The Navy and Marine Corps Magazine for Afloat and Shore Safety

SEA & SHORE

SUMMER 2007

In this issue:

Focus on off-duty rec/sports injuries

...plus

- Intro to Critical Days of Summer 2007
- Back-to-back ORM articles
- New Occupational Safety & Health Dept.

The Navy and Marine Corps Magazine for Afloat and Shore Safety

SEA & SHORE

SUMMER 2007

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Mishaps waste our time and resources. They take our Sailors, Marines and civilian employees away from their units and workplaces and put them in hospitals, wheelchairs and coffins. Mishaps ruin equipment and weapons. They diminish our readiness. This magazine's goal is to help make sure that personnel can devote their time and energy to the mission, and that any losses are due to enemy action, not to our own errors, shortcuts or failure to manage risk. We believe there is only one way to do any task: the way that follows the rules and takes precautions against hazards. Combat is dangerous and demanding enough; the time to learn to do a job right is before combat starts.

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Photo by MCSN James R. Evans.

Admiral's Corner
From Commander, Naval Safety Center

My Parting Shot

The accompanying "armed forces traffic fatality rates" chart has nothing to do with the fact I'm calling it a career and retiring in August 2007. It does, however, have plenty to do with why I'm using this last "Admiral's Corner" to make yet another pitch for our young Sailors and Marines to exercise caution on the nation's roadways.

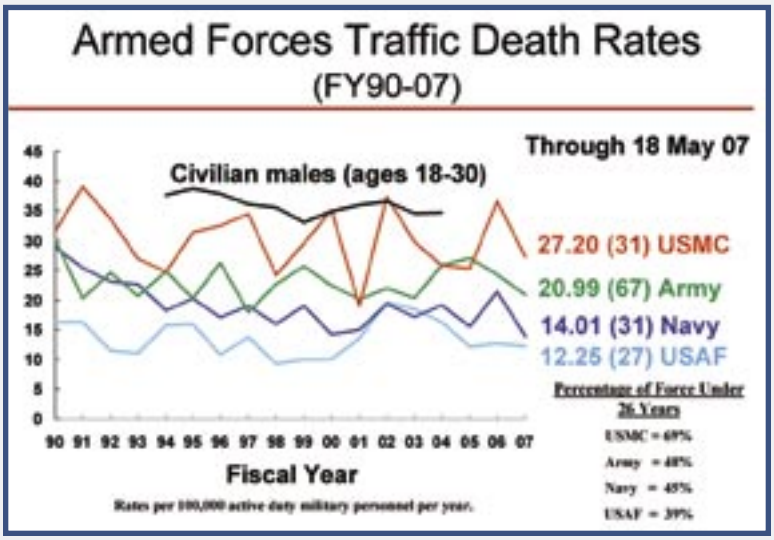
It wasn't long ago, specifically early in 2006, I found myself looking at a spiraling number of deaths in our midst as the result of PMV mishaps. It was difficult then, and it's difficult now for me to understand why our young Sailors and Marines keep making the wrong choices: speeding, not wearing seat belts, and driving distracted or under the influence. Why drink and drive when such no-brainer alternatives exist (e.g., using a designated driver or taking a taxi)?

My advice to anyone who sees someone about to drive—or ride—after having too much to drink is this: Do everything you can to stop them. If you can't stop them, consider calling the police. You'll be doing them and everyone else on the roads a favor. And, if that call costs a friendship, you'll still have the satisfaction of knowing you did the right thing.

Don't forget the far-reaching effects of drunk-driving mishaps. Besides the victims, there are the families and friends, and how about the firemen, paramedics, law-enforcement personnel, tow-truck drivers, and emergency-room staffs? They're affected, too.

With that, please let me take this opportunity to wish each of you well as you continue the battle to drive down mishap rates. I consider it a privilege to have been the commander of your Safety Center these past two years.

RADM George Mayer



FOCUS

Putting a Limit

Treating military personnel for musculoskeletal *[involving muscles, tendons, ligaments, and bones]* injuries, whether incurred in the line of duty or during recreational events, is comparable to treating professional athletes. As a result, military medicine instituted the sports medicine and rehabilitation therapy (SMART) concept, which established centers committed to return-to-readiness programs.

The SMART approach to diagnosis, treatment and reconditioning of occupational and non-occupational musculoskeletal injuries involves athletic trainers, physicians and podiatrists. These people have been trained in sports medicine and physical therapy, and they know how to rehabilitate and return injured Sailors and Marines to work in an expeditious manner. Before SMART Centers opened on both the East and West Coasts, Sailors and Marines sometimes had to wait up to 90 days for a diagnosis and physical-therapy treatment of their musculoskeletal injuries. Now, the average wait time for both evaluation and treatment is one to four days.

The SMART Center at Branch Medical Clinic, Pearl Harbor, Hawaii, became the Navy's first pierside facility of its kind. Located within 1,000 yards of the pier, it provides easy access for shipboard personnel. Injured Sailors and Marines work with a team, consisting of a sports-medicine physician, physical therapist, and physical-therapy technicians to develop and implement a treatment plan that focuses on recovery and return to duty. The team educates the patients about their injuries and demonstrates the exercises necessary to get back to full duty.

The sports-medicine doctor or physical therapist places patients in a daily treatment program for their musculoskeletal injuries, while maintaining their cardiovascular fitness. This combined treatment of the injury and preservation of overall physical fitness expedites the return to full duty without risking further injury.

Primary-care providers (routine health providers) and shipboard independent-duty corpsmen send their injured Sailors and Marines to the SMART Center for medical evaluation and treatment without waiting for appointments. Timely diagnosis and treatment helps to reduce pain and expedites treatment by decreasing swelling and stiffness. The benefit is an accelerated return of range of motion, strength endurance, and power.

Sports-medicine specialists interview, examine and evaluate each patient to determine the type and extent of the musculoskeletal injury. After the diagnosis is confirmed, the injured person is paired with a physical therapist or therapy trainer, who assists the physical therapist to improve mobility, relieve pain, and prevent or limit permanent physical disabilities.

Reconditioning therapy and training starts with specific therapeutic interventions designed to reduce pain and inflammation and enhance mobility and healing. The sports-medicine doctor and physical therapist tailor a treatment plan for each patient's specific needs and abilities. The team approach includes education of the injured person on the specifics of his or her injury and a personal treatment plan, as well as how to avoid future injury.

Active patient involvement is a key element of the SMART-Center concept. The team requires the patient to demonstrate proficiency in stretching, strengthening and endurance exercises designed to accelerate the healing process. The individual advances through progressive exercises that correspond to the stages of healing. Though the patient spends time in the SMART Center exercising and working on reconditioning, he or she also must spend a significant amount of time exercising independently in order to have more than minimal improvement. This approach contributes appreciably to the success of the reconditioning treatment.

The final phase of rehabilitation concentrates on returning the injured person to duty. During this limited-duty status, where the injury prevents performance of full military duties, the primary-care manager focuses on physical activities the individual can safely perform, as well as physical limitations and activities to avoid. With this focus on rehabilitation to duty, the Sailor or Marine maintains aerobic conditioning, strength, and endurance. For example, a leg injury

on LimDu

Basketball is just one of many recreational and sports events in which Sailors and Marines incur musculoskeletal injuries.

Navy photo by MC1 James E. Foehl

temporarily can prevent a person from running, so swimming or bicycling may be a suitable substitute aerobic activity. The goal is to return the patient to as good or better physical condition than he or she was in before the injury.

Active-duty members don't have to be injured to benefit from the SMART Center. Besides offering extensive rehabilitation of injured Sailors and Marines, the SMART Center also provides injury-prevention services to the fleet. Sailors and Marines learn how to avoid work-related and recreational injuries. Class topics include fitness/injury prevention, stretching and flexibility, and training to run.

Pearl Harbor's SMART Center also partners with the Navy Exchange to educate active-duty people on how to select athletic footwear that will help prevent musculoskeletal injuries. The SMART Center maintains a display of the athletic footwear that the local Navy Exchange has in stock. Staff members can determine the wearer's foot type and make recommendations on a proper athletic shoe, based on foot type, size, and intended use.

Resources:

- http://www.nata.org/newsrelease/archives/000126.htm *[USMC Transforms New Recruits Into "Warrior Athletes" in Safest Manner...]*
- www.safetycenter.navy.mil/success/stories/51-100/0056.pdf *[Pearl Harbor's SMART Center Returns the Fleet to Readiness]*
- http://www.news.navy.mil/search/display.asp?story_id=2890 *[Sports Medicine Reconditioning Team Center Opens at Pearl Harbor]*
- starbulletin.com/2002/08/11/news/story7.html *[Navy Revamps Injury Care].*

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According to the Statistics...

Musculoskeletal injuries, especially those involving the legs, ankles and feet, are among Sailors' and Marines' most common non-battle injuries. They account for up to 40 percent of all sick-call visits on board Navy ships. In FY2000, approximately 42 percent of the Navy people medically released from active duty were turned loose because of musculoskeletal injuries.

Marine Corps Military Lost Workdays From Off-Duty Recreational/Sports Injuries

Activity	2005	2006	Total
Recreation, N.E.C.	752	1,194	1,946
Sports	1,045	523	1,568
Football	617	379	996
Baseball/Softball	1,698	1,518	3,216
Bicycling	211	288	499
Swimming	120	256	376
Total	4,443	4,158	8,601

Navy Military Lost Workdays From Off-Duty Recreational/Sports Injuries

Activity	2002	2003	2004	2005	2006	Total
Basketball	790	854	956	1,178	1,039	4,817
Recreation, N.E.C.	505	191	187	944	1,183	3,010
Sports, N.E.C.	30	0	176	1,082	516	1,804
Football	289	189	370	623	310	1,781
Bicycling	140	138	461	209	283	1,231
Baseball	14	0	217	483	454	1,168
Swimming, Intentional	210	120	237	119	256	942
Softball	433	186	174	0	0	793
Total	2,411	1,678	2,778	4,638	4,041	15,546

The result of these injuries is a large number of lost workdays *[see accompanying charts]*. The Naval Safety Center database, for example, shows that the top eight off-duty, lost-workday-causing recreational and sports events between FY2002 and FY2006 collectively accounted for 15,546 lost workdays in Navy military ranks. The database also shows that six top off-duty recreational and sports events caused a total of 8,601 lost workdays in Marine Corps military ranks in 2005 and 2006 *[the only two years for which reliable statistics exist]*.

With facilities like the Pearl Harbor SMART Center, which opened in July 2002, the downtime from off-duty recreational and sports injuries is getting much better. For instance, 78 percent of the Pearl Harbor facility's patients are successfully returned to full duty within 30 days of the first consultation—compared to 90 days before the SMART Center was established.

The obvious tangible benefits of the SMART-Center concept are a reduction in time for injured Sailors and Marines to get treatment for their musculoskeletal injuries, a reduction in lost man-hours through a speedy return to duty, and prevention of future injuries through education. Other noteworthy benefits to date have been a 15-percent decrease in limited-duty boards and a 22-percent decrease in physical-evaluation boards.

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Price Tag on Musculoskeletal Injuries More Than $600M

The Department of Defense (DoD) spends $600 million to $750 million each year to treat musculosketetal injuries. That's the word from Diana Settles, program manager for injury prevention and physical fitness for the Navy Environmental Health Center.

While this statistic covers all musculoskeletal injuries, a significant number are from sports, noted Settles. "The primary internal risk factor for these injuries is the lack of physical fitness of individuals," she said. "They begin participating in activities or organized sporting events without having a foundation of physical fitness, which predisposes them to injury."

If you haven't been doing sit-ups like this regularly, start slowly and gradually increase.

Settles said DoD has been trying to get a better handle on the scope of the problem, but that it's been hard to do because many sports injuries occur during off-duty hours. "Many service members are 'weekend PT warriors,'" she said. "That places stress on the body, which sometimes responds in a negative way.

"Service members are damaging their ligaments, tendons, muscles, and bones," she added. "We're seeing a lot of injuries to knees and ankles. The most common injuries are sprains, which are partial or complete tears of the ligament; strains, which are partial tears of tendons or muscles (also known as muscle pulls); and fractures, dislocations and bruises."

