NPS Mourns Loss of Capt. Alan Poindexter

By Dale M. Kuska and Amanda D. Stein

It was an emotional month for the Naval Postgraduate School community as the campus and the country mourned the loss of the university’s Dean of Students and Executive Director of Programs Capt. Alan “Dex” Poindexter. He lost his life in a tragic accident off the coast of Pensacola, Fla., July 1.

Poindexter, a 1995 aeronautical engineering graduate from NPS, came to the university following a long, distinguished career with the Navy and NASA as a pilot, shuttle astronaut and executive. Poindexter commanded one of the final flights of the space shuttle Discovery in April 2010 prior to the program’s official retirement just over a year later.

“Capt. Poindexter was so uniquely impressive, it was impossible not to love the guy — and as I have seen over the last year, and the last few days, there are literally hundreds and hundreds of people who share this impression of him.” — Interim Dean of Students, Cmdr. Matt “Dutch” Vandersluis

“Dex was not just the senior naval officer here at NPS, he was an accomplished man of extraordinary character, a devoted husband and father, and a true professional — precisely the kind of man that could serve as a true mentor to all of our students,” said NPS President Dan Oliver.

“Capt. Poindexter was so uniquely impressive, it was impossible not to love the guy — and as I have seen over the last year, and the last few days, there are literally hundreds and hundreds of people who share this impression of him,” added Interim Dean of Students Cmdr. Matt “Dutch” Vandersluis.

Nearly 200 of those individuals gathered for the NPS Cycling Club’s Capt. Alan Poindexter Tribute Ride, July 21, where members of the NPS and local communities shared fond memories of the man who touched so many lives.

“Since he was very involved with the club, both as a leader and a rider, the NPS Cycling Club Board members felt the most appropriate way to pay our respects to his memory was through a ride that included everybody in the community,” said Cycling Club Public Affairs Officer Lt. Angela Lefler. “And we decided to call it a ‘tribute’ instead of a ‘memorial’ because it sounded more upbeat and fun, and that’s what Dex would want the ride to be.”

The nearly 10-mile ride began and ended at Lovers Point, with a stop on the steps of Herrmann Hall for a moment of silence and a prayer by the university chaplain, followed by the sounding of Taps.

On Aug. 10, the university will hold a campus-wide memorial service on the east lawn of Herrmann Hall at 1:00 p.m.
Doing business at NPS is complicated because we sit at the nexus of the Navy, higher education and the federal government. Each of these entities and cultures has its own set of best practices, challenges and strengths to complete its mission. The key to success for NPS Finance and Administration — to providing the best possible support to achieving the educational mission of the students and faculty of NPS — is to constantly ask ourselves, “What should we be doing and how should we do it?” All of us in Finance and Administration strive to provide the best answer to that question every day. We’d like to talk about three areas where we are trying to answer the question.

First, a look at the Kuali Financial System and the Configuration Control Board … The Kuali Financial System (KFS) was implemented at NPS three years ago, in a limited fashion in fiscal year (FY) 2010, but as our primary internal management reporting and financial system for the past two years. As with the implementation of any new financial system, NPS has found the changes associated with the KFS implementation to be challenging. To help meet those challenges, the KFS Configuration Control Board (CCB) was established, with representatives drawn from faculty and staff, overseeing the development of new capabilities and reporting, making certain the needs of all NPS stakeholders are addressed. The KFS CCB oversaw the recent release of reconciliation and detailed account reports for reimbursable activities. Additionally the KFS CCB initiated the task of reviewing procurement processes, the first set of financial business processes to be reviewed for rework and improvement. To aid in that review, support unit managers and employees will receive training in Lean Six Sigma during FY 2013 to better participate in process redesign for improvement.

