

Spring 2006

mortar round exploded near

Division Headquarters north of Baghdad, Iraq. She is

our first female cryptologist

to lose her life in combat

operations and the first to

be memorialized on NSA's

The ceremony included a

traditional wreath laying

and the unveiling of the

names "SSG Edwin H.

DazaChacon" and "SGT

Amanda N. Pinson" on

MEMORIAL DAY 2006 AT NSA

On 30 May 2006, LTG Keith B. Alexander, USA, Director, National Security Agency/ Chief, Central Security Service, paid special tribute to SSG Edwin Herbert DazaChacon, USA, and SGT Amanda N. Pinson, USA, during the Agency's annual Memorial Day Observance. The service was attended by family, friends, distinguished guests. Assisting were Major General (Sel) Stephen J. Miller, USAF, Deputy Chief, Central Security

Service; NSA/CSS Command Chief Master Sergeant Alan R. Dowling, USAF; and Museum Curator Patrick Weadon, who prepared the narratives of service read at the ceremony. The Agency's Parkway Chorale and the Director's Joint Service Color Guard again rendered their services.

Columbia-born SSG DazaChacon (4 Jul 1967-13 Feb 2006) was a cryptologic linguist serving in the United States Army in the 3rd Battalion, 7th Special Forces Group (Airborne). He perished in February 2006 when an improvised

explosive device detonated near his Humvee in central Afghanistan.

SGT Pinson (31 Jul 1984-16 Mar 2006) was a cryptologist serving in the United States Army in the 101st Airborne Division, Task Force Band Brothers. She lost her life in March 2006 when a single



CMCMSgt Dowling and LTG Alexander place the wreath

the NSA/CSS Cryptologic Memorial Wall. The wall,

dedicated in 1996, lists the names of 156 Army, Navy, Air Force, Marine, and civilian cryptologists who have made the ultimate sacrifice, "serving in silence," in the performance of their duties since World War II.

wall.

Additional information on the Memorial Wall and special historical monographs highlighting SSG DazaChacon's and SGT Pinson's life, service, and sacrifice can be viewed via the NSA/CSS website at www.nsa.gov/memorial. Amanda

> Pinson's vouth beauty added special poignancy to the commemoration and drew widespread comment. An example, from the Belgian web site of Dirk Rijmenants ("Cipher Machines and Cryptology," at www/users.telenet/ be/d.rijmenants/en/

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OVERVIEW

Lives sacrificed in the service of one's nation are universally and traditionally accorded special honor and recognition, and so it has become with American cryptology and especially its uniformed military components. We are—it is sometimes necessary to remind others—at war. Again Memorial Day at NSA has been observed with the addition of names—two names, two young lives. We honor and mourn their loss and the loss of the lives filled with promise for the future. "They shall grow not old." And we can look to a future time when Memorial Day will be observed without adding names to the growing rows on NSA's wall of remembrance.

Dr. Laura Calkins of Texas Tech's Vietnam Center brought an interesting and provocative presentation to the Foundation, stressing the value of careful study of a much-scorned source of information, the "press" of a contender. Usually derided as propaganda, her conclusion was that, in the case of the Viet Minh in Indochina of the late 1940s and '50s, those press releases telegraphed trends, intended future actions, and other useful information, if analysts and readers had been alerted to that possibility. We hope to see her views amplified and given full weight in the Intelligence and academic communities.

The retirement of Museum Librarian Rowena Clough deprives us of a mainstay in the research opportunities offered by the NCM. She was wise and experienced; she could anticipate need in a rare way, and the materials in her care received expert professional administration. We wish her well and thank her for her important role in shaping both internal and external appreciation for the treasures available here. And we trust that the Agency will move promptly and wisely to fill her chair.

Again, we express our appreciation to Eagle Alliance and the benefits we received from

participants in the Annual Golf Tournament. They are recognized in this issue, and we hope to see them returning in 2007. The school cryptomath-computer program, "akaSMART," which the Foundation has sponsored, is described for the benefit of those who "missed the first act." It also gives an opportunity to share my personal delight in visiting local schools in which the program has been instituted, and to see first-hand the enjoyment and benefit gained by the children.