Settles went on to say that service members can help prevent injuries by not doing so much so soon. "You really want to begin aerobically," she said. "If you haven't done anything, you want to move into conditioning gradually. You don't want to place too much stress on the body at first. Get a good pair of walking shoes or running shoes. Start, and then gradually increase your time and pace. The U.S. surgeon general recommends every American should exercise at least 30 minutes of accumulated moderate activity (such as walking, housework, gardening, etc.) per day, five days a week.

"If you've done no running, start with walking and move to running. The same kind of moderation is true with sit-ups or push-ups; if you haven't been doing them, start slowly and work your way up."

Service members, who have questions about what type of conditioning program to use, have many avenues to explore on local installations. "The Morale, Welfare and Recreation (MWR) staff have really concentrated on improving their trained staff," Settles said. "Many MWR instructors are certified, and they can provide safe and effective guidelines for service members." she concluded.

Compiled from American Forces Information Service news articles by Jim Garamone.—Ed.

Resources:

- http://www.defenselink.mil/news/Mar2001/n03272001_200103271.html*[Reducing Sports Injuries]*
- http://www.navy.com/about/navylife/offduty/fitness/*[Off Duty Fitness, Sports & Recreation].*

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Exercise—Your Health Depends on Doing It Right

A 37-year-old Navy lieutenant collapses and dies of a heart attack after jogging .75 miles to a train station, en route to home.

A senior chief inadvertently steps in a hole and dislocates his ankle while out for his daily PRT. He subsequently loses 21 workdays.

An RM2 dies of a heart attack after an exercise class at the base gym. He had been on a self-imposed weight-control program.

A Navy lieutenant commander breaks his leg while participating in command PRT (playing football).

Incidents like these are a reminder of what can happen when people try to get back into shape too quickly. Here are some tips to prevent you from making the same mistake:

• Get a medical check-up if you haven't been exercising regularly.

• Start slowly and gradually build up to a sustainable level of performance for an effective conditioning program; don't just run 1.5 miles every six months. A complete program will help you develop and improve flexibility, cardiovascular fitness, and muscular strength.

• Warm up and stretch for 10 to 15 minutes before and after each vigorous workout to prevent strains and sprains. Talk to your command physical-fitness coordinator for ideas about establishing a program. Don't overlook recommendations in OpNavInst 6110.1H (Physical Readiness Program); it's an excellent source of information.

• Don't use alcohol prior to or during fitness training. Alcohol accelerates dehydration, reduces performance, impairs judgment, and increases willingness to take risks.

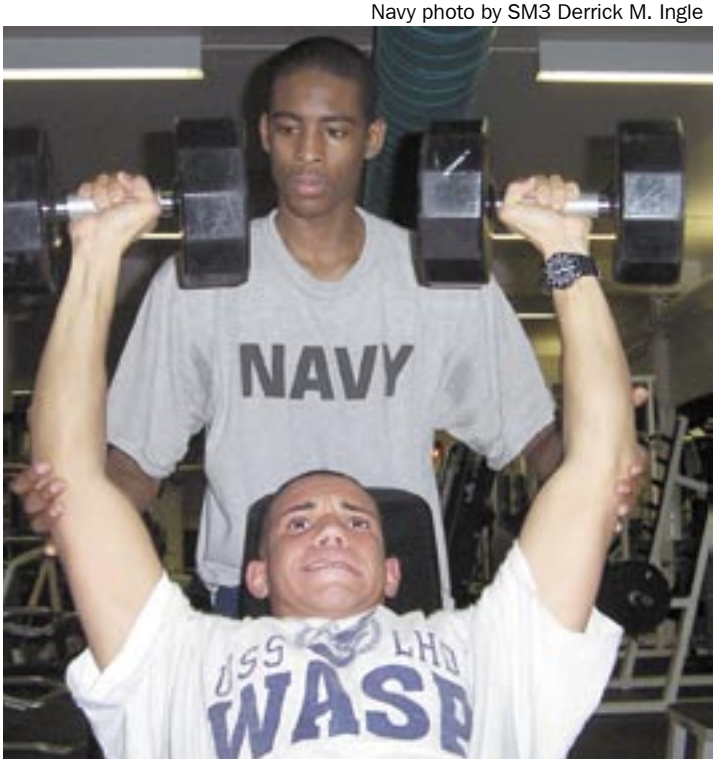
• Drink plenty of cool water to prevent dehydration. When it's hot, schedule your activity during the coolest part of the day or exercise indoors where it's air conditioned.

• Jog on established jogging paths where available. When jogging on roads, run against the traffic flow.

• Light-colored clothing and reflective clothing (during reduced-visibility conditions) are required while jogging on base.

• Follow the rules that pertain to your choice of workout. For example, if you're working with free weights, be sure you have a spotter, and follow the safety guidelines for weightlifting. It's recommended that you use collars and a weight belt.

Navy photo by SM3 Derrick M. Ingle



If you work out with free weights, be sure you have a spotter.

• Remember the acronym "RICE" when an injury occurs: Rest the sprain, put Ice on it, wrap something around the injury to Compress it, and Elevate that part of the body. Seek medical attention if you experience any of these symptoms: inability to move your arm or leg, a locked joint, persistent swelling, or a grinding feeling.

Resources:

• http://safecen.navy.mil/ashore/recreation/safetybriefs/joggingBrief.htm *[Jogging/Running/Physical Fitness Safety Brief]*

• http://www.aarp.org/health/fitness/work_out/a2003-03-06-safety.html *[Working Out]*

• http://www.nlm.nih.gov/medlineplus/exerciseandphysicalfitness.html *[Exercise and Physical Fitness]*.

FOCUS

A Shipboard Study in **Lost-Workday Injuries**

It's no secret that a deployed Navy aircraft carrier is a hazardous environment, where injuries can result in time away from assigned duties and ultimately affect aviation safety and operational readiness. Consider the results of a study that looked at injuries sustained on the flight deck, in the hangar bay, or in the gym of a deployed aircraft carrier.

Injuries recorded by the ship's medical department were analyzed, relating lost-duty injuries to these parameters: division, rank, time of day, location of injury event, whether injury was job-related or recreational, type of recreational activity, and mechanism, type and anatomic site of injury.

During the six-month deployment, 335 injuries occurred in the shipboard locations studied. More than one-third (36 percent) of these injuries resulted in lost duty time—totaling 768 man-days for the entire deployment.

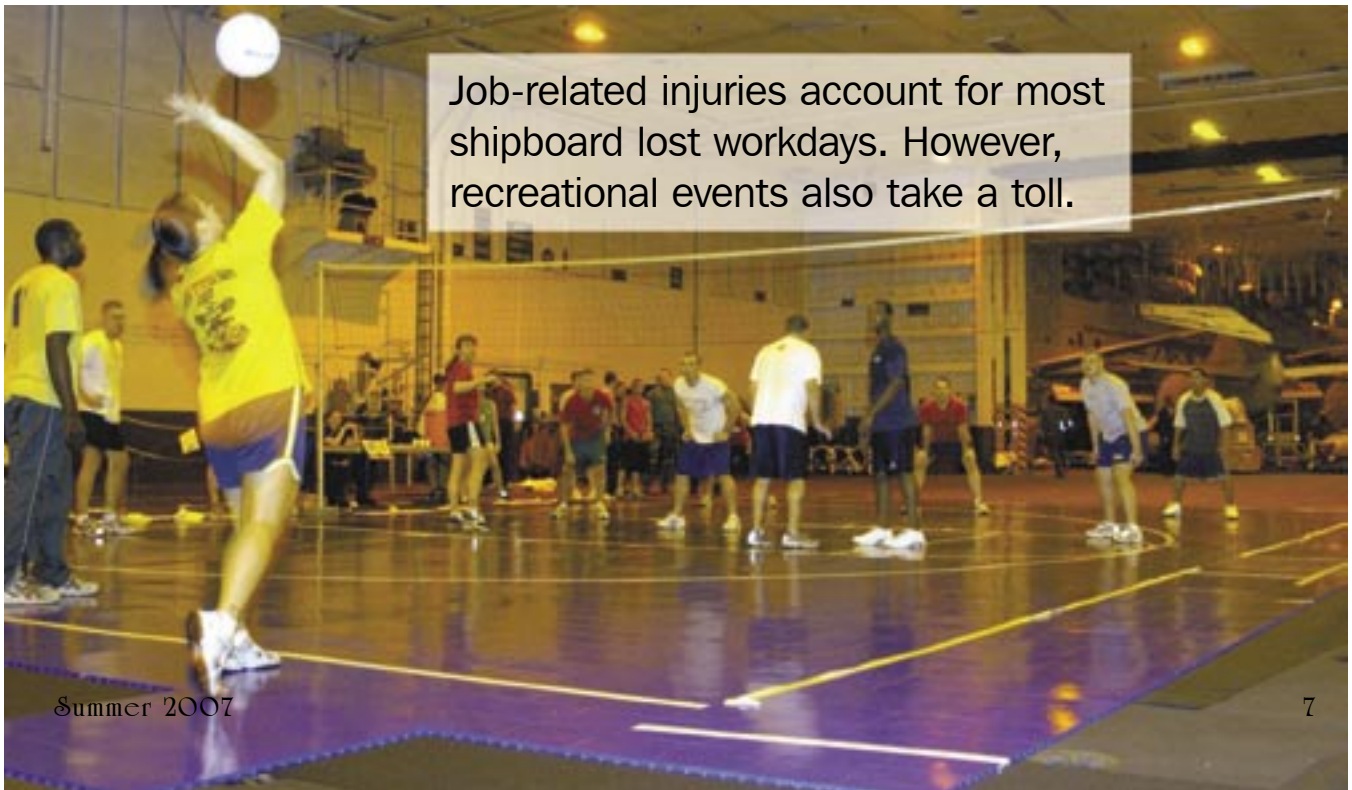
Recreational injuries represented 19 percent of all injuries but 25 percent of all lost-duty injuries, a statistically significant contribution. The sports of basketball, volleyball and football were more likely than other recreational activities to cause injuries resulting in lost-duty time. Musculoskeletal injuries, particularly those involving the lower extremity *[hip, thigh, leg, ankle, or foot]*, neck and back also were associated with increased risk of lost-duty time.

Although recreational injuries occurred less frequently than job-related injuries in the study population, they contributed disproportionately to lost-duty time. Accordingly, the study recommended that injury prevention in similar environments address recreational, as well as work-related activities.

Resources:

- http://www.ncbi.nlm.nih.gov/entrez/query.fcgi?cmd=Retrieve&db=PubMed&list_uids=11149062&dopt=Abstract *[Epidemiology of Musculoskeletal and Soft Tissue Injuries Aboard a U.S. Navy Ship]*
- https://www.denix.osd.mil/denix/Public/Library/Atlas/atlas.html *[Atlas of Injuries in the U.S. Armed Forces]*
- http://www.odu.edu/ao/instadv/quest/militarymed.html *[Military Sports Medicine: Preventing Injuries and...]*
- http://www.safetycenter.navy.mil/mishapreduction/campaignplan/charts/LostDay.ppt
- https://www.dmdc.osd.mil/ltwi/owa/cop *[U.S. Department of Defense Personnel Safety Metrics].*

Navy photo by PHAN Javier Capella



Job-related injuries account for most shipboard lost workdays. However, recreational events also take a toll.

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Taking Control of Recreational Activities

We can prevent athletic injuries by providing better training and insisting that participants wear the proper PPE. Most athletic injuries result from people being out of condition or not warming up before an event. Practically all sports involve some type of hazard since they center on the principles of attack and retreat. But, if you take the proper safety-control measures, you can reduce most of the injury-causing hazards.

Administrative Controls

To ensure safe recreational activities for personnel, commands should provide protective control in the form of rules and procedures. They also should provide qualified physical-training instructors, special-services officers, and recreational leaders. Commands should select recreational personnel based on their experience. However, they also should consider their familiarity with, interest in, and ability to instruct or supervise activities.

Good leadership promotes safety at recreational activities. You must consider the physical differences of the participants. As a leader, you also must understand the goal of the sport involved and demand complete observance of the rules.

If you are a recreational leader, give preliminary instructions to all players and thoroughly indoctrinate beginners in the basics of the sport. You can do that through a progressive training program. To avoid mishaps caused by confusion, make sure all players clearly understand your instructions.