Second, our work with the Reimbursable Support Costs and Recharge Cost Centers … With two-thirds of NPS’ financial support coming from reimbursable activities, NPS relies on sponsor funding to enable much of the research opportunity needed for NPS students to complete their theses. The reimbursable support or indirect costs assessed against sponsors’ activities fund important services provided by NPS that, although significantly related to the work of the sponsor, cannot be directly charged to a reimbursable project because of the nature of the work or the impracticality of tracking precise expenditures. These indirect costs have been the subject of much discussion with big Navy over the past two years, and NPS adopted major changes to its methodology and rates for allocating indirect costs to sponsored activities in FY 2012, with even more changes coming in FY 2013. The Faculty Council, as well as individual faculty members, have expressed concern about maintaining an indirect cost rate at a low enough level to keep NPS competitive with other research facilities. With that in mind, NPS has begun to establish Recharge Cost Centers that charge only to those reimbursable projects that use services, rather than including costs in an indirect rate spread across all reimbursable activities on campus. This ensures better alignment between costs and services received and helps keep the indirect rate lower. Recharge Cost Centers in place for reimbursable activities in FY 2013 are: contracting support, grants support, and support for inter-agency personnel agreements.

Finally, we want to touch on the FY 2013 budget process … NPS President Oliver regularly emphasizes the importance of financial transparency. The NPS internal budget process has become more and more visible to the campus community, with public budget meetings at the start of each fiscal year. The Faculty Council Budget Committee is actively involved in campus budget deliberations. We continue to look for ways to make the budget decisions visible to and understandable by the campus.

We are always looking for constructive suggestions from the campus about ways to improve our services to the campus. I encourage you to e-mail me or the Finance and Administration directors with your suggestions.
NRC Postdoctoral Program, a Win-Win for Campus Researchers
By Amanda D. Stein

Research has long been a cornerstone of the Naval Postgraduate School mission — it is a simple, straightforward requirement at any graduate level university. At NPS, students and faculty from across departments apply their expertise to solving real-world defense challenges, but are joined in their efforts by roughly two dozen top young scientists from around the world and across disciplines.

These bright young minds come to NPS via the National Research Council (NRC) Research Associateship Program, and are selected to join various departments across campus providing invaluable support to diverse research efforts.

NPS oceanography Associate Professor Dr. Timour Radko, left, serves as an advisor for NRC Postdoctoral Fellow Jason Flanagan, right. Flanagan, one of dozens of postdocs at NPS at any given time, provides invaluable support to the department’s research in ocean ring stability. (U.S. Navy photo by Javier Chagoya)

NPS Vice President and Dean of Research, Dr. Jeffrey Paduan, has seen firsthand the value that postdoctoral fellows can bring to a department. In his 21 years with the NPS oceanography department, Paduan has seen that the postdoc relationship can be a mutually beneficial one.

“The NRC program is a truly win-win proposition,” Paduan explained. “For the fellow, the program provides access to some of the government’s most cutting-edge laboratory groups. For the sponsoring laboratory, including NPS, the program handles all of the application, review and matching activities needed to identify the most promising fellows.”

The program provides postdoctoral fellows a unique opportunity to apply their experience in the lab, working on research that could potentially directly reach the defense community. As valuable as the experience is for the students, the faculty also see the postdocs as a valuable asset for their departments, and NPS as a whole.

“Unlike most research universities, in which the graduate student population contains a large fraction of Ph.D. students, NPS is mostly focused on master programs,” explained oceanography Associate Professor Dr. Timour Radko. “This creates a significant void in terms of technical and specialized projects, a void that NRC postdocs help to fill. In addition to the critical support they provide to faculty members, NRC postdocs help to create the synergy and environment much needed for the professional development of graduate students. The presence of young ambitious scientists enriches and invigorates the department as a whole.”

Radko serves as an advisor for postdoctoral fellow Dr. Jason Flanagan, who is continuing his doctoral research in ocean ring stability. Flanagan previously attended the University of Limerick, Ireland, where he received his Ph.D. in applied mathematics and statistics.

Flanagan is just one of several fellows serving in the oceanography department, a part of campus that has hosted numerous postdocs over the years, but his unique research helps generate interest and discussion around a topic that the maritime community has a growing interest in.

“Conducting research here at NPS has provided invaluable experience on several complementing fronts,” said Flanagan. “Given the nature of the student populace, a high level of professionalism, enthusiasm and motivation exists which is invigorating and sustaining. Additionally, the opportunity to work alongside vastly experienced faculty members who are internationally-recognized researchers has been both humbling and inspiring for a researcher at the early stages of career development.”
For the Navy’s surface warfare community, sleep is a luxury not often afforded while on sea duty. The Navy’s standard 81-hour workweek means Sailors in the fleet often experience sleep problems serious enough to have researchers concerned that safety and performance on the job might be compromised. The human performance research of NPS Associate Professor Nita Shattuck and operations research student Lt. Matt Yokeley has caught the attention of surface warfare officers, even being featured in a recent issue of “Navy Times.”