A few of our former colleagues are "Noted in Passing" and in the Foundation's Memorial Book and are especially appropriate to an issue concerning Memorial Day. Even the book review contributes to that theme, for it features the work and workplace of engineers and technicians laboring in secrecy for the U.S. Navy and the National Cash Register Company in Dayton, Ohio, during World War II.

And finally, we note the approach of our 10th birthday!

John E. Morrison,

President

GEN. MORRISON INJURED IN FALL

On April 17, just after Easter, Gen. Morrison, Foundation president and board chairman, while alone at his home, sustained a fall, resulting in a broken hip. He lay, awaiting assistance, for three days. He has received a replacement hip and is undergoing therapy, but his spirits are high, he is demonstrating his fine tenor voice to the surprise, bemusement, and entertainment of fellow patients, staff, and visitors, and is impatient to get back to work.

MEMORIAL DAY AT NSA

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Amanda.htm) includes the following statement, with its oft-quoted World War I British poem "For the Fallen," by Laurence Binyon, frequently linked with "Taps" (or the "Last Post") in mourning and saluting the death of a young warrior, and the tribute can apply equally to the two:

Cryptologists not only work from within the garrison, but in time of war they must also perform on the front lines. They often work in the background, and Amanda's tragic story reminds us to respect all those who risk their lives, doing things we don't see, hear or know of. Most of them do their job in total anonymity, without the glory and fame given to other soldiers. Often their work is considered secret and vital to their nation's security, thus not allowing them to disclose their important achievements. Cryptologists not only excel in war time. They have also played an important role in keeping peace by gathering information and protecting secrets to keep military powers balanced, as we saw in the Cold War. Amanda is the first female soldier to be honored by the National Security Agency. On 30 May 2006, Lieutenant General Keith B. Alexander, director of the National Security Agency, paid special tribute to Amanda during the Agency's annual Memorial Day Observance and unveiled Amanda Pinson's name, inscribed on the NSA Memorial Wall. I decided to tell her story on this site to remind people that there are more forgotten heroes than those from Bletchley Park or other cryptologists of the past.

"They shall grow not old, as we that are left grow old.

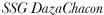
Age shall not weary them, nor the years condemn.

At the going down of the sun and in the morning

We will remember them."

Lest we forget.







SGT Pinson

FAURER TASK GROUP REPORT

At the March 2006 meeting of the Foundation Board of Directors, Director "Linc" Faurer (Lt Gen USAF, Ret, and former Director, NSA/Chief, CSS) reported on activities and plans for his Task Group on the New Museum, established by the NCMF in December 2004 to "run the ball" on this number one goal of the NCMF. He had enlisted the cooperation of Foundation members and "outsiders," including continued advisory support of the Ketcham Group's architects. Former DIRNSA/ CHCSS "Ken" Minihan, Lt Gen, USAF (Ret), heads up the capital campaign vital to the success of the project. He had immediately begun collecting seed money, prior to "going public" with the fund-raising. (Director Ann Caracristi, VP Emeritus **Bob Rich**, and Recognition chairman **Milt Zaslow** quickly moved to sign up all members of the Board toward that end.)

With a written expression of support for the project from the current DIRNSA/CHCSS, Gen. Alexander, Gen. Faurer will be proceeding with his plans: Former NSA executive **Mike Jacobs** is overseeing the completion of facility building plans, and a Program Manager is being sought to oversee the overall New Museum project.

At his request, the Board authorized Gen. Faurer to draw upon the Building Fund, and to manage all disbursements on behalf of the Foundation, subject to a professional accountant. A resolution authorizing the Task Group to act as the Foundation's agent for managerial responsibility and to ensure compliance with the Memorandum of Understanding with NSA was deferred to permit further study and will be reported later.



BROADCAST MONITORING — AN INDOCHINA CASE STUDY

In the aftermath of WW II, the victorious Allied Powers divided the former French-dominated areas of Tonkin, Annam, and the colony of Cochin-China (comprising, along with the kingdoms of Laos and Cambodia, "French Indochina") at the Sixteenth Parallel. British forces were to enter from the south and Chiang's Chinese Nationalist forces from the north to disarm the surrendered Japanese and restore order. Ho Chi Minh's Viet Nam Independence League (known from its Vietnamese acronym as the Viet Minh) resisted a return to French colonialism and asserted that the former areas of Tonkin, Annam, and Cochin-China comprised the free and independent nation of Viet Nam. These historic events set the stage for the Foundation's 28 April 2006 program.