As a recreational supervisor or coach, make sure all injured persons receive immediate medical attention. Make sure participants do not drink alcoholic beverages before or during play.

Before allowing players to engage in any vigorous sport, put them through a warm-up period. Without preliminary warm-ups, your players are more likely to be injured.

Qualified officials must manage all sports contests, whether intramural or extramural. They must make sure the participants carefully follow the standard rules of the game.

Personal Responsibility

As a participant in an athletic event, you have several responsibilities. One is to protect yourself from injury. You should not continue to participate, practice or play in events when you are excessively tired. Before play starts, warm up. Do not try a new game or practice a new athletic skill without direct supervision of a qualified monitor. Make sure your equipment fits properly and you know how to use it. Wear only clean clothing and equipment next to your skin. Do not take unnecessary chances. Pay strict attention to how to play the game.

Resources:

- https://www.cnet.navy.mil/cnet/gmt/gmt03/1_1.pdf *[Recreational Safety]*
- http://www-nehc.med.navy.mil/hp/injury/index.htm *[Sports/Physical Activity Injury Prevention]*
- http://tpub/com/content/administration/14167/css/14167_167.htm *[Recreational Safety Controls]*
- http://www.uscg.mil/SAFETY/rec_safety.htm *[Recreational Safety].*

Navy photo by PHC Chris Desmond

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Play It Where It Lies

By LCdr. Norm Presecan,
VAW-116

I was a salty fleet replacement squadron (FRS) instructor on a three-week field carrier landing practice (FCLP) detachment for fledgling E-2 and C-2 pilots. My role was straightforward: assistant OinC for the detachment and functional check flight naval flight officer (FCF NFO). Fortunately, no FCFs were required, because I managed to take myself out of the flying game after the first week.

One of the benefits of NAS Pensacola is a great golf course. An avid (though not terribly good) golfer, I took advantage of the down time to duff around a little. We'd set up an informal tournament on Friday afternoon before our mid-detachment dinner at McGuire's Irish Pub (another benefit of Pensacola). As anyone who has played in Pensacola knows, you have to contend with a lot of roots if a wayward shot finds the trees. Not surprisingly, I spent some time under the trees on this round, but I was shooting reasonably well, and the day was gorgeous. I also was starting to feel a little cocky.

On the 16th hole, my ball ended up nuzzled up to one of those roots I mentioned earlier. While considering how to play my next shot, I thought about moving the ball a little to prevent damaging my club on the root. Because I only was going to chop the ball out to the fairway (I had no shot to the green), and I was using my old clubs, I decided to play the ball as it lay. "Very honorable," I thought—but "very stupid," I soon realized.

My light chop resulted in the ball shooting straight up—into my left eye. "Boy did that hurt!" I thought. Then I realized I couldn't see anything out of that eye—just blackness. I also realized that a significant amount of blood was streaming down my face. Fortunately, my playing partners arrived on the scene and drove me back to the clubhouse. I kept direct pressure on my eye socket, and the vision slowly came back. The ambulance eventually arrived and drove me to the emergency room at Pensacola Naval Hospital for stitches and some painkiller. The ball had hit just above my left eye and produced a one-inch-long cut along the eyebrow.

Proper application of off-duty risk management could have kept me out of trouble. Although I correctly identified the hazard to my golf club (it might get damaged by the root), I didn't identify the hazard to my eyeball. Because of my run-in with the root, I today am particularly careful to identify all potential hazards of my golf shots, e.g., unintended caroms, loose debris, tree limbs, and other golfers. It hasn't improved my game much, but I haven't had to make any more trips to the ER, either.

Resources:

- http://golf.about.com/od/fitnesshealth/a/safetyguideline.htm *[Simple Safety Guidelines for Golfers]*
- www.smartplay.com.au/vic/DocLib/Pub/DocLibDownload.asp?lngDocLibID=16&FileName=Fact+Sheet+Golf(new).pdf *[Preventing Golf Injuries].*

FOCUS

A Long Fall

Ends Mountain-Biking Career

By Lt. Joseph Brogren,
VAW-112

Memorial Day 2004 was one I'll never forget. It was the last weekend on the beach before a three-week-at-sea period in June, and I was up early to load my mountain bike on the car, with plans to enjoy the last few days outdoors. I had checked out a few trails online the night before, looking for something new. I was getting used to the single tracks just east of our base at Point Mugu, Calif.

My original plan of hiking around Lake Arrowhead had fallen through because both of my usual riding partners opted to spend their last weekend at home with their families. Despite this setback, I was determined to have a nice weekend. After an hour's drive on U.S. 101 and a few detours to find the trailhead, I gave my bike a quick once-over to ensure it was ready for a great day of riding.

Most of the riding I had done in the last few months had been on a road bike to get ready for a race in July, so I took a few minutes to get warmed up and reacquainted with how different a mountain bike handles. Adding to the relative unfamiliarity was a front shock I just had installed. This ride would be only my third one with the new suspension.

The website I had checked rated the trail as "challenging," and I wasn't disappointed. Before starting, I quickly surveyed the mountain—I barely could see the single track that snaked its way up the side toward the top. For most of the ride, I would have the wall of the mountain on my right and an almost shear cliff on my left. The ride up was going to be a bear, but the ride down would be the reward.

Recognizing the trouble I would be in if I got too close to the side, I stayed well inside the right of the trail. I was only 30 minutes into the ride when a few more rocks (about the size of basketballs) than expected started showing up on the trail, making the ride even more taxing. But it wasn't anything I couldn't handle.

The real test was about to begin. After a quick plateau in slope, I geared up for another climb. The next one looked like it was going to ascend, turn, and get even rockier—all at once. My front tire hit a rock, and I slowed nearly to a stop. I had practiced this maneuver before. If I wasn't able to maintain my balance while stopped and then transition to a forward pedal, I quickly but smoothly would kick out my heel to get out of the clipless pedals. These pedals are God's gift to bike riders—they make climbing easier and provide more power for accelerating. However, they're also a bit of an oxymoron, in that they actually clip your riding shoes to your bike.

I started to lose my balance to the left but, for some reason, kicked out with my right foot first—no doubt because I've favored that side since dislocating my left elbow in a previous riding accident. I was seconds away from suffering through my second riding accident.

Like a bad dream I couldn't wake up from, I started tumbling end-over-end down the side of the mountain. I scrambled like crazy with my arms to find anything to grip and slow my fall. I tumbled for a few seconds, and then, for an instant, all the noise stopped, and I knew I was free-falling. My last thought before hitting the ground was, "I wonder if I'm going to die."

Upon learning the answer to that question was no, I started wondering about something else: Where was my bike going to fall? I didn't need that heavy piece of debris hitting me after the beating I just had taken. Thankfully, it had stopped about 10 feet higher up the slope.

I didn't even know where to start checking myself for injuries—life-threatening or otherwise. Besides a deafening ringing in my ears, my left shoulder was numb, my left forearm felt wet, and my mouth was filled with dust—not bad, considering what I had expected. After I managed to stand up, the edges of my vision became very bright. I steadied myself against the rock and decided it probably wouldn't be a good idea to take off my helmet yet. Several hundred feet of drop off was below me. If I lost my balance, my fall might continue.

With my vision returning to normal, I tried to look at the back of my left arm to see how badly it was bleeding. I then realized my shoulder was dislocated. It was shear rock above and unsteady rocks and boulders below—not a good setting for someone with a bad arm. I couldn't climb up, and, with only riding shoes on my feet, I didn't figure it was a good idea to try walking down. In short, I needed to make a phone call.

Before I had pedaled away from my car, the last item I put in my backpack was a cellphone. I had considered not taking it because there was a good chance I wouldn't have a signal once I got into any terrain. After taking another look up the mountain, though, I quickly was reminded my signal might actually improve when I started climbing. If the cellphone didn't save my life, I have no doubt it spared me from more suffering than what I was about to endure.

My last thought before hitting the ground was, "I wonder if I'm going to die."

It was no small effort to slip off my pack with a dislocated shoulder, but getting out my phone was the first step to getting rescued. About an hour after giving a rough description of my location to dispatch, I started feeling a little cold. It was a warm, sunny day, so the ocean breeze was cooling me off, or I was going into shock. Having suffered an elbow dislocation almost two years earlier, I remembered that, once the joint becomes immobile, it gets very stiff, making it nearly unbearable to move. I stayed on my feet and tried to move my arm around in small motions designed to prevent any stiffness.

About 90 minutes after my fall, I could hear a helicopter. Unfortunately, the plan was just for the helo to find me. I knew it was going to be a long afternoon, but I reminded myself it would be only a few hours until I hopefully would be in a hospital.

I've always heard that, "under stress, your training will take over," and that's what happened to me. Once I could see the helo, I called dispatch and asked them to have the pilot "slow down, look low, 9 o'clock left." I also started spinning my red biking jersey in the air with my good arm to get their attention.

I would have to wait another hour or so, though, for the EMTs from the Montecito Fire Department to rappel down and get me. After being strapped to the board and receiving a shot of morphine, I was hauled up the side of the mountain. Given its slope, I'm still amazed at how the EMTs were able to rescue me and climb at the same time.

A short ambulance ride, several X-rays, and an MRI later, I had the full diagnoses: dislocated shoulder, broken right wrist, and a broken neck. I no doubt was going to miss the next at-sea period, and I worried about my ability to lead a normal life, let alone continue my stint in naval aviation. To my amazement, I walked out of the hospital three days later, and six months later, I was cleared to fly. I left my mountain-biking career at the bottom of the mountain.

I never expected to have an accident (who does?), but there are a few actions I should have used ORM on before starting my adventure. First, my decision to go mountain biking alone in unfamiliar territory wasn't my finest. Second, it wasn't a good idea to try such a tough trail after being off a mountain bike for so long, especially one with a brand new suspension that caused the bike to handle differently. Getting back up to speed on my usual trail or an easier one would have been the way to go. The last thing I could have done would have been to practice dismounting from the pedals for a quicker jump off the bike when I started losing my balance.

My helmet undoubtedly saved my life. After a few weeks, I checked the helmet to see how my head would have fared without this protective device. The top was caved in, and a huge chunk was missing from the area that covered my left temple. The most ominous thing about this story is that, after falling and getting to my feet, I saw another helmet on the rocks from an earlier accident. I eventually learned I was the fourth rider to have gone over at that exact spot; two were going downhill, and another was going up. Take my advice, and avoid all trails off Sheffield Exit near Santa Barbara, Calif.

Resources:

- http://mountainbike.about.com/od/bikingsafetytips/Mountain_Biking_Safety_Tips_for_Beginners.htm *[Mountain Biking Safety Tips for Beginners]*
- http://www.active.com/story.cfm?story_id=9262 *[Mountain Biking Safety: First Aid for the Trail]*
- http://safetycenter.navy.mil/media/seashore/issues/winter04/lookbefore.htm *[Look Before You Ride]*
- http://www.abc-of-mountainbiking.com/mountain-biking-safety/injury-prevention.asp *[Mountain Biking Injury Prevention]*
- http://www.abc-of-mountainbiking.com/mountain-biking-safety/common-injuries.asp *[Mountain Biking Injuries]*

FOCUS

A Workout Gone Wrong

Navy photo by PHAN Shannon E. Renfroe

A Sailor aboard USS *Nimitz* (CVN-68) keeps in shape while underway by working out on one of the ship's many treadmills.

Just days after leaving the Arabian Gulf during Operation Iraqi Freedom, many Sailors aboard USS *Nimitz* (CVN-68) felt less need to drink large amounts of water, thanks to cooler temperatures. Most kept themselves hydrated, though, because they realized we still were traveling through an equatorial region. I, however, was destined to learn my lesson the hard way.

I had decided to run eight miles on the treadmill, instead of the usual six, for my daily workout. Everything was going well until I reached the seven-and-a-half-mile mark—that's when I quit sweating. Even though I wasn't sweating any longer, I didn't feel any different, so I pressed on. Besides, I had only another half-mile to go—big mistake.

When I hit eight miles, I walked another mile to cool down, then left the gym. By the time I arrived at my berthing space, I had started feeling dizzy and couldn't breathe. I soon began hyperventilating and gasping frantically for air. It felt like someone was forcing a wet handkerchief against my mouth.