The pair has proposed a revised watchbill of three hours on duty, and nine hours off, which they have dubbed the NPS Optimized Watch-standing (NOW) Schedule, in place of the traditional five hours on and 15 hours off. After conducting four weeks worth of research aboard the USS Jason Dunham, during which time they tested Sailors on both the traditional watchbill, and the revised watchbill, they found that, overall, the Sailors are more alert when the workday is on a 24-hour schedule. In addition, Sailors overwhelmingly prefer the NOW schedule.

“[The traditional watch rotation for a four-section watch is five-on and 15-off. One big difference is that with the three-and-nine, you maintain a static watch, you stand the same watch time every day for a week or two],” Yokeley explained. “With the five and-15, you are constantly rotating, because it puts you on a 20-hour workday. By doing that, you are constantly forcing yourself to shorten your day and move your daily sleep watch patterns. This disrupts the natural circadian rhythm that causes us to sleep and be awake at certain times.”

In the four weeks aboard the Dunham, Yokeley and Shattuck worked with the commanding officer and his crew to gather data on the Sailors’ alertness, sleep patterns, and overall feelings towards the traditional and NOW schedules.

“We collected four weeks of data on the same Sailors, two weeks on either schedule,” said Shattuck. “The results show how alert they are on the two different schedules. There was a statistically significant improvement in performance in the period of time when it’s really hard to stay awake, which is midnight to 4:00 a.m. The bottom line here is these guys were more alert and they liked it better than the conventional watch-standing schedule.”

Shattuck’s first foray in U.S. Navy sleep patterns occurred in 2002 when she was asked to look into the issues related to sleep aboard the USS John C. Stennis. Shattuck has seen the sleep data collection methods improve since her first paper and pencil surveys, but she sees it all leading to solid research results supporting the three-and-nine watchbill, or something like it.

“The surface warfare officers understand that we need to fix this. With reduced manning, it just gets worse and worse, and the margin for error has gotten slimmer … because things move faster,” Shattuck said. “We operate on a 24/7 clock. There are operations all the time, and with the danger that lurks around every warship, Sailors must be alert. It has become a more dangerous world, and because of that we need Sailors to be vigilant and ready to respond in an instant.”

Alumnus Takes Command of PEO Unmanned Aviation and Strike Weapons

NPS computer science alumnus and former Commander of the Naval Air Warfare Center Weapons Division base in China Lake/Point Mugu, Calif., Rear Adm. Mathias Winter takes command of the Program Executive Office (PEO) for Unmanned Aviation and Strike Weapons from Rear Adm. Bill Shannon, in a ceremony, July 20.

“Still at war, our nation faces daunting challenges across the political, military, economic, social, informational, infrastructure domains,” Winter said. “But we have a plan to tackle these challenges … This year, during this tour, my focus for PEO (U&W) builds upon that bridging and my strategic framework of people, organization and programs.”

Winter will be responsible for overseeing 3,800 personnel and more than $46 billion in his new role. He had previously served as the chief of staff for PEO Tactical Aircraft, and project manager for Precision Strike Weapons.
Provost Ferrari Keynotes Singaporean Graduation Ceremony
By MC1 Grant P. Ammon

NPS Executive Vice President and Provost Dr. Leonard Ferrari traveled to the National University of Singapore (NUS) to deliver the keynote address to graduating students at one of the institution’s 22 degree conferral ceremonies – among the notable programs presided over at the graduation was the conferral of degrees to students of the Temasek Defence Systems Institute (TDSI).

“I cannot emphasize enough how the U.S. Department of Defense, and in particular the U.S. Navy, values its partnership with the nation of Singapore and the Singapore Ministry of Defense,” noted Ferrari in his address to TDSI graduates. “In particular, the relationship between the Naval Postgraduate School and the National University of Singapore is seen by all as one of the cornerstones of an enduring international relationship that continues to support our own national securities and a growing collaboration on the broader and more complex, global security issues of our time.”