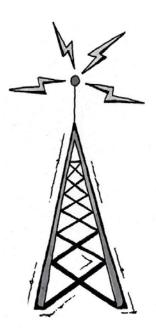
Dr. Laura M. Calkins, a Texas Tech Vietnam Center specialist on modern Chinese foreign policy, with a particular emphasis on Southeast Asia, was the guest speaker at an NCMF presentation at the Museum on 28 April 2006. Her topic, "Radio Commu-

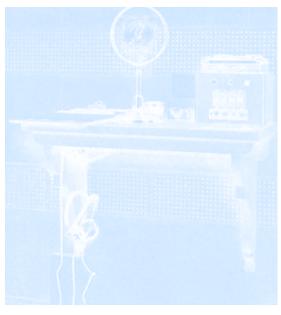
nications Monitoring as a Counter-Insurgency Tool: A Case Study of the First Indochina War," focused on the rise of the Viet Minh in Indochina during the immediate post-World War II era. This Communist-led insurgency used radio broadcasts to organize, direct and monitor its members scattered throughout the area and to build an organization that fought the French Union Forces for nine years. While the French, British and Americans monitored these broadcasts, many of which were in the clear, they did not recognize some of the critical information on Viet Minh activities that these broadcasts contained.

Dr. Calkins' thorough research and mastery of

this subject kept a standing- room-only audience riveted for over an hour. Questions and observations showed the extent of audience interest in her thesis and continued into the hall after the program ended.

NCMF Program Committee Chairman, Brigadier General Billy Bingham, (USAF Ret.), arranged the program with an assist from associate chairs Mr. William Ferguson and Ms. Kirsten Eland. NCMF Secretary. Mr. David Gaddy and Dr. David Hamer were consultants for the presentation. DVDs of the program are available through the Foundation. Contact the Foundation for details.





(Notional Photo)

THE akaSMART PROGRAM

For the benefit of new readers and to bring members up to date on the often cited "a[ll]k[ids]a[re]SMART" program, here is a retracing of the origin and progress of this increasingly popular computer-math program for use in schools. Consistent with our aim of supporting NSA and the National Cryptologic Museum's educational objectives, the NCMF endorsed and provided seed money for a bold and exciting new initiative to promote mathematics learning through use of computer games and puzzles. As conceived by **Bernard Farkas** and his associates in Cipher Limited Partners (CLP) of Vienna, Virginia, the goal of the program is to stimulate students' interest and hone their skills in mathematics and in time other disciplines, such as foreign languages. Mr. Farkas and his associates, Morrie Cove and Carol Schultz, presented the concept and fielded questions at the NCMF Board of Directors meeting in December 2002.

The basic idea is to provide a series of games based on mathematics and logic that the students would play much as they do on their home Nintendo or other similar game system. The games are offered through a computer-based platform so that new games may easily be added, and so that student game-playing process, progress and skills might be monitored and feedback provided to participants in a series of tutorials. At the start games were downloaded from shareware already available on the world-wide web, but ultimately new games will be developed by experts hired for the purpose.

The initiative to promote mathematics and other cryptologic-related learning was launched in March 2003 with an eight-week pilot program at selected elementary, middle and high schools in Anne Arundel County, Maryland. The trial was designed to test the concept and provide feedback from students, teachers and parents before the NCMF and CLP proceed to the next phase of the program. The trial was a great success, with the students, teachers and parents being extremely enthusiastic about the program.

The program has been the subject of two separate articles in local newspapers. In a feature article in the *Baltimore Sun* of June 14, 2003, under the headline "In game it's spy vs. spy", subtitled, "Cryptology: Pupils in three Anne Arundel County schools are discovering that math

and code-breaking can be fun" The writer, Ariel Sabar, provided a description of the akaSMART program and quoted one fifth grade student at Linthicum Elementary School as saying he stayed up three nights in a row to crack the encrypted message the program's developers handed out for extra credit. It is evident from the article that the participants enjoyed the experience.