I alerted a petty officer in the berthing area, and she called for a medical emergency. A couple of minutes later, corpsmen arrived, loaded me onto a stretcher, and carried me to medical, where they gave me an IV. They held me for two hours of observation, then released me to my rack, SIQ for 24 hours.

The biggest lesson I learned from this experience is always to stay hydrated. I should have kept drinking water, even though the temperatures were cooler.

Author's name withheld by request.

FOCUS

Lack of Electrolytes Makes It "Lights Out"

Photo by Tim Hipps

By Bill Ewing

Sunday morning, April 2, 2006, started out like most of my Sunday mornings when I'm working up to run a marathon. If I had known how it was going to end, though, I would have stayed in bed.

I was training for my fifth marathon, the Cincinnati Flying Pig, set for May 6. Today, I would run 20 miles. I had been sticking closely to my training schedule, so I didn't expect any problems this particular morning. As with most of my long runs, I planned to use the 10-mile course on NAS Patuxent River. It's a great course to run because it has mile markers every two miles and combines flat areas with some inclines, and the scenery (woods and sea) is beautiful.

I planned to keep with my routine of placing water and sports drink at the mileage markers around the course so I could hydrate every two miles. I also planned to use a Power Gel after the first 10-mile lap. As I was getting my gear together, however, I found that I was out of sports drink but had plenty of bottled water. "That'll be enough,"

I thought. "It's only going to be 65 degrees today"—mistake No. 1.

Arriving at the base around 11:30, I drove the perimeter of the course, placing a bottle of water at every two-mile marker. I then drove to the gym and changed into my running gear. When I reached in my bag for a Power Gel, I was surprised to learn I had none. I dismissed this second red flag with, "Not to worry—it's going to be a cool day, so the water will get me through."

I ran the first 10 miles at a comfortable 10-minute-mile pace, stopping every two miles and drinking water as planned. At mile 16, I stopped for some water, but after drinking it, I started feeling nauseated. I kept running to mile 18, where my legs felt like lead, and my stomach was getting worse. By mile 19, I was walking, and when I finally returned to the gym, more than four hours had passed, and I didn't feel good at all.

I went into the locker room and sat on a bench, trying to recover. I wasn't sweating, and my arms periodically were shaking. I told myself I would feel better after a shower—and the stomach ache was gone, along with the shaking, but a headache had replaced these symptoms.

I dressed and went to my truck for the seven-mile trip home. About three miles from my house, though, my right arm started shaking again. "I can make it," I assured myself. "And once I'm home and can lie down, things will be better."

I remember driving past the local tavern another mile down the road before the lights went out. When I awoke, my truck's horn was blaring, all the air bags had deployed, smoke was everywhere, and someone was yelling, "Dial 911—I think he's dead!" I came to realize I had passed out, and my truck had left the road to the right and gone airborne across a drainage ditch on its side. It then had righted itself and stopped six inches short of a large oak tree in someone's front yard. Paramedics rushed me to a hospital, where I spent three days undergoing a multitude of tests that determined I had depleted my system of electrolytes.

My truck was totaled, and I missed the NCAA basketball championships while in the hospital, all because of something I knew but had ignored. I've read many books on hydration and the need for some kind of sports drink with electrolytes or gel when you exercise more than 60 minutes.

On a positive note, I recovered in time to complete my training and run the Cincinnati marathon. I finished with no problems, thanks to water and sports drink every two miles and a Power Gel every eight miles.

By mile 19, I was walking, and when I finally returned to the gym, more than four hours had passed, and I didn't feel good at all.

The author is a retired LDO commander, who currently works for Lockheed Martin Aeronautics Company.

Resources:

- http://www.healthguidance.org/entry/57/1/Hydration-and-Athletic-Performance.html *[Hydration and Athletic Performance]*
- http://sportsmedicine.about.com/cs/hydration/a/acsmfluid.htm *[ACSM Clarifies Indicators for Fluid Replacement]*
- http://onhealth.webmd.com/script/main/art.asp?articlekey=50559 *[Hydration: The Key to Exercise Success]*
- http://safetycenter.navy.mil/articles/CRITICALDAYS/2006/heat_exercise.htm *[Dodging Heat Stress Should Be No Sweat]*
- http://safetycenter.navy.mil/ashore/articles/recreation/heatindex.htm *[Heat Index and Physical Exercise—Navy].*

Although the victims in the previous two accounts failed to drink enough water, some people who exercise drink too much (most often a problem with slower runners, who have more time to drink and don't sweat as much). As the water content of the blood increases, the salt content is diluted. Consequently, the amount of salt available to body tissues decreases, which can lead to problems with brain, heart and muscle function. Common initial symptoms of hyponatremia, or water intoxication, include dizziness, nausea, apathy, and confusion—the same symptoms people experience when suffering from dehydration, so it's important to be aware of how much you're drinking. Athletes in extreme cases of hyponatremia may experience seizures, coma or death if not seen by a medical professional. Read the sidebar that follows for some tips to help you know how much water is enough.—Ed.

FOCUS

Balance: The Answer to Safe Hydration

Keep in mind that dehydration still is one of the biggest risks in endurance exercise, but the key to performing at your best is to drink smart—don't gulp liquids.

Know Your Sweat Rate

The best way to avoid drinking too much or too little is to take in about the same amount of fluid as you sweat out. Here's how to figure out your sweat rate:

- Weigh yourself without shoes or clothes, and record it in a log, noting temperature and humidity.
- Work out for one hour.
- Dry off and weigh yourself, noting the amount of weight lost. Also note any fluids you may have taken while running.
- Use this formula to determine your hydration needs: *One pound lost = 16 ounces of fluid.*

So, if you lost two pounds in that hour, you should replenish 32 ounces of fluid (about 8 ounces every 15 minutes) in the same temperature and humidity level.

Do this test a few times in different conditions to get a sense of how your hydration needs change in varying temperatures and humidity levels, as well as different intensity levels.

Photo by PH1 Shane T. McCoy

Marines hand out water and sports drinks during the 29th annual Marine Corps Marathon.

Tips for Smart Hydration

To make sure you meet but don't exceed your hydration needs:

- Set your watch alarm to remind you when to drink.
- Aim to replenish 80 to 100 percent of fluids lost.
- Avoid gaining weight (a sign of overhydrating).
- Consume a sports drink with electrolytes (sodium, potassium, etc.) during your training sessions and in races longer than 60 minutes. Plain water is fine for workouts shorter than 60 minutes.
- Flavor your meals with salt right before long workouts and races to boost electrolyte levels.
- Avoid drinking more than usual during race week to avoid diluting your blood-sodium levels and putting yourself at higher risk of developing hyponatremia. Your fluid needs drop during this taper week. Drink normal amounts and use the urine test to determine if you've had enough fluids: If it runs pale yellow, you're well-hydrated and ready to race.

Resources:

- http://sportsmedicine.about.com/cs/nutrition/a/aa070703a.htm *[Water Intoxication (Hyponatremia)]*
- http://www.jnj.com/news/jnj_news/20031030_105713.htm;jsessionid=SYIOZSU15OEKGCQPCAOWU3YKB2IIWTT1 *[Runners Beware: Over-Hydration Can Be More Dangerous Than Dehydration]*
- http://www.active.com/story.cfm?story_id=11764&category=activewomen *[Hydration Confusion: How Much Is Too Much]*
- http://www.weightlossresources.co.uk/diet/healthy_eating/too_much_water.htm *[Can You Drink Too Much Water?]*
- http://www.npr.org/templates/story/story.php?storyId=5630821 *[Athletes Run Risk of Over-Hydrating].*

FOCUS

Protecting People From Heat Stress

High humidity added to hot weather creates a dangerous combination because they interfere with the body's ability to cool itself. Long exposure to hot, humid weather can result in heat cramps or heat exhaustion, and if heat stress continues, a person may suffer heat stroke, which can be fatal. *[The accompanying heat-index chart shows heat and humidity combinations that can be hazardous. —Ed.]*

What Causes Heat Stress

Factors leading to heat stress include high temperature and humidity, direct sun or heat, limited air movement, physical exertion, poor physical condition, some medicines, and inadequate tolerance for hot workplaces.

Symptoms of Heat Exhaustion

- Headaches, dizziness, lightheadedness, or fainting.
- Weakness and moist skin.
- Mood changes, such as irritability or confusion.
- Upset stomach or vomiting.

Symptoms of Heat Stroke

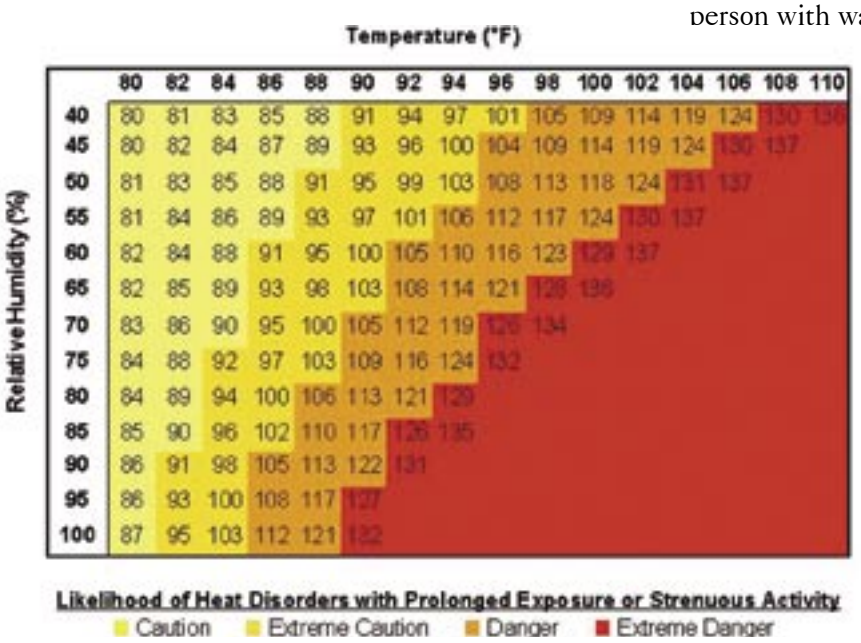
- Dry, hot skin, with no sweating.
- Mental confusion or losing consciousness.
- Seizures or convulsions.

Preventing Heat Stress

- Know signs/symptoms of heat-related illnesses; monitor yourself and coworkers.
- Block out direct sun or other heat sources.
- Use cooling fans/air-conditioning; rest regularly.
- Drink plenty of water—about 5 to 7 ounces every 15 to 20 minutes.
- Wear lightweight, light-colored, loose-fitting clothes.
- Avoid alcohol, caffeinated drinks, or heavy meals.

What To Do for Heat-Related Illness

- Call 911 (or local emergency number) at once.
- While waiting for help to arrive, move the person to a cool, shaded area; loosen or remove heavy clothing; provide cool drinking water, fan and mist the person with water.



Resources:

- http://safetycenter.navy.mil/acquisition/heatstress/default.htm *[Acquisition Safety: Heat Stress]*
- http://www.osha-slc.gov/pls/oshaweb/owadisp.show_document?p_table=FACT_SHEETS&p_id=167 *[Protecting Workers in Hot Environments]*
- http://www.osha-slc.gov/SLTC/heatstress/recognition.html *[Heat Stress: Hazards and Possible Solutions]*
- http://www.4-safety.com/heatstress.htm *[Heat Stress].*

Critical Days of Summer:

More Fun, Bigger Risks

Fourth of July fireworks displays are just one popular attraction that occurs during the Critical Days of Summer. The secret to keeping this and all summertime activities mishap-free is to apply the principles of operational risk management.

Navy photo by JO3 Ryan C. McGinley

Summer is the time of year when Sailors and Marines head to the nation's beaches, lakes and parks. They take advantage of the nicer weather and time off to do more sightseeing and to visit more family and friends. Unfortunately, our database shows they also have more mishaps.

These mishaps create a well-recognized negative trend, one that is shared by all services: the comparatively high toll of off-duty and recreational mishaps. Since the 1960s, military safety specialists have called the period between Memorial Day weekend and Labor Day weekend the "Critical Days of Summer." By any measure, it's a period of increased risk for Sailors and Marines.