TDSI is a strategic alliance between NUS and the Naval Postgraduate School that was established in July 2001 to provide a platform that brings together military members and defense technologists in an educational and research environment. TDSI’s goal is to produce graduates who understand the complexities of a military force, enabled to create maximum leverage by the integration of operations and technology. TDSI is governed by a management board of select leadership that is responsible for the strategic direction and policies of the institute.

Global Center Directors’ Conference Solidifies Consortium Efforts
By MC1 Leonardo Carrillo

The Naval Postgraduate School’s Global Center for Security Cooperation (GCSC) held a Consortium Directors’ Conference, July 10–12. The conference brought together leadership of the different consortium members for the opportunity to collaborate, network and exchange perspectives on a wide range of topics.

“This conference is a great event,” said GCSC Director and Dean of the School of International Graduate Studies, Dr. James J. Wirtz. “It brings together much of the U.S. international engagement community and other U.S. organizations to talk about our international engagement activity as an enterprise-wide activity. It provides a wonderful opportunity to get together and network, and get to know each other’s capabilities.”

As part of the conference, attendees were able to present their organizations, present concerns, ideas, as well as ask questions of the guest speakers, which included Chief of Staff in the Office of the Under Secretary of Defense (OSD) for Policy, Mr. Pete Verga; and Defense Security Cooperation Agency Principal Director for Strategy, Mr. Scott Schless.

Verga gave his opening remarks starting with OSD’s new strategic guidance issued in January of this year. He said that the guidance came from the President and the Secretary of Defense’s recognition that we are in a critical point in our national security strategy stemming from the drawdown from the conflicts in Iraq and Afghanistan and the challenges brought on by deficit reduction goals.

“We have to adapt,” said Verga. “We have to be more agile and more flexible … [And] have to look at programs in a very strict light and make some really hard choices.”

He said that it was an opportunity for the DOD to become rebalanced, and refocus attention on emerging issues in other regions around the globe that are important to the U.S.: strategic outlook, and to do this, the nation had to focus on low-cost, small footprint approaches.
NPS, NASA Researchers Employ Global Hawk UAVs in Hurricane Genesis Research

By Amanda D. Stein

Well into the year’s hurricane season, NPS researchers are exploring how hurricanes form, and what factors contribute to their intensity, all in hopes of improving warning systems and allowing for earlier evacuations in hurricane regions. Department of meteorology Professor Michael Montgomery was invited two years ago to take part in developing a research proposal, the result of which was a $30 million NASA venture-class grant for the execution of the NASA Hurricane Severe Storm Sentinel (HS3) project. The Navy’s Office of Naval Research has also recently signed on to help support the NASA effort.

Led by NASA Goddard Senior Scientist Scott Brown, the five-year project is two years in and giving the research team its first opportunity to get out in the field, gathering real-time data in the Atlantic Basin. NPS Distinguished Professor Russell Elsberry, Professor Patrick Harr, meteorology department Research Associate Myung-Sook Park, and National Research Council Postdoctoral Fellows Louis Lussier and Blake Rutherford, will join Montgomery in the month-long field research trip in September. The team will be stationed at NASA’s Wallops Island Flight Facility, where two unmanned Global Hawk aircraft will be used to gather meteorological data from 50,000 feet over the Atlantic Ocean.

The Global Hawks are equipped with onboard sensors and a dropsonde delivery system to gather temperature, wind speeds, pressure and humidity. The dropsondes are small tube-shaped devices parachuted from the aircraft and designed to gather and transmit data as they steadily fall toward the ocean.

Montgomery and the NPS team are directly involved in researching the genesis, or formation, of the storm. He noted that their ultimate goal, through this and other research opportunities, is to better understand and predict severe weather systems. The team hopes that the HS3 research will not only yield insightful data, but will help test prototype equipment that could also be valuable in future research efforts.