In an earlier article that appeared on the front page of the Annapolis, MD *Capital Gazette*, staff writer Kimberly Marselas, under the headline, "Breaking the Codes. Kids have fun with games that help teach math skills", described students' reactions to the games. She quotes a fourth grader as expressing a willingness to give up outdoor play sessions each week "because the games are challenging, sometimes fun and sometimes frustrating". A coordinator who oversees the program for the school system is quoted as saying, "The high school kids were reluctant at first but once we got them into the computer lab, into the program, then they got hooked on the games".

The akaSMART program has reintroduced the old idea that learning can and should be fun. It is clear that games, puzzles and competition clearly stimulate students' interest and enthusiasm. A not insignificant aspect of the program is the promotion of computer-assisted learning at all levels of public school education.

The pilot program introduced in the Spring of 2003 in Anne Arundel County, Maryland, and Fairfax County, Virginia, schools was highly successful and the word spread. The following year, several more schools requested that akaSMART be added to their math curriculum by fall 2004. Further expansion was then set for 2005.

As reported on these pages, Foundation underwriting of the program has been enhanced by generous donations from the Raytheon Corporation and the National Army Security Agency Association, as well as other groups and individuals.

With favorable local publicity and feed-back, in June 2005, Gen. Morrison accompanied Mr. Morrie Cove, program manager and principal developer of akaSMART, to

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2006 GOLF TOURNAMENT

by Mary Faletto, Senior NCMF Administrator

The 5th Annual Eagle Alliance Golf Tournament Benefit for the National Cryptologic Museum Foundation was held on 23 June at The Courses, Fort George G. Meade, MD. Over 144 participants, representing more than 27 local area corporations competed under sunny skies for the Championship and a chance to win the hole-inone prize of a new Chevrolet convertible. All participants received hats, shirts and first aid kits embossed with the NCMF, Eagle Alliance, and Cybercore Technologies logos. Mr. **Tim Slusser**, Vice President of Eagle Alliance, assisted by Ms. Sandi Buss, Eagle Alliance Business Manager and Event Coordinator, oversaw the presentation of the golf awards and the donation of over \$43,000 in proceeds to the National Cryptologic Museum Foundation. Foundation Vice President **Gene Becker** accepted the check on behalf of General Morrison, who was unable to attend due to a recent injury.

The NCMF Crypto-Cup golf trophy was presented to the first place winning team, sponsored by Lexmark Corporation. The Lexmark team comprised the team leader, Mr. **Pat Furey**, and Messrs. **Robert Ravida**, **Michael Myers**, and **John O'Shaunessy**.

A highlight of the tournament was a new electronic scoring system presented by EgolfScores. Included in this popular Internet-based scoring system, each player records his score using a Blackberry furnished by EgolfScores. The scores and pictures of team players are simultaneously broadcast on a Remote Leaderboard and over the Internet. Corporate personnel can monitor via www.egolfscore. com and keep track of their team's progress from their headquarters.



Tim Slusser and Gene Becker with winning team (l to r) Tim Slusser, Gene Becker, Mike Myers, Pat Furey, John O'Shaunessy, & Robert Revida



Eagle Alliance Donation
Symbolic Check
presented by VP Tim Slusser to VP Gene Becker, NCMF



The Tourney Staff (l to r) Bonnie Hohenberger, Mary Faletto, Gene Becker, Sandi Buss, and Tim Slusser

RETIREMENT OF MUSEUM LIBRARIAN

Here, pictured among her beloved books, is a likeness of Mrs. Rowena Lausch Clough. (This is also the picture long sought by the Editor, who was struggling to find some way of capturing the present NCM Library for those who have yet to visit it—even a fish-eye lens seemed unable to capture the scene, but this picture does the trick, at least as seen from the entrance doorway.) Rowena retired at the end of March, but returned for a ceremony at the Museum in May as pictured here. Representing the Foundation, Vice President Gene Becker commended and thanked her for her service, in the presence of staff and friends.