During the 2006 Critical Days of Summer, 20 Sailors and 24 Marines died, with traffic fatalities the frontrunner. In many years, between one-third and nearly half of a year's total Navy and Marine Corps deaths occur during the Critical Days of Summer.

Why are the Critical Days so dangerous? Many factors come into play. Traffic risks increase because, with schools out, many service members transfer, which means more families are traveling between duty stations. When service members visit home, they often travel for too long a time without rest or a break. Recreational safety specialists sometimes call summer "the drowning season," simply because of increased exposure at beaches and lakes, on boats, and, increasingly, on the popular personal watercraft.

For each increased risk, there are controls, and our 2007 Critical Days of Summer campaign aims to make those controls clear and easy to apply. Stay tuned to our website (www.safetycenter.navy.mil) for all the latest tools available to help you get through this period safely. A simple "Critical Days of Summer" search should give you a host of choices.

In the meantime, here are some common-sense tips to help you avoid the obvious risks:

- Never drink and drive, regardless if the vehicle is a car, motorcycle, boat, etc.
- Wear your seat belt and make sure all passengers do the same.
- Get plenty of rest before and while traveling.
- Don't swim alone or in unknown waters; also pay attention to changes in weather and water conditions.
- Use U.S. Coast Guard-approved PFDs when boating or riding personal watercraft.
- Don't overexert yourself during athletic events; stretch thoroughly and drink plenty of water.
- Use sunscreen during outdoor activities.

Whether you're at home, at the beach, or at work, you should be alert to your surroundings and make smart decisions to reduce or eliminate unnecessary risks. Always ask yourself, "If I take this risk, can I live with the consequences?" The choice is yours, so make it a safe one.

WORK ZONE

Drowning: Navy/Marine Corps Leading Recreational Killer

• An airman goes to the ocean with two companions and decides to go swimming at night, with no lifeguard present. The water temperature is 60 degrees F, the air temperature 51 degrees F, and the wind is at one knot when the airman, wearing only shorts, enters the water. He disappears about five minutes later and dies from drowning as a result of hypothermia.

• An E-6 enters a hotel's swimming pool. The water, according to witnesses, is cloudy—to the point where you can't see bottom. No lifeguard is on duty. While swimming laps underwater, the E-6 becomes tired and has to be pulled from the pool. Efforts to revive him with CPR are unsuccessful.

• An E-5 and an O-4 wade inside a protective reef when a rip tide and undertow sweep them over the reef and out to sea. They maintain contact for a short period of time—long enough for a boat to rescue the O-4 a mile out from shore. The E-5, however, drowns.

Casualties like these are the reason why, according to the Naval Safety Center database, drowning ranks as the leading cause of recreational deaths in both the Navy and Marine Corps. Nationwide, drowning is the fourth leading cause of accidental deaths.

What can we do to avoid these tragedies?

Learn to assess the risks, make risk decisions, and implement controls. Here are some specific tips to avoid swimming mishaps:

• Learn to swim well enough to survive an emergency.

• Always swim with a buddy who has the ability to help you in an emergency.

• Avoid using alcohol, which depresses the central nervous system and impairs performance, even at low doses (0.02 percent). Alcohol, combined with at-risk behavior, often leads to deadly consequences.

• Swim only in supervised areas.

• Follow the safety rules for the particular pool or beach area. Pay attention to warnings about local hazards, such as currents.

• Know your limitations, and don't overestimate your ability.

• Stay out of the water when overheated, immediately after eating, and during an electrical storm.

• Check the depth before diving into the water.

• Keep a safe distance from diving boards and platforms.

• Don't substitute inflated tubes, air mattresses, or other artificial supports for swimming ability. If a flotation device is needed as a safety aid, use a U.S. Coast Guard-approved personal flotation device.

• Learn the simple and safe reaching-rescue techniques. Only certified lifeguards should dive in to rescue a drowning victim. The American Red Cross offers courses in water rescue.

• Avoid overexposure to the sun; use plenty of sunscreen lotion.

Resources:

• http://www.cdc.gov/node.do/id/0900f3ec8016eb51 *[Swim Healthy, Swim Safely]*

• http://www.redcross.org/services/hss/aquatics/ *[Swimming and Lifeguarding]*

• http://www.redcross.ca/article.asp?id=001047&tid=024 *[Think Safety Before Swimming].*

Navy photo by JO3 Stephen P. Weaver

A Human Skippin

By Maj. B. D. "Gump" Harrelson, USMC,
2d MAW BFT

At my wife's convincing, I decided to buy a couple of personal watercraft for my family to enjoy during the spring and summer in Beaufort, S.C. A pair of Yamaha 1200 XLT WaveRunners, the family SUV version of watercraft, marked my entry into the world of recreational vehicles.

Being the new captain of a powered watercraft, I watched all the safety videos and learned as much as I could about federal, state and local boating regulations. I also bought all the recommended personal protective equipment and generally applied off-duty ORM to this new endeavor. I aimed to practice what I preach to my fellow Marines—after all, I am the squadron safety officer.

My family had been invited to attend a day of water activities with some friends who owned a house on a river. This setting would provide the perfect opportunity to launch the new personal watercraft and show my friends what I had learned from my first experience on the water a few weeks earlier. Every-

g Stone

thing was OK until I decided to up the stakes a little and try some of the more complicated maneuvers I had seen my friends perform earlier *[—so much for ORM].*

I know what you're probably thinking at this point: "He tried something far beyond his experience level and ended up crashing and hurting himself." Admittedly, you would be half correct. I successfully completed all the twists and turns and high-speed doughnuts and even kicked up some beautiful rooster tails. Having enjoyed myself enough for the moment, I decided to return to the dock a few hundred yards away where my family and friends had been watching my exploits.

En route, I got the personal watercraft going about 40 mph and was doing some gentle S-turns when the rear end skidded out from under me. The WaveRunner then veered sharply to the left, catching me off guard and launching me like a stone from a slingshot across the water. Family and friends who saw this spectacle said I skipped across the water end-over-end, with legs flailing, three or four times before coming to rest.

When I finally came up for a breath, my back was sore, and I was afraid I seriously had injured myself. "Smacking the water at 40 mph really does feel like hitting a wall," I thought. I looked around to find that my WaveRunner had beached itself on a sandbar that was appearing with the low tide. The "kill" switch on the engine had functioned as designed.

Here are some of the lessons I learned that day. First, things happen when you least expect them. I had been pushing the personal watercraft to new limits of my experience, and everything had gone well. Then, out of nowhere, I found myself flying through the air during what would be considered a routine part of the mission. In aviation, we always say the flight isn't over until you're shut down in the chocks. The same holds true on the water; the ride isn't over until you're tied up at the pier. **Always be prepared for the unexpected—don't let down your guard.**

Second, throughout the day, light rain showers had been moving past, and, each time, we had hurried inside, where I stripped out of the protective gear (booties, gloves and a wetsuit) I had been wearing. This time, as I hurried to get back into the water, I had forgotten my booties and gloves. These items might not have been a factor, except for the fact the sandbar my trusty ride had stranded itself on was covered with razor-sharp oyster shells. I spent a long time picking my way through the calf-deep river mud, gingerly stepping on and around what must have been thousands of oyster shells. I eventually made it to my WaveRunner and, with great effort and a few more cuts and scrapes, freed my ride. **Wear the proper PPE—every time, all the time.**

In the end, besides the sore muscles, several cuts on my hands and feet, and a bruised pride from the ribbing I took from the peanut gallery ashore, I came away with a renewed sense of caution and respect for riding my personal watercraft. Maybe I should stick to flying a little while longer and put my "professional" WaveRunner-stunt career on hold. With a slight modification, though, I might have figured out an impressive finish.

Resources:

- http://www.uscgboating.org/regulations/fedreg.htm *[Federal Regulations]*
- http://www.uscgboating.org/regulations/regulations.htm *[Regulations]*
- http://www.answercentral.com/main/ntquery?tname=personal%2Dwater%2Dcraft%2D1&print=true *[Personal Watercraft]*
- http://www.ntsb.gov/publictn/1998/SS9801.pdf *[Personal Watercraft Safety].*

Unrep Hazard Prompts Change in Ship's ORM Planning

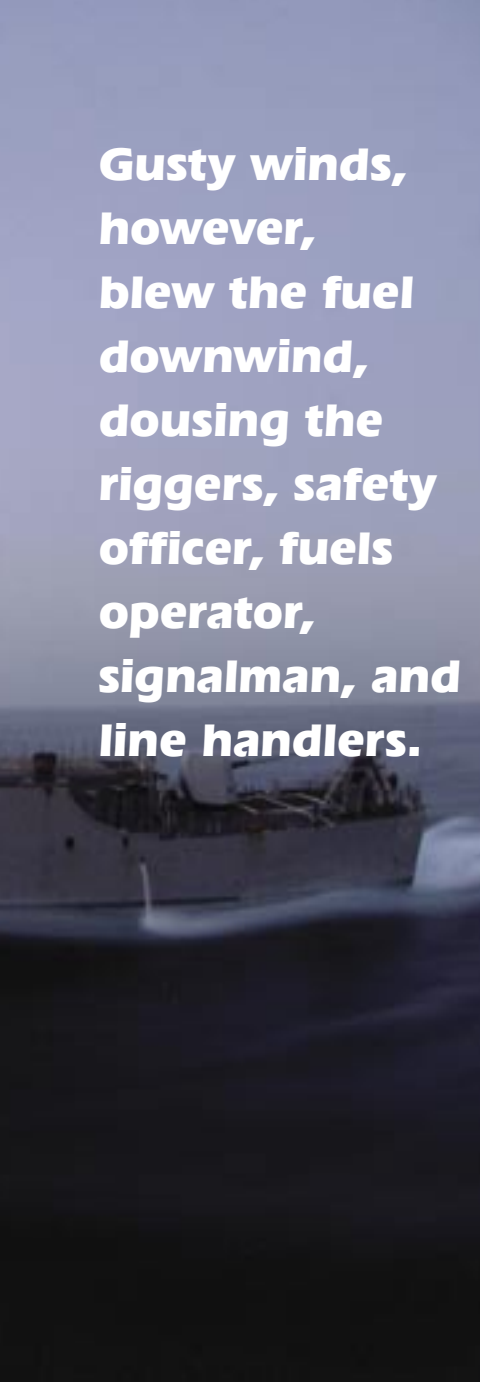
Navy photo by PH1 Aaron Ansarov

By Ens. Chris Bingham and Lt. Andrew Bates,
USS *Lake Erie* (CG-70)

It started out as a routine underway replenishment in the Middle Pacific between our cruiser and a T-AO. Because this was the first unrep we had conducted in four weeks, everyone up and down the chain of command was talking safety and discussing operational risk management (ORM) to ensure the event went smoothly.

At the time we rendezvoused, the seas were building but still were within limits for the evolution—and we needed the gas! An experienced conning officer brought our ship alongside the oiler without difficulty. Soon, the lines were passed, and the rigs were tensioned. We were beginning to think our fears were for naught, but once the probes were seated, and the fuel started flowing, our preparations were put to the test.

As our ship and the oiler rolled away from each other, the aft fuel probe came unseated because there was too much strain on the cargo whips. In the time required for the probe valve to close automatically, a spray of fuel oil swept back down the deck from both the hose and the bell-mouth receiver. The station line handlers had been positioned with the danger of a parting line in mind—well back from the fuel station, near the aft vertical launch system (VLS). Gusty



Gusty winds, however, blew the fuel downwind, dousing the riggers, safety officer, fuels operator, signalman, and line handlers.

winds, however, blew the fuel downwind, dousing the riggers, safety officer, fuels operator, signalman, and line handlers.

An unrep detail, as outlined in NWP 4-01.4 (Underway Replenishment) or OpNavInst 5100.19D (NavOSH Program Manual for Forces Afloat), doesn't require eye protection. Nevertheless, as a precaution, our fueling-station personnel (riggers, rig captain, safety officer, and fuels operator) working near the probe were wearing eye protection. The intent was to protect against the possibility of fuel splashing during probe hook-up and fuel sampling. Line handlers were not wearing any eye protection or face shields, which allowed some fuel to get in their eyes and mouths and on their skin. Several line handlers and fuel-station personnel also experienced fuel-to-skin exposure.