“We are trying to understand more about how these storms form and how they intensify. We aim to use that information to better improve our ability to predict the formation and rapid intensification of these storms. We want to be able to better prepare,” Montgomery added. “And the Navy wants to be able to better prepare their fleet and get the fleet out of the way of storms. So they have looked to NPS to bring some of that expertise to help in this project. It’s part of the NPS meteorology mission … to better understand and predict these storms. NPS and the Navy have a vested interest in these severe weather phenomena.”

Focus On … Supporting DRMI
A Monthly Look at Names and Faces on Campus

Although Betty Callihan’s official job title is Executive Secretary to the NPS’ Defense Resources Management Institute (DRMI) Executive Director, her daily duties encompass a much broader range of responsibilities. A lot of her time is spent executing the duties most would expect of a secretary — managing a calendar for the boss, tracking time sheets and providing general customer service. But in her 19 years with DRMI, she has become a leader in the organization, providing encouragement, mentorship and sage advice to all members of the DRMI faculty and staff.

Her office is constantly abuzz with faculty members — junior and senior — stopping by for Callihan’s advice on a variety of topics that range from access to conference rooms to procuring rental cars and lodging in foreign countries. Given her responsibility as travel coordinator for an organization constantly dispatching employees to remote locations across the globe, Callihan is constantly available to all members of DRMI needing her assistance — any hour of the day.

“There have been cases of getting phone calls in the middle of the night from DRMI travelers stuck somewhere around the world in need of assistance,” said Callihan. “I help these members with lodging reservations and rental agreements that fall through and need to be dealt with. There are a lot of things that can happen when our staff travels.”

For the many challenges that come with the daily execution of a mission as diverse and broad as DRMI’s, the staff is fortunate to have an experienced professional like Callihan to consult with.
Any Day at NPS ...

I would like to use this opportunity to introduce the new student council officers and tell you a little bit about our roles at NPS.

My name is Lt. Rob Kurrle and I am the chairman of the Student Council. The vice-chairman is Air Force Capt. Steve Masternak and the recorder is Lt. Meghan Gray.

Why should you care?

The student council represents the voice of the student body (your ideas, complaints and suggestions) to the NPS president. Additionally, we provide a platform for other involvement with the school (i.e. redesigning the muster page, organizing social gatherings, or starting a philanthropy project).

How can you get involved?

We are seeking representatives from each of the academic schools and departments. These reps will provide communication to and from the student body by engaging with their friends and classmates. The time commitment will be minimal and there is no requirement to attend meetings.

If you are interested in becoming a rep or have questions, you can e-mail me at rwkurrle@nps.edu. Most days you can find me at the picnic tables next to the library at lunchtime or in the Trident Room on Thursday afternoons, please stop by!

Lt. Kurrle is the Chairman of the President’s Student Council. Visit the PSC on the intranet at http://intranet/psc/index.html.

Have a story to share? Institutional Advancement is constantly seeking interesting news and stories for Update NPS. Send your tips to update@nps.edu.
August 1
6th Annual Military Wireless Communications Research Group Workshop Monterey Pines Golf Course POC John H. Gibson, jhgibson@nps.edu

August 10
Capt. Alan “Dex” Poindexter Memorial Service Herrmann Hall Lawn

August 17
Star Gazing Party Roman Plunge Reflecting Pool POC Community Activities, Ext. 7955

August 23
Menneken Lecture with Rear Adm. Barry Bruner Undersea Warfare Division Director POC retired Rear Adm. Jerry Ellis, Ext. 2488

August 27-30
Faculty Development Workshop for Homeland Security Educators POC Stephen Recca, sprecca@nps.edu

Historical Highlights
The first classroom and laboratory buildings at NPS — Spanagel, King, Root, Halligan and Bullard halls — were designed by architect Walter A. Netsch in 1951.

Netsch graduated from the Massachusetts Institute of Technology in 1943, served in the Army Corps of Engineers in the North Pacific during WWII, and joined the Chicago firm of Skidmore, Owings & Merrill (SOM) in 1947. In 1950, he became SOM’s lead architect for the Del Monte Shopping Center in Monterey, then single-handedly developed the plans for the NPS campus. Details of his NPS architectural plans were published in two articles in “Architectural Record” in 1954 and 1955.


Historical Highlights are provided by the Dudley Knox Library.

An early NPS campus model designed by architect Walter Netsch.