Rowena & NCMF Vice-Chairman for Aquisitions, Dr. Hamer



Best Wishes Rowena





VP NCMF, Gene Becker & Rowena



~ NOTED IN PASSING ~

Robert S. Benjamin

Robert S. Benjamin, 84, retired NSA communications analyst and resident of Shepherdstown, WV, died at Jefferson Memorial Hospital in Charles Town, WV on 14 May 2006. Known to his colleagues as "Bob" or "Ben," Mr. Benjamin had a distinguished career as a communications analyst in the National Security Agency and predecessor organizations. He served in the U.S. Army Signal Corps from 1942 through World War II, and continued work with NSA until retirement in 1977. Mr. Benjamin was an expert in radio traffic analysis and wrote a classified technical book used within NSA for decades as textbook and reference. He worked at NSA headquarters in Ft. Meade, MD for his entire career except for a two-year stint in Ottawa, Canada. Mr.Benjamin was instrumental in forming several internal NSA technical professional organizations.

Mr. Benjamin was a native of Albion, Michigan, and was graduated from Croswell (MI) High School in spring 1938. He earned a B.A. degree from Albion College with majors in mathematics and art, teacher's certification, and Phi Beta Kappa honors; he also worked for the college newspaper and published over 50 political cartoons about campus and international issues.

His wide interests included art and calligraphy, and square dancing and calling. He was the map illustrator for the seminal 1996 book on Civil War military intelligence by his friend and former colleague, Edwin Fishel, *The Secret War for the Union*, hailed in the first issue of *The Link*. Mr. Benjamin was a devout Christian and Bible student; in retirement he was a member of Mt. Zion Assembly of God in Charles Town, WV, where he taught Sunday school.

Charles D. Cram

Charles Daniel Cram, 80, of Cheverly, Maryland, a long-time former official with NSA, died May 28 of pancreatic cancer at the Hospice of the Chesapeake in Linthicum, Md.

Mr. Cram was born in Boston and enlisted in the Army in 1944. He served in the 101st Airborne Division during World War II and fought in the Battle of the Bulge and in campaigns through Germany and central Europe.

After two years at Norwich University in Northfield, Vt., he enrolled at the Georgetown University School of Foreign Service, from which he graduated in 1949. While attending Georgetown, he worked at the State Department and at the U.S. Public Health Service.

Following his graduation, Mr. Cram took a position with a federal agency that later became part of the National Security Agency. He worked for NSA in a series of senior positions until his retirement in 1981. While employed there, he studied at the Naval War College in Newport, R.I.

Mr. Cram had many personal interests and was a lifelong skier, runner and outdoorsman. He learned to ski and ski jump in his youth and was a member of the Washington Ski Club and the Sun, Snow and Surf Ski Club at Fort Meade. He made his final ski trip to Colorado in January 2006. He was also a fitness enthusiast who ran daily until late 2005.

Musically inclined, he also played banjo, trumpet and piano and had a special interest in classical music, ragtime and jazz. He was a member of the D.C. Hot Jazz Society in the 1950s.

Mr. Cram was an instrument-rated pilot and for many years owned a Rockwell Commander airplane, which he flew from BWI Airport and Tipton Field at Fort Meade. He was also a short-wave radio operator.

He maintained a longtime interest in mathematics and took courses at George Washington University and the University of Maryland. After his retirement, he taught computer science at Prince George's Community College.

Last fall, Mr. Cram enrolled in a German language course at Anne Arundel Community College in preparation for an upcoming bicycle trip to Austria that he was unable to complete.

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~ NOTED IN PASSING ~

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David Gordon Boak

Phoenix Society Life Member "Dave" Boak, 82, died of abdominal cancer on Sunday, 9 April 2006. He had retired from NSA in 1985 with 42 years of service, highlighted by service as Chief of the NSA Pacific Command office in Hawaii and Commandant of the National Cryptologic School. But to his colleagues he will always be remembered as "Mr. COMSEC," the authority on communications security, a subject to which he had devoted much of his career with NSA. He was also an advocate of professional literature for cryptology, and contributed toward that corpus.

