace and operational physiology consultant at Randolph Air Force Base, Texas.

EARTHQUAKE COMBAT CONTROLLERS CRUCIAL TO HAITI RELIEF EFFORT

By Staff Sgt. J. PAUL CROXON Photos by Staff Sgt. DESIREE N. PALACIOS

U.S. AIR FORCE

60™ AMW 349™ AMW

Combat controllers guide a cargo aircraft from Travis Air Force Base, Calif., into Toussaint L'Ouverture International Airport in Port-au-Prince, Haiti, Jan. 23. Aircraft from all over the world are flying in and out of the small airport to drop off humanitarian aid and transport people out of Haiti after the devastating earthquake that hit the nation Jan. 12.

PORT-AU-PRINCE, Haiti (AFNS) -

Thanks to a specialized group of Airmen used to working in austere locations, safe airlift operations in Haiti were possible in the initial days after an earthquake destroyed much of the capital. These Airmen paved the way for the airport to become one of the busiest in the world.

Combat controllers are used to working in locations devoid of functioning air traffic control. Armed and trained to set up and help secure new airfield operations, these

> Airmen made aerial resupply missions to Port-au-Prince International Airport possible. "One of our pri-

mary jobs is to take over and set up an airfield in an austere environment and provide air traffic control for follow-on aircraft ... (here) it's really just the same (as other missions) except we're not getting shot at," said Staff Sgt. Joshua Craig, a combat controller from the 23rd Special Tactics Squadron at Hurlburt Field, Fla. "We came in, we set up an airfield in an austere environment, and immediately after 20 minutes we started bringing in aircraft and aid to Haiti."

The Airmen had a number of hardships to overcome.

"In the initial days there were so many aircraft and so much humanitarian aid coming in, they compared it to the Berlin Airlift with aircraft every five minutes," Craig said. "Right now, with another airport opening up and the port opening up, it's lessened traffic."

Controlling one of the world's busiest airports under austere conditions is made even more challenging when not everyone speaks the same language."

"The language barrier was kind of difficult," Craig said. "We had pilots from all over the world trying to talk and were trying to use the same phraseology, air traffic control phraseology, but sometimes it's hard to understand pilots from different nations."

Another challenge they faced was limited physical space to park aircraft at an

airport that was never designed to handle more than 100 planes per day.

"It's a small airport, and we had so many aircraft coming in it was kind of hard to find the coordination between (radar approach control), which are the guys bringing them in, out, and holding, to the amount of space available," Craig said. "We put aircraft in the grass, utilizing as much space as we could at the airport."

While it's difficult to find space for known aircraft, Craig and the other combat controllers also had to find places for aircraft they'd never seen before.

"We got birds in with types that we never heard of so we asked them: 'What's your wingspan? What kind of a bird are you? How fast are you?'" he said.

As soon as a portable tower was up and running and replacement controllers were brought up to speed, the combat controllers handed over the "keys" to the airfield and departed almost as quickly as they came.

"Our job is austere airfields," he said. "So once they set up towers, it's time for us to go."

Sergeant Croxon is a writer assigned to the Defense Media Activity-San Antonio.



Talking to aircraft crews circling the Toussaint L'Ouverture International Airport in Port-au-Prince, Haiti, Jan. 23, combat controllers ensured safe air operations in austere conditions during the early days of the Haiti relief effort.

AIRMEN START JOURNEY HERE

KEESLER AIR FORCE BASE, Miss. — The special operations Airmen who controlled the aid planes on a single runway in the wake of Haiti's earthquake began their training in the 334th Training Squadron.

"We build the foundation of future special operations forces warriors — academics, physical fitness and mental fortitude," said Lt. Col. Michael Callendar, 334th TRS commander.

Both enlisted combat controllers and special tactics officers are trained at Keesler.

"Special tactics officers were in charge of both

initial air traffic control and initial airfield management of the airport in Haiti," the colonel said.

"Air traffic control instructors set the foundation for our mission — to control air traffic in any environment," said Tech. Sgt. Jake Chandler, noncommissioned officer in charge of combat control.

They are charged with ensuring safe airfield operations in the most austere conditions ... including the aftermath of a devastating earthquake.

> — Susan Griggs Keesler News editor

FIRE ON B-1B SERGEANTS PUT OUT BLAZE; ACTIONS SAVE AIRCRAFT, CREW

SOUTHWEST ASIA (AFNS) — Two 379th Expeditionary Aircraft Maintenance Squadron master sergeants helped save four B-1B Lancer aircrew member lives and prevented the loss of the \$283.1 million aircraft during its emergency landing shortly after midnight here Jan. 18.

Master Sgts. Alan Andrews and Michael Wingler, 379th EAMXS production supervisors, deployed from Ells-



Standing in front of the B-1B Lancer that they saved, Master Sgts. Alan Andrews (below left) and Michael Wingler ensured the safety of four aircrew members and prevented the possible destruction of a munitions-loaded aircraft at an air base in Southwest Asia Jan. 18. Both are 37th Aircraft Maintenance Unit production supervisors.

worth Air Force Base, S.D., ensured the safety of the aircrew when they rushed out to aid the B-1B that had just landed and they noticed fire coming from the aircraft.

"We had just launched a jet and heard (tail number) 77 call in for landing," Andrews said. "Shortly after landing, the pilots (said they were) losing systems two and three, and that alerted us."

System two runs brakes and steering, so the pair knew how serious the situation was as they closed in on the aircraft.

