

# Training Insights

by Larry Mize



Larry Mize graduated from Xavier University with a Bachelors of Science in Mathematics in 1973. He entered active service in the United States Navy serving a career specializing in Naval Intelligence, Aircraft Carrier Operations, Naval Special Warfare (SEALs), and Space Operations. Mize attended French language training at the Defense Language Institute and subsequently served as U.S. Navy Liaison Officer to the Commander French Forces Indian Ocean/French Foreign Legion/Commandos Marine in Djibouti. He attended the Naval Postgraduate School and was awarded a MS in Space Systems in 1986, subsequently serving at U.S. Space Command and U.S. Strategic Command. Mize is currently Chief of Space and Global Missile Defense Education and Training.

FWC DCD Training Branch, larry.mize@smdc-cs.army.mil  
719-554-4545 DSN 692-4545

-NSSI: [https://halfway.peterson.af.mil/nssi/\(2bpgiuljfl0ytk3v5w5y2l\)/index.aspx](https://halfway.peterson.af.mil/nssi/(2bpgiuljfl0ytk3v5w5y2l)/index.aspx)

## Trainer Experiences Firsthand OIF Space Operations

Dave Berge, FWC DCD Space Operations Officer Qualification Course Director, conducted a 12-day TDY to the Central Command Area of Responsibility in order to gather insights from the field for the purpose of improving Army FA40 Space operations training venues. Dave visited the Combined Forces Air Component Command Al Udeid (Qatar), Multinational Coalition - Iraq 1st Cavalry, and 3rd Infantry Division in Baghdad, and the 3rd Army staff in Kuwait. The Army Space professionals at these locations face many challenges in supporting a Multinational Coalition force operating in a complex counter insurgency environment. They often find themselves executing duties not directly related to space. For instance, the FA40s primary emphasis is often in supporting Special Technical Operations because their unique space skill set matches well with STO, and they have the high level clearance which is required for working STO requirements. Additionally, general space knowledge within Corps and Division staffs is improving such that FA40s are finding a unique niche with respect to tackling the tough technical space issues. What this means for DCD is that our FA40s need a comprehensive training program both in the entry level Space Operations Qualification Course, and then for continuing education as they progress through their careers. FA40s need this training as well as the necessary (and unique) space tools in order to be truly relevant from the tactical through national space level. Special notes of thanks go to LTC Gordon Quick (3USA) and LTC Robert Nieves (Deputy DS4) for their direct support during pre-trip coordination and on site hosting.

## Tactical Space Operations Course Being Formalized

Future Warfare Center Directorate of Combat Development Training is in the process of formalizing the Tactical Space Operations Course (TSOC), five of which have been conducted ad hoc since 2005. The objective is to formalize these heretofore ad hoc TSOCs course, develop and execute them to TRADOC standard, enter it into ATTRS in order to provide a formal training venue for Army tactical and operational space forces that will prepare soldiers to deliver effective full spectrum space support in that tactical/operation environment. TSOC will present emerging tactics, techniques, and procedures focused training for space support. Course material will cover, but is not limited to, blue force tracking; overhead non-imaging infrared; intelligence, surveillance and reconnaissance; position, navigation, and timing; satellite communications; space control; and environmental effects. First iteration of the formal course is planned for September 2007.

## Training Conducts Ballistic Missile Defense System Training Analyses for Army Units

The training developers of the Future Warfare Center Directorate of Combat Development (DCD) Ballistic Missile Defense System Training Team have recently been conducting foundational analyses for the 94th Army Air and Missile Defense Command, 100th Missile Defense Brigade (Ground-based Midcourse Defense) and the 49th Missile Defense Battalion. In February, DCD trainers chaired a Critical Task Selection Board with members of the 94th Army Air and Missile Defense Command to identify the unit's critical tasks for executing their mission in managing the first AN/TPY-2 (FWD) radar deployed to Japan. The Board identified 23 critical tasks which have been approved by U.S. Army Space and Missile Defense Command/U.S. Army Forces Strategic Command Deputy Commanding General, BG Roger F. Mathews. Subsequent to the Critical Task Selection Board, DCD training developers have been expanding the critical task list with further work to derive the conditions, standards, performance steps and performance measures. In February, DCD also chaired a Critical Task Selection Board for the Missile Defense Master Gunner program. Personnel from the 100th Missile Defense Brigade (GMD) and the 49th Missile Defense Battalion participated. 36 critical tasks were identified during the day and a half Board. The critical tasks were approved by COL Cunningham, SMDC/ARSTRAT G3, in April. DCD continues to facilitate G3 Training and Exercise development of the Master Gunner Course. Most recently, DCD conducted an immersion course on the Training and Doctrine Command standards for lesson plan development for four G3 Training and Exercise Master Gunner Course developers.