Born in New Rochelle, NY and raised in Summit, NJ, he graduated from the University of North Carolina (Chapel Hill) with a degree in English literature. A later Master's degree in international affairs was awarded by The George Washington University. In government service, he attended the Air War College and the Federal Executive Institute.

During WW II, Mr. Boak served in the Army before transferring to the Office of Strategic Services (OSS), a fore-runner of CIA. He was sent to North Africa, supported the French resistance behind German lines, and helped to train Chinese troops in the China-Burma-India theater,

During the late 1950s, he wrote a weekly freshwater fishing column for the *Washington Post*. He was also an avid and accomplished tennis player, serving briefly as a professional tennis instructor.

Thomas Walter Moran

"Tom" Moran, 76, a resident of Annapolis for 15 years and formerly of New Carrollton, died of emphysema 16 June 2006 at Anne Arundel Medical Center after a four-year illness.

Born 21 November 1929, in Englewood, N.J., Mr. Moran graduated from Union High School in New Jersey

in 1947 and Russian Language School in Oberammergau, Germany in 1950. He attended Georgetown University in Washington, D.C. from 1953 to 1955.

Mr. Moran served in the Air Force during from 1948 to 1952 as a staff sergeant. He was awarded both an Occupation and Good Conduct medal, and attended Europe Communications Signal School.

He worked for the National Security Agency from 1952 to 1985 as a senior operations officer, and as a tax accountant for 20 years, volunteering his time to assist the elderly with their tax preparations.

His interests included skiing and crossword puzzles. He was a member of St. Ambrose Catholic Church in Cheverly, where he was a church officer, and St. Mary's Catholic Church in Annapolis.

CORRECTION: Under "Noted in Passing" in *The Link*, Winter 2005-2006 (pg. 7) please correct the name of Bob Drake's first wife to Susan ("Sue"). My apology to the family. - Ed.

MEMORIAL REGISTRY

The following names have been added to the NCMF Memorial Registry in the Museum:

#70 - Honoree: **David G. Boak** Sponsor: Robert Cefail

#71 – Honoree: **Ryon A. Page**Sponsors: Susan D. and Benjamin N. Hoover

#72 — Honoree: **Mary Clementine Aquilea** Sponsor: Sara L. Botsai

#73 – Honoree: **William R. Boenning**Sponsor: The Wednesday Breakfast Bunch



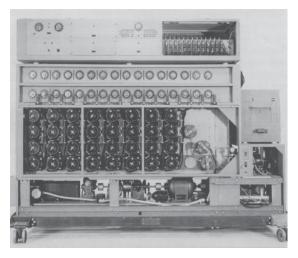
FOR THE BOOKSHELF



Jim DeBrosse and Colin Burke, *The Secret in Building* 26: The Untold Story of America's Ultra War Against the U-Boat Enigma Codes. New York: Random House, 2004. ISBN 0-375-50807-4, 274 pp., incl. index, notes, bibliography and photographs.

This book owes its existence in no small part to the persistence of Debbie Desch Anderson, who was determined to learn what her father did during WW II that constrained their lives during that period and drove him to the brink of breakdown, unable to share the secrecy and accomplishments of his work. Mrs. Anderson's tenacious research slowly peeled away the layers of secrecy and introduced her to others knowledgeable of the highly secretive effort involving the wartime U.S. Navy and the National Cash Register Company (NCR), based in Dayton, Ohio. The product of that effort was the U.S. Navy version of the "bombe" (derived from Polish, French, and British cryptanalytic efforts against the high-level German "Enigma" cipher machine), a surviving example of which is on display at the National Cryptologic Museum, following its exhibit at the Smithsonian in Washington, DC. Aided by government declassification of the project and some of its details, the fascinating story has emerged. And a key to the success of the project was, ironically, an NCR engineer of German stock, Joe Desch, Mrs. Anderson's father, whose brilliance as a designer and engineer is now recognized publicly.