Unaffected members of the fueling station quickly secured the unseated probe. Medical personnel quickly arrived on station and treated those exposed to the fuel. Minor skin and eye irritation, as well as nausea brought on by swallowing the fuel, were common symptoms among the victims. These symptoms, however, eased in a matter of hours, after the victims had used an eyewash station in nearby sickbay, discarded fuel-soaked clothing and equipment, and showered.

We completed the unrep using the forward station and promptly debriefed afterward. It was estimated that a small amount of fuel had escaped the probe and receiver during the unseating. Distributed by a strong wind, this fuel had managed to affect a dozen fueling-station personnel, but we felt fortunate: There were no lasting injuries or damaged equipment. We incorporated this new hazard into our ORM planning and implemented additional controls for future underway replenishments.

Future Precautions

Make sure refueling-station personnel, including line handlers, wear eye protection. Some of the rig personnel were wearing vented safety goggles, which protected them from a direct splash but allowed the blown fuel to enter from the side vents. All unrep personnel should wear splash-proof, chemical, protective goggles to prevent any fuel-to-eye exposure in the event the probe unexpectedly unseats.

Consider fuel spray when placing refueling-station personnel. Some station personnel are needed downwind of the probe, but moving the safety officer and signalman upwind of the station could prevent them from getting doused. Line handlers not actively tending a line now are kept out of the projected fuel-spray path at each station.

Note the location of your eyewash stations. The relatively short distance between our aft fueling station and sickbay greatly helped us quickly treat victims. In the case of the forward fueling station, though, the nearest eyewash stations normally are in locked compartments (paint locker on the port side, supply storeroom on the starboard). As a direct result of this experience, these compartments now are unlocked before each unrep to provide ready access.

Strictly adhere to battle-dress standards. This precaution reduced or prevented fuel-to-skin exposure for many of the station personnel. We will continue these standards. Another issue the safety team weighed was the benefits of having extra medical personnel on station during an unrep. We determined, however, that the medical-response time in this event was more than adequate.

In the end, this event served to highlight a hazard that hadn't previously been incorporated into our ORM planning and briefing routine. General safety measures already in place, though, and prompt on-scene actions prevented any lasting casualties.

Resources:

- http://navsci.berkeley.edu/ns12b/Presentations/Ship%20Operations/M%20-%20UNREP.ppt *[Underway Replenishment]*
- http://www.fas.org/man/dod-101/navy/docs/swos/deck/STU14~2.html *[Underway Replenishment Planning]*
- http://www.safetycenter.navy.mil/orm/generalorm/scenarios/unrep.ppt *[Scenario (Underway Replenishment)].*

ORM Paves Way To Find

Learning how to play chess could help someone balance the wellness wheel, according to the author. *[Photo's use is "representative" only.—Ed.]*

By Cdr. James F. Koeltzow,
USS *Kitty Hawk* (CV-63)

No limits exist on how or where operational risk management (ORM) processes can be integrated into Navy sea and shore activities. On board *Kitty Hawk*, we have spent a lot of time integrating ORM into our institutionalized processes (e.g., flight briefs, weapons drills, RAS, and navigation briefs), but we didn't stop there.

We have taken the ORM process and applied it to the individual in an effort to minimize risk and maximize performance. One key concept we keep preaching from the safety pulpit is "treat the cause, not the symptom." You'd be surprised how often we fail to treat the cause while trying to fix potential trouble areas.

Alcohol-related incidents (ARIs) exemplify this point. In this day of increased awareness and sensitivity to activities associated with the drunken Sailor, it's important we implement controls that will work. The chances of a control working are related to how effectively we direct our efforts at the cause of the problem.

When it comes to ARIs, alcohol is not the cause. Alcohol is an accelerator; it exploits

Navy photo by PHAN Dustin Gates

ing Root Cause of ARIs

human weaknesses, and it amplifies existing problems, bringing them to the obvious attention of others, but alcohol itself is not **the** problem. And, if we treat it as such, we will not eliminate or even reduce the real problem. Instead, we'll just postpone the magnitude.

When we, as leaders, see someone with potential alcohol-abuse problems, a valuable assessment tool is what I call the wellness wheel. This wheel involves six human areas of development and need: the mind (intellectual and social), body (physical and sexual) and soul (spiritual and emotional). Using a pie chart to graphically depict the wheel concept is valuable visually because it shows that people who are well-balanced, well-rounded and adequately developed function with a wheel that is round. Their round wheels roll smoothly over the surface of life—with less friction and less stress.

When leaders see symptoms of alcohol misuse and abuse in an individual, they need to start out by determining how balanced that person's wellness wheel is. If areas of neglect exist, the best way to treat the cause—and not the symptom—is to focus on the trouble spots.

Perhaps the person is committing very little time to intellectual development and stimulation. Persuading him/her to enroll in a new course of study or to learn how to play chess could help balance the wellness wheel. Your efforts also might help the individual recognize more self-improvement, increased self-esteem, and better time management.

Many alcohol abusers have social deficiencies that play out in life with hours spent in bars, consuming alcohol until they are completely dysfunctional. Mast records reveal that we've had Sailors aboard *Kitty Hawk* with BAC levels as high as 0.38 and 0.40. It's reasonable to assume other Navy units have had similar incidents. Those medically knowledgeable realize these numbers reflect near-death levels of alcohol in the blood. Sailors in this situation usually end up with non-judicial punishment, temporary restriction, career damage, and alcohol treatment—as a minimum.

Savvy, engaged leadership can get out in front of these problems by accurately assessing their personnel and implementing controls to affect the cause. Remember: Treating alcohol as the problem won't yield success; you have to treat the underlying problem within the individual.

The author is the ship's safety officer.

Resources:

- http://www.ensuringsolutions.org/solutions/solutions_show.htm?doc_id=339028&cat_id=963 *[Ensuring Solutions to Alcohol Problems]*
- http://pubs.niaaa.nih.gov/publications/aa49.htm *[Alcohol Alert]*, pubs.niaaa.nih.gov/publications/arh23-2/138-143.pdf *[Treating Problem Drinking]*
- http://www.npc.navy.mil/CommandSupport/NADAP/*[Navy Alcohol and Drug Abuse Prevention (NADAP)]*.

USS *Doyle*: Conquering the Blue Threats

Navy photo by PH1 Martin E. Maddock

By LCdr. Jennifer Gelker and Ken Testorff,
Naval Safety Center

"We need to treat the threats we can control, the Blue Threats, with the same energy we approach fighting the Red Threats. Because, today, Blue Threats—our errors and poor decisions—are our deadliest enemies." That's the challenge Commander, Naval Safety Center, RADM George Mayer, issued.

One command that's meeting this challenge in resounding fashion is USS *Doyle* (FFG-39). How are they doing it? In the words of the ship's XO, LCdr. Stewart Wennersten, "We, on a daily basis, incorporate the family, team and warship philosophy the CO has ingrained in the crew."

According to the CO, Cdr. Michael Elliott, "If each crew member on board embraces the first two elements of this philosophy or vision and lives it daily—literally 'walking the talk, vice just talking the walk'—then the third element, warship, will take care of itself."

The family climate that exists among the 220-member *Doyle* crew helps each to understand how the attitudes and behavior of a few can positively or negatively affect those of the entire group. The Sailors also know what they do both on and off the ship affects the family and team, so they're always looking out for one another.

The CO believes his vision, actions, attitudes, and philosophy set the benchmark for all those around him. "The success of any ship's safety program, in my opinion, resides predominantly with the CO and his/her ability or lack thereof to plant a seed, nurture it, and then reap the rewards," explained Cdr. Elliott. "The seed, in this case, is an ordinary set of eyes that turns into a set of critical eyes, focused on safety."

From the time they first set foot on board *Doyle*, crew members become acutely aware that safety is woven into everything the ship does. "Our workday starts and ends with safety in mind," noted

CMDCM(SW/AW) Willie Glover. Nothing is undertaken without adhering to the principles of operational risk management (ORM).

Commander Elliott emphasized, "My philosophy embraces the ideology that every single crew member is considered a 'safety expert.' Each has another set of 'critical eyes' at their disposal and, as such, has the ability and responsibility to stand up and let folks know if something doesn't look, sound or appear safe. Bottom line: If something doesn't pass the 'safety litmus test,' then the process isn't done until a meeting of the minds can agree on a safe path to pursue."

Before every shipboard evolution, Cdr. Elliott reminds all hands (over the 1MC, face-to-face, or both) they have these critical eyes and have a vested interest in the safety program and the readiness of FFG-39. The result is that *Doyle* Sailors have taken full custody and accountability for the ship's safety program.

Unlike many of their fleet counterparts, *Doyle* Sailors find time to focus on technical requirements, despite today's high operational tempo. "Formal instruction like the routine training the duty sections accomplish and the periodic stand-downs required by instructions make up only part of our focus," said Lt. Chad Fella, *Doyle's* operations officer. "We constantly remind ourselves to look out for one another and to ask, 'Is this the right way to do business?'

"We believe in the adage, 'If you're too busy to do it right the first time, you'll have to make time for it a second time,'" he continued. "It ultimately saves time to do a check according to the maintenance-requirement card, rather than speed through it, just hitting the bare minimum requirements. With the latter method, you'll spend countless hours troubleshooting a faulted component." This attitude is evidenced by the reinforcement of standards and leadership that extends from the wardroom, chief's mess, leading petty officers, and on down through the crew.

Another item stressed aboard *Doyle* is that you often only get one chance to do things right. "All it takes," said Lt. Fella, "is a poorly executed lift to permanently injure the discs in your spine and condemn yourself to a life of back pain. When a two-person lift is involved, we remind our Sailors to make sure each other is lifting properly. The same 'look out for your shipmates' mentality also applies to using PPE."

Because *Doyle* is an older frigate, there's always a tendency, according to Lt. Fella, for Sailors to declare things "beyond hope" when they break. "We avoid that mindset, though," he explained, "by making sure our crew members understand you often don't get to schedule when you'll really need a fire pump or battle lantern. It has to be a way of life for you and your shipmates to survive."

USS Doyle's *last reported mishap occurred March 22, 2006.—Ed.*

The Secrets to *Doyle's* Success

When a Naval Safety Center survey team visited USS *Doyle*, they witnessed several best practices firsthand. Here is a list of some you perhaps can use to improve your own command's operational readiness and crew safety.

Working aloft/harness control (combat systems). The ship's CE Division has instituted steps to make the aloft program easy to manage. For example, the program is centrally located and controlled within CE Divison. Each and every harness, lanyard and climber-safety sleeve on the ship is serialized, along with corresponding individual bags for proper planned maintenance system (PMS) performance and documentation. Only qualified individuals are allowed to distribute and use safety harnesses for related operations. Regular training is conducted during distribution and return of all harnesses.

Ready service lockers (RSLs)/magazine maintenance (weapons). These areas are kept at the highest level of combat readiness. Daily magazine inspections are conducted, with discrepancies documented in a log and tracked for completion. In addition, PMS in the RSLs is completed and documented according to the fleet's 3-M program: knife edges are free of paint, there are no visible signs of rust, drain plugs aren't seized—they're hand tight, "No Smoking" placards are posted, and rubber gaskets show no signs of water intrusion. Combining personal pride with dedication to the job contributes to the continuing success of *Doyle's* CG Division.