## JTAGS Initial Qualification Training Critical Task Selection Board Conducted

Michael Hersh, Future Warfare Center Directorate of Combat Development Trainer, facilitated a Critical Task Selection Board conducted by the 1st Space Battalion on March 23 for JTAGS Skill Levels 1-4 (Operator and Supervisor skills). The board recommended 73 Skill Level 1-4 tasks divided among seven subjects. The task list was approved by COL Timothy Coffin, 1st Space Brigade commander, on April 20. Tasks in Skill Level 1 will be used to train JTAGS operators attending the JTAGS Initial Qualification Course and include the subject areas: JTAGS march order, JTAGS emplacement, JTAGS initialization, JTAGS mission operations, and JTAGS maintenance and troubleshooting. Subject area for Skill Level 3 is crew chief duties and the Skill Level 4 subject area is JTAGS operations sergeant duties.

## 2007 FA40/SOOQC Critical Task Selection Board a Big Success

The sixth FA40 CTSB was conducted on 17-18 April in Colorado Springs. Extensive behind the scenes planning went into making this CTSB particularly successful. For the first time three FA40 Colonels (Bruce Smith, Kurt Story, and Tom Quintero) attended the complete board sessions. Joining them were LTCs Bob Guerriero, Chris Livingstone, Tom James, Joe Carroll and Major Chauncy Nash. Prior to the CTSB all FA40s were accorded the opportunity to participate via survey review of the critical tasks and option to comment on new or revised tasks. The CTSB assessed the current FA40 tasks, developed modifications and/or new tasks based on operational experience and lessons from OIF/OEF, SSE fielding to Divisions and 3USA, and FA40 growth in commands such as JSpOC, JFCC Space, SMC, SPAWAR, and ASPO. FWC DCD has an aggressive program to assess and incorporate lessons learned from our operational rotations, but these require formal adjudication via the CTSB process. Mr. Dave Berge, SOOQC Director, provided a briefing to open the floor to discussion relative to the current FA40 training and potential new areas that may need to be trained. The board deleted one task, "EXPLAIN missions and functions of Joint and Service IO Organizations." The board felt that information from this task did not require the status of "critical task" and should be included as a performance step under another task. One new task was also developed, "INTEGRATE Space Force Enhancement." This new task was developed in response to the need to provide more technical depth for all FA40s to be able to effectively articulate to commanders and staffs in the field, specifically what they are able to provide in the way of space expertise and advice. More technical focus will be added to the SOOQC program of instruction, especially in the areas of Space Control, The Military Decision Making Process (MDMP), and STO with SOOQCs 07-01 and 07-02 June-November 2007. At the conclusion of the CTSB, COL Bruce Smith CTSB Chairman and Director of DCD stated "This was the most effective board we have held to date. The results of this board will go a long way in providing the needed training our FA40s require to fulfill their various assignments in the Army." The 2007 Critical Tasks are approved by the DCG, SMDC/ARSTRAT, BG Roger Mathews, for immediate implementation.

## Tours "R" Us, A Practical Alternative To Traditional Space Training

A picture is worth a thousand words, a video is worth tens of thousands of words, but actually being there ... priceless. Do you remember your school field trips as a kid? If so, you now realize how beneficial they were and the impact they made on you. Throughout the years, two acclaimed highlights of the Space Operations Officer Qualification Courses have been its tours, locally in Colorado and to California and Washington DC. While in California, FA 40 students visit both military and commercial contributors to military space operations, starting at Vandenberg Air Force Base.

Vandenberg is the key military space operations and support facility on the west coast, and is home to 14th Air Force Headquarters/U.S. Strategic Command's Joint Functional Component Command for Space and the Joint Space Operations Center, which is exercises Operational Control primary reachback source for global space forces. Vandenberg also hosts the an Intelligence Operations Squadron and a Ground-based Midcourse Defense (GMD) site as well as space launch and associated range operations. In a couple of past classes, students have actually witnessed space launches.

The students also tour Los Angeles Air Force Base's Space and Missile Center, the U.S. Air Force research, development and acquisition agency for military space systems. Space and Missile Center also conducts on-orbit check-out, testing, sustainment and maintenance of military satellite constellations. Students get a first hand look at new satellite systems being developed. After visiting the military installations, the students then visit both Northrop Grumman and Boeing contractor space facilities. They get an opportunity to walk through satellite assembly plants to understand the processes involved in getting a satellite ready for launch.

Washington D.C. provides a second tour-rich environment for FA40 students to continue their space training. While in the D.C. area, the students visit the 1st Information Operations Command observing various techniques used by the command to identify and deter the enemy using varying information operations tactics and techniques. Next, the students visit the National Reconnaissance Office to better understand national assets and how they are used, along with the introduction of new space software applications developed by the National Reconnaissance Office. The following day, students visit the National Security Agency understanding the different centers and how they contribute to the military effort during war, and peace time. The students also visit the Pentagon, the Joint Space Staff, the National Security Space office and the Army Space Program office.

In 2007 the course will add a new tour to National Air and Space Intelligence Center (NASIC) at Wright Patterson Air