Although the "bombe" (so-called because of the clicking sound it made in running) did not actually decipher the Enigma cryptograms, it greatly speeded up the process by narrowing down the possible keys used in the encipherment of a specific message. (A rough analogy would be trying to guess a user's password to gain entry into a protected computer or web site today.) Both Navy and Army cryptanalysts had been drawn to the potential value of business tabulating or computing machines in the decade before our entry into WW II. NCR's experience drew Navy interest, as did the work of the head of NCR's electric re-



search division in Dayton, Mr. Desch. Desch had done "pioneering work in the development of fast-pulsing miniature gas tubes—the silicon chips of their day," according to a book caption, and the bombe's letters-crunching operation was to require thousands of vacuum tubes and enormous amounts of electricity. In an unusual, patriotic gesture, NCR entered into a no-profit contract with the Navy that virtually turned over their company to the service. In short order, Navy established the "U.S. Naval Computing Machine Laboratory" and clamped on iron security restrictions, including armed Marine guards. One obvious complication, however, was that, "for the duration of the war," Joe Desch, chief engineer for the top secret project, "would have to sever relations with most of his German relatives. The Navy was taking no chances with a man who could speak fluent German, who was an avid ham-radio operator and communications expert, and whose mother had been born and reared in Germany" (p. 84). They imposed on the Desches Cdr. Ralph Meader, who would occupy the guest bedroom across the hall in their small Tudor cottage and "keep an eye" on the engineer. Desch was operating blind, initially, for he was not cleared for the code-breaking details. When he was finally "read in" to the world of ULTRA and MAGIC things started to pick up.

A small village of female naval personnel, the WAVES (Women Accepted for Voluntary Emergency Ser-Continued on page 11

FOR THE BOOKSHELF

Continued from page 10

vice) arrived in Dayton, beginning in May 1943 as the vanguard of the 600 who assembled bombes in NCR's Building 26. Compartmentation and the "need-to-know" principle rigidly enforced, under oath and threat, limited their comprehension of the nature and value of their duties.

And there's the story of the discovery of a security risk—a potential traitor--and how the Navy dealt with him.

Newspaper reporter Jim DeBrosse (Dayton Daily News) and research historian, Dr. Colin Burke (who researched the Navy-NCR relationship while a scholarin-residence with NSA's Center for Cryptologic History and the NCM) made the ideal team to collaborate on the book. Told in an exciting, but exacting, manner, well documented, indexed, and illustrated, their book is an "easy read," producing names that should be even more familiar than they are—Vannevar Bush of MIT, Edward Deeds and Charles Kettering at NCR, and the "civilians in uniforms" who were to become early participants in building the postwar enterprise that led to the National Security Agency—names such as Howard Engstrom and Louis Tordella—as well as RADM Joe Wenger and Desch himself (who died in 1987). In a secret ceremony at the Navy Department in 1947, Joe Desch had received the National Medal of Merit for his wartime efforts and the price he and his family paid. Framed and hung, without explanation, in his study at home, it was gathered up with "his things" after his death and retired to the basement, to provoke the questioning by his daughter in after years.

The Secret in Building 26 fills in a gap in our knowledge of the wartime cryptologic effort of WW II and the people involved; it helps to appreciate their contribution to today's cryptologic endeavors and to the everyday technological applications of their work. Highly recommended reading for the professional's bookshelf.

THE akaSMART PROGRAM

Continued from page 5

present 354 certificates of achievement to participating students at Jones Elementary and Rippling Woods elementary schools in Maryland. Presented on behalf of the NCMF, these recognized and commended the recipients for their involvement and success in the program. (Certificates were also mailed to the principals of other participating schools for presentation to their students enrolled in the program.)

By the end of the 2005 school year, a number of additional schools in Anne Arundel County were using akaSMART as part of their curriculum. Several schools have now implemented it in multiple grade levels, bringing the total number of participating students to more than 600. Nearly 1,000 students have now participated in the pilot and curriculum programs.

A "Revised Joint Venture Agreement" between the NCMF and CPL was drafted in June 2006 to replace the original contract of 21 January 2003. The revised agreement was reviewed for subsequent approval by both parties.

For further information about akaSMART, including referral for participation, or how you can assist the Foundation in its support of the program, contact us as indicated on the back page. (Editor's note: We are adopting the form "akaSMART," as preferred by the program manager, to replace the variant forms of the past.)



Morie Cove and Linda Taylor, a Raytheon Sr. Manager, visist an akaSMART group at Jones Elementary School, Severna Park, MD