Hazardous-material control and management (supply). Ensuring the correct materials are on board is essential to a ship's readiness. The first step in inventory management is making sure the full inven-

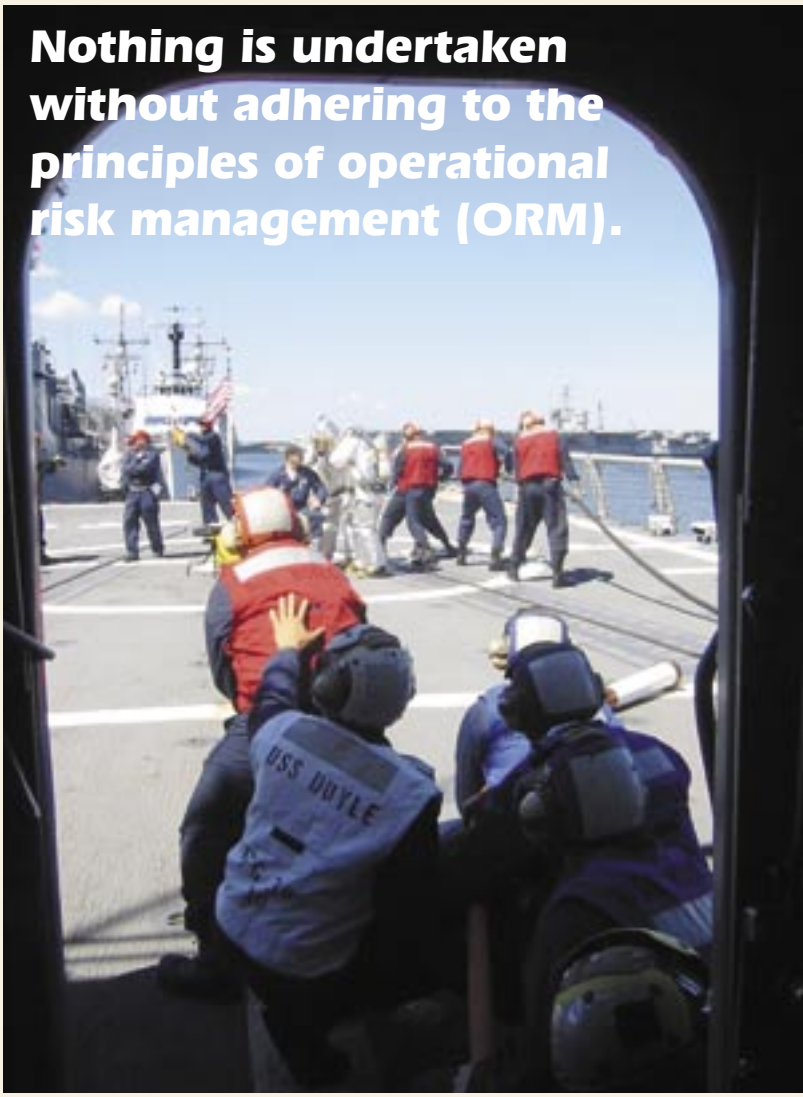
tory is posted in the hazardous inventory control system Windows (HICSWin) computer software. Tracking hazmat with HICSWin lets you know who checked out the material, what your on-hand balance is, and how much you need to reorder. HICSWin keeps track of high and low limits, thus ensuring the ship always has the quantities needed. One of the most important facets about HICSWin is that it prints out the material safety data sheet (MSDS); hazmat never should be issued without an MSDS. Disposing of used hazardous material is another important part of a successful hazmat program. Incorrectly stowing or labeling used hazardous material can cost the ship thousands of dollars, and not off-loading it in a timely and efficient manner eats up man-hours and takes away vital space aboard ship.

Respiratory-protection program (deck). All respirators are cataloged, maintained and stored according to OpNavInst 5100.19D. The respiratory-protection manager has a readily available binder with his designation letter; copy of training certificate; SOPs; and sheets identifying medical exam, fit-test, training dates, and respirator sizes for all qualified users. He also maintains a log of respirator issues and returns. Only qualified individuals are allowed to distribute respirators for required operations, and annual and periodic training is held during the distribution and return of all respirators.

Traffic and recreational/off-duty safety. Recreational and traffic topics are incorporated into all safety stand-downs and CO calls, which are held regularly before all holidays. Naval Safety Center messages are distributed to the crew and maintained on the command's safety bulletin board for convenient review. The command ensures all hands complete their NKO drive-for-life course by making it an inspection item during the division in the spotlight (DITS) program. Motorcycle safety also is addressed at all stand-downs, and new riders immediately are signed up for the on-base motorcycle-safety course. The safety officer ensures all riders maintain the required PPE and documentation. Both programs are assigned to junior officers (ensigns) to help develop their leadership skills and to highlight safety responsibility from the initial stages of their careers.

Wardroom. A command plan of actions and milestones (POA&M) is established to coordinate all maintenance and repair-related issues. Monthly meetings are held to ensure that all available resources are being exploited to achieve the maximum safety readiness.

Chiefs' Mess. The chiefs' mess uses the relational administration (RAdm) program to monitor and track all training, including safety, for associated divisions. This program allows the user to enter training and to receive updates on each individual's training periodicity.



3-M Coordinator. Safety is a major focal point during the ongoing 3-M self-assessments—continuous training is paramount to any successful program. From maintenance personnel to department heads, safety is stressed during every 3-M lecture or training session. What makes *Doyle's* 3-M program successful is the entire crew's involvement. Everyone from the CO to the most junior maintenance person is active, involved and knowledgeable, regarding their individual roles. As noted by the Afloat Training Group (ATG) assessors during the ship's 3-M certification assessment in November 2006, "USS *Doyle* has presented the best maintenance program this assessment team has seen in more than two years."

OSH

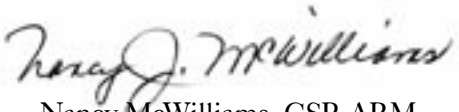
From the Director, Installation and Industrial Safety, Naval Safety Center

Welcome to the magazine's new Occupational Safety and Health (OSH) department. Our goal is to bring you OSH information that will help you in the performance of your job. If there is a topic you would like to see covered, please let us know. Potential topics include standards and regulatory updates, hot topics, voluntary protection program (VPP), and mishap reporting and recordkeeping.

A highlight of this package is the information on electrical safety because there's regulatory news, and it's also a hot topic—we keep seeing reports of serious injuries that occur while performing electrical work. If you have a best practice that was instituted because of lessons learned from a mishap, we would love to hear about it and share it with our readers.

We're also highlighting the Occupational Safety and Health Administration's (OSHA's) voluntary protection program. This program recognizes exemplary workplaces that have implemented safety-management systems and have reduced their mishap rates. The Department of Defense has embraced VPP and established a DoD VPP Center of Excellence (CX) to help the services implement the program. Many of you may be familiar with VPP, especially if your installation or activity already has begun implementation. This program probably will be a regular OSH feature, and we'll share some of the success stories in this issue.

Finally, it's our delight to include the FY06 CNO Awards for Achievement in Safety Ashore, along with some tips for preparing award-winning packages.



Nancy McWilliams, CSP, ARM
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Mishap Reporting and Recordkeeping:
Do You Need Training?

The Naval Safety Center is trying to identify mishap-reporting training needs. Classes were held recently on the East and West Coasts, as well as during the NAVOSH PDC in March 2007.

These classes focused on the Web-Enabled Safety System (WESS) and how the Enterprise Safety Applications Management System (ESAMS) interacts with it. Classes also focused on the instructions and standards that apply: OPNAVINST 5102.1D (Navy and Marine Corps Mishap and Safety Investigation, Reporting and Recordkeeping Manual) and 29 CFR 1904 (Recording and Reporting Occupational Injuries and Illnesses).

We would like to hear from you if you want/need training in how to report mishaps, how to maintain your mishap records, or how and when to use the OSHA 300 Log to record injuries and illnesses. Send your training requests to Chuck Almond, Installation and Industrial Safety Directorate, Naval Safety Center, at charles.almond@navy.mil.

OSH

Electrical Shocks, Burn Injuries Still Big Problem

By Steve Geiger, CSP
Naval Safety Center
SAFE-NAVOSH@navy.mil

According to a study done by the Department of Labor's Bureau of Labor Statistics, 2,287 U.S. workers died and 32,807 sustained lost-time injuries from electrical shock or burn injuries between 1992 and 1999. Of these 32,807 non-fatal injuries involving lost time, 38 percent were classified as electrical burns. Each injury caused an average of 13 days away from work, and nearly one fatality occurred every day of the year.

While this study is several years old, it's still relevant today because we continue to face the same issues with electrical shock and burn injuries. Here are two regulatory updates issued in response to this problem, with guidance on providing a safe workplace:

OSHA Electrical Standard Update, Subpart S of 29 CFR Part 1910

OSHA, in the proposed rule, explains the reason for the update. OSHA undertook the project to revise 29 CFR Part 1910, Subpart S, for two major reasons. First, OSHA wanted the standard to reflect the most current practice and technology in the industry. Second, in implementing the rule, OSHA responded to requests from stakeholders to revise Subpart S so it reflects more recent editions of NFPA 70, the *National Electrical Code*, and NFPA 70E, *Standard for Electrical Safety in the Workplace.*

According to OSHA's press release of Feb 13, 2007, "The changes to OSHA's general-industry electrical-installation standard focus on safety in designing and installing electrical equipment in the workplace. Included in the new standard are a new alternative method for classifying and installing equipment in Class I hazardous locations and new requirements for ground-fault circuit interrupters (GFCIs). The 2000 edition of the NFPA 70E was used as a foundation for the revised standard. The final rule also replaces the reference to the 1971 *National Electrical Code* in the mandatory appendix to the powered-platform standard with a reference to OSHA's new electrical-installation standard." The final rule becomes effective Aug. 13, 2007.

To read OSHA's "Safety and Health Topics" for electrical, visit http://www.osha.gov/SLTC/electrical/index.html.

Navy Electrical Update

The Navy is ahead of OSHA in updating electrical-safety standards. The Navy updated the Tri-Services Unified Facilities Criteria (UFC) 3-560-01, with Change 1, "Electrical Safety, Operations and Maintenance (O&M)," to meet the requirements of NFPA 70E 2004.

This UFC supersedes UFC-3-560-10N (previously MIL-HDBK-1025/10), *Safety of Electrical Transmission and Distribution Systems*, referenced in OpNavInst 5100.23G. It incorporates tri-service requirements into one unified document and provides electrical-safety requirements for all shore electrical-work activities (low and high voltage) and addresses implementing NFPA 70E 2004 arc-flash criteria for electrical safety.

An updated version of OpNav P-45-117-6-98, *Electrical Worker Field Safety Guide*, incorporating the requirements of this UFC, is being developed and should be available in the near future.

Remember, regulations always are the *minimum* requirements to ensure worker safety. OSHA's 29 CFR 1910, Subpart S, and the Tri-Service UFC provide guidance to help ensure your command's electrical workers have a safe workplace. You always can take more steps to further protect yourself and your fellow workers.

More information can be found at these websites:

- http://www.wbdg.org/ccb/DOD/UFC/ufc_3_560_01.pdf
- http://safetycenter.navy.mil/osh/downloads/ufc_3_560_01.pdf *[DoD – Unified Facilities Criteria – Electrical Safety and O&M].*

Navy photo by MC3 Marvin E. Thompson, Jr.

OSH

VPP—A History of Success

OSHA formally announced the voluntary protection program (VPP) and approved the first site in 1982. In 1998, federal worksites became eligible for VPP. Today, there are four VPP Star sites and one VPP Merit site:

- Portsmouth Naval Shipyard – Star 2005
- Norfolk Naval Shipyard – Star 2006
- Puget Sound Naval Shipyard and Intermediate Maintenance Facility – Star 2006
- Naval Submarine Base, King's Bay – Star 2007
- Weapons Station, Charleston – Merit 2007

Approval into VPP is OSHA's official recognition of the outstanding efforts of employers and employees who have achieved an exemplary occupational-safety-and-health program. This program must demonstrate vigorous management and employee involvement, effective worksite inspections, hazard prevention and control, and safety and health training.

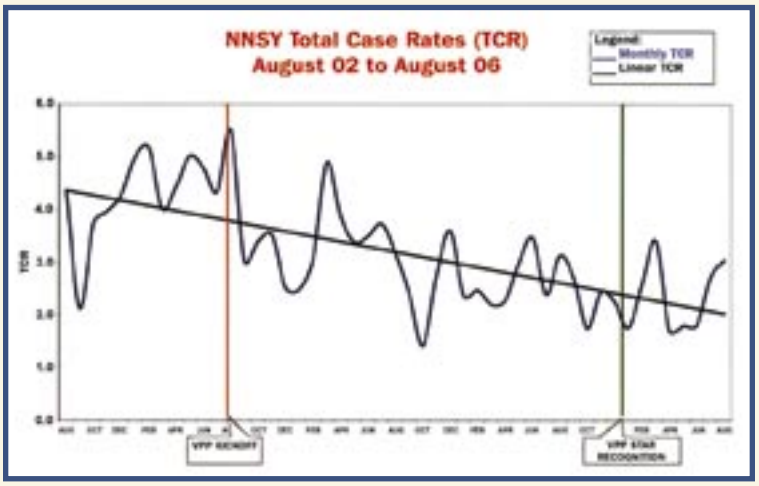
VPP participants develop and implement safety-management systems that effectively identify, evaluate, prevent, and control occupational hazards to prevent employee injuries and illnesses. Sounds very much like operational risk management (ORM), doesn't it?