"As we approached, we noticed the number 3 tire caught fire, as well as the number 3 brake," Andrews said.

While Wingler immediately notified the maintenance operations center, Andrews called the aircrew over the radio and said, *"Fire, fire, fire, fire, Evacuate!"*

Upon Andrews' warning, the pilots performed their emergency checklist and were evacuating the aircraft as the sergeants drove in front of them.

"At the parking ramp near the end of the runway, there were two fire bottles," Andrews said. "We stopped the truck, got out, grabbed the fire bottles, and ran with them for about 50 yards or so and started to extinguish the blaze."

They quickly exhausted the first fire bottle and had to use the second as well.

"In a couple of minutes, it was done," Wingler said.

However brief the encounter, Andrews said it felt like time was standing still.



"She was fully loaded with bombs. ... We just knew we had crewmembers on board, and we absolutely wanted to make sure they were safe." Both sergeants credited their annual fire bottle use training with enabling them to react so quickly and effectively.

"We've had the training so many times, so there was really no thinking," Andrews said. "If we had thought too much about it, we may have run the other way."

While their swift actions may be attributed to conditioning through cyclic training, the

sergeants said their real-world encounter was nothing either of them had experienced before.

"I was amped up," Wingler said. "The adrenaline was rushing, and I was just going and going."

They said it wasn't until they went back to their office to begin writing their after-action reports that they began to realize the true potential for disaster they had just prevented.

"She was fully loaded with bombs," Andrews said. "Normally if there'd been (even just) one bomb, we'd have established a 4,000-foot cordon, and from that point, it would have been the entire (area of the) ramp. We would have had to evacuate or take cover.

"I didn't really consider the implications of nonaction, until it was all over," the sergeant added. "We just knew we had crewmembers on board, and we absolutely wanted to make sure they were safe."

For their actions, Andrews and Wingler were awarded Air Force Commendation Medals and 379th Air Expeditionary Wing Coins of Excellence Jan. 31 during a maintenance group commander's call in front of a formation of nearly 700 fellow Airmen.

Col. Paul Schultz, the 379th Air Expeditionary Wing vice commander, said, "Their actions saved lives and aircraft. But they also allowed an asset that flies over the skies of Afghanistan or Iraq to (continue to) save lives throughout the region."

— Staff Sgt. Kelly White 379th Air Expeditionary Wing Public Affairs

AIR FORCE DETERMINES CAUSE OF F-16 MIDAIR COLLISION

LANGLEY AIR FORCE BASE, Va. (ACCNS) — On Jan. 11, Air Combat Command officials released the results of their investigation into the Oct. 15 collision of two Shaw Air Force Base, S.C., F-16 Fighting Falcons that occurred during a night close-air support training mission.

The F-16s collided about 40 miles east of Folly Beach, S.C., over the Atlantic Ocean around 8:30 p.m. Oct. 15. Capt. Lee Bryant, who was the lead pilot in one of the fighters, was able to safely land his damaged jet at Charleston AFB, S.C. Capt. Nicholas Giglio, who served as the wingman in the other aircraft, died upon collision.

The accident investigation board found, by clear and convincing evidence, the mishap was caused by the wingman's failure to reduce airspeed and establish the appropriate flight path vector when performing a night rejoin maneuver.

The board also found that channelized attention substantially contributed to the collision. The wingman experienced a radar failure during the rejoin, which diverted his attention from recognizing and correcting the airspeed and flight path errors.

The flight lead was uninjured, and the lead aircraft suffered moderate damage to the flight control surfaces and external stores. The other aircraft was completely destroyed. The total damage to both of the aircraft was valued at \$26.9 million. Both jets were assigned to the 77th Fighter Squadron at Shaw.



Two F-16 Fighting Falcons, similar to the ones pictured above, collided during a training mission Oct. 15, about 126 nautical miles southeast of Shaw Air Force Base, S.C. One pilot was killed, and one of the multi-million dollar fighters was destroyed.

MISHAP IN MISSISSIPPI LOSS OF SITUATIONAL AWARENESS LEADS TO T-GA TEXAN II CRASH

RANDOLPH AIR FORCE BASE, Texas (AETCNS) — According to an accident investigation board report released Jan. 12, loss of situational awareness led to the July 9 T-6A Texan II mishap near Mantee, Miss., which resulted in the loss of the aircraft.

A student pilot was flying a solo mission in a T-6A assigned to the 37th Flying Training Squadron at Columbus Air Force Base, Miss. The mission was to practice aerobatics in the Columbus AFB Area 5 military operations area. About 45 minutes into the flight, the student pilot started a series of aerobatic maneuvers, beginning with three leaves of a clover-leaf pattern and ending with two consecutive loops. According to the investigation report, the maneuvers were characterized by incorrect airspeed throughout.

On his final loop, the student released back pressure on the control stick, stabilizing the T-6A at 90 degrees nose up. As the aircraft lost airspeed, it transitioned into a steep right bank dive. When the pilot attempted to recover to level flight, the steep nose down attitude and rapidly decreasing altitude caused him to think he'd entered a spin.

Once his altitude was below 6,000 feet, the pilot elected to eject from the aircraft, which then crashed.

The student was treated for minor injuries and released from Columbus Baptist Hospital. The T-6A was completely destroyed, and there was minor property damage at the crash site.

A T-6A crashed and was destroyed after a student pilot ejected during a training mission in which he was practicing aerobatic maneuvers.

USAF