Because we are all focused on reducing our mishap rates, it's important to note that, according to OSHA statistics, the average VPP worksite has a "days away restricted or transferred" (DART) case-rate 52 percent below the average for its industry. These sites typically do not start out with such low rates. Reductions in injuries and illnesses begin when the site commits to the VPP approach to safety and health management.

Current Status of DoN VPP Participation

VPP is being embraced across the Department of the Navy, with 47 major Navy and Marine Corps sites in various stages of implementation. We have one Star application in process, and three sites are enrolled in OSHA's VPP "Challenge." This latter program provides sites with a three-stage roadmap to improve their safety-and-health-management systems as they work toward VPP status.

At the NAVOSH Professional Development Conference, held March 12-16, 2007, in Virginia Beach, Va., NNSY showcased its successful VPP journey at the VPP panel session.



Norfolk Naval Shipyard's on-duty civilian total-case-incident rate (TCIR) declined 58 percent from FY2001 to FY2005. Since PSNS and IMF started the VPP process in 1998, they have cut their injury and illness rates in half.

At the end of March, Navy and Marine Corps sites in various stages of VPP implementation had an opportunity to provide an update on their progress at a DoD VPP information exchange. They also will have an opportunity to attend training sessions and share their experiences with representatives from the Army, Air Force, and other DoD agencies.

More information can be found at these websites:

- http://www.osha.gov/dcsp/vpp/index.html *[OSHA's Voluntary Protection Program]*
- http://www.safetycenter.navy.mil/osh/shore/VPP.htm *[Naval Safety Center's VPP page]*
- http://www/safetycenter.navy.mil/success/stories/0121.pdf *[Portsmouth Naval Shipyard article and photos]*
- http://www.safetycenter.navy.mil/success/downloads/VPP-Nrfk_Naval_Shipyard_Final.pdf *[Norfolk Naval Shipyard article and photos]*
- http://www/safetycenter.navy.mil/success/stories/0125.pdf *[Puget Sound Naval Shipyard article and photos]*
- http://www.vppcx.org/ *[DoD VPP Center of Excellence].*

OSH

How PSNS and IMF Attained VPP Star Status

Puget Sound Naval Shipyard and Intermediate Maintenance Facility (PSNS and IMF) transformed itself to attain VPP Star recognition. Read on to learn how they did it.

PSNS and IMF established a partnership between management, labor, and OSHA in developing a positive, pro-active safety culture.

They increased safety awareness among all employees and empowered the work force to accept responsibility for their own safety and the safety of their coworkers. Employee involvement is one of the keys to a successful program. PSNS and IMF incorporated the following initiatives to increase employee involvement:

• *VPP Passport* – An educational tool to increase employees' knowledge of VPP and the PSNS and IMF safety program. *VPP Passport* also increased employees' involvement in their own safety. Currently, 68 percent of PSNS and IMF employees have completed the first version of the passport. Version 2 is set to be released soon.

• *Shop, Code and Project Safety Committees* – Each PSNS and IMF shop, code and project currently has a safety committee made up of employees who work together to solve safety issues in their work areas.

• *Quarterly Worksite Inspections* – Shop, code and project safety committees have teamed up with the PSNS and IMF safety office to conduct safety inspections of the entire facility on a quarterly basis. Previously, the safety office conducted annual inspections; but with the assistance of employees, they have been able to increase the frequency of the inspections and to receive assistance in getting deficiencies corrected in a timely manner.

• *Employee Recognition* – Currently, PSNS and IMF has two employee-recognition programs through which employees can be recognized by other employees for safe work practices. These are the "safety ACT program" (allows employees to nominate other employees who perform a specific contribution related to safety) and the "VPP recognition team" (recognizes employees whom they find working in a safe manner with free lunch tickets).

PSNS and IMF realized that implementing safety and health standards wasn't only compatible with cost, quality and productivity, but was the right and moral thing to do.

OSHA, management and labor agreed that safety is part of the job and not an add-on item.

DoD Instruction Update:

Injury-Reporting Requirements Revised

The Department of Defense released a memo dated Feb. 20, 2007, that revised DoD Instruction 6055.7 (Accident Investigation, Reporting and Recordkeeping). That memo also replaced the "Safety and Health Recordkeeping" policy memo dated Dec. 3, 2004.

As noted in the Feb. 20 memo, "A recent review showed significant underreporting of military injuries resulting in lost duty time. Failure to report and investigate mishaps prevents us from acquiring the knowledge needed to prevent future injuries. The attached guidance, which is effective immediately, requires injured military and civilian personnel and their supervisors to report each mishap-related injury. It also requires the use of medical treatment and civilian workers' compensation reports in the identification of mishaps. The next issuance of DoDI 6055.7 shall incorporate this guidance."

We've already received questions, so here is a point of clarification:

Question: What constitutes a "lost work day" for military?

Answer: Any time away from work (whether it's minutes, hours or a full day) on any particular day, due to an injury (excluding the date of injury), is counted as a "day away from work."

The DoD memo can be found at: http://www.safetycenter.navy.mil/osh/downloads/INJURY_REPORT.pdf.

OSH

CNO FY06 OSH Safety Award Winners Named

Congratulations to the OSH safety and health program winners in the CNO FY06 Awards for Achievement in Safety Ashore. Here are those winners:

Shore Activities

OCONUS Industrial – **Naval Facilities Engineering Command, Far East**

OCONUS Non-Industrial – **Commander, Fleet Activities, Sasebo (CFAS), Japan**

CONUS Large Industrial – **Norfolk Naval Shipyard, Portsmouth, Va.**

CONUS Medium Industrial – **Strategic Weapons Facility Atlantic, Kings Bay, Ga.**

CONUS Small Industrial – **South Central Regional Maintenance Center, Ingleside, Texas**

CONUS Large Non-Industrial – **Naval Air Station, Jacksonville, Fla.**

CONUS Medium Non-Industrial – **Naval Undersea Warfare Center, Newport, R.I.**

CONUS Small Non-Industrial – **Naval Submarine Base, Kings Bay, Ga.**

CONUS Fleet Op/Support Unit – **Surface Warfare Development Group, Norfolk, Va.**

Individual Awards

Capt. Michael McKinnon – Commanding Officer, Naval Submarine Base, Kings Bay, Ga.

Steve S. Allbritton – Safety and Health Manager, Fleet Activities, Okinawa, Japan

Helpful Hints for Preparing Award-Winning Packages

Successful packages combine the efforts of command safety managers and the chain of command. The Naval Safety Center wants to help each command attain optimal grades on their submitted award packages by offering these tips:

Ensure all topic areas from OPNAVINST 5100.23G, Chapter 32, Safety Awards Program Ashore, are discussed within the package. Even if a particular safety area is covered by the regional safety office (e.g., traffic safety), it should be discussed in your command's safety-awards submission package. Present the information, using concise narratives and bullets where feasible.

Use the safety self-assessment sheets to ensure all areas are covered. These sheets are available at: http://www.safetycenter.navy.mil/awards/scoring/Standard_Ashore_AwdMatrix_2006.xls.

Have the trend data reflect the rate reductions over time. Detailed descriptive comments that discuss the impact on the overall safety and health program in support of the DoN FY2007 mishap objectives are welcome.

Identify who played key roles, along with the safety committees and coordinators. Highlight the superior performance of your workplace supervisors and tenant-command collateral safety personnel.

Include training partnerships between host and tenant(s), as well as external municipalities, schools, etc.

Add comments on the progressive improvements over the past three to five years that are being seen in your NAVOSH programs, such as ergonomic-research participation and how it fits into the facility's management plan.

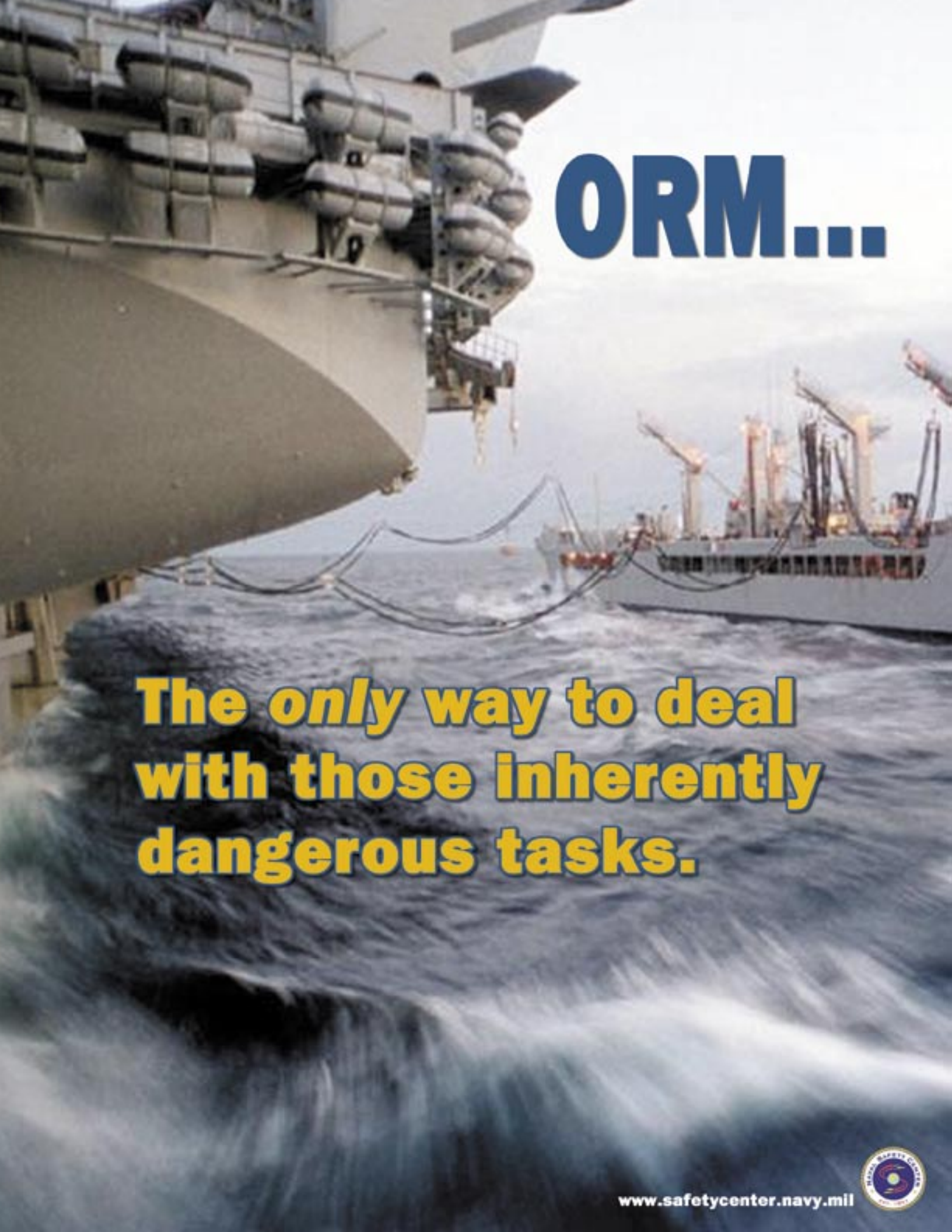
Emphasize the success of using individual development plans (IDPs) to support professional growth at all levels within the safety organization.

Highlight the command's process review and measurement system (PR&MS) process and describe how it helped move the safety program forward toward a goal or goals.

Recognize that MWR aspects falling within the scope of the occupational safety and health program should be identified in your package.

Verify command personnel numbers and have several people proofread your award package. Work with your chain of command to ensure that all enclosures reach the Naval Safety Center before the due date.

POC: Steve Geiger, CSP
SAFE-NAVOSH@navy.mil


ORM...
The only way to deal with those inherently dangerous tasks.
www.safetycenter.navy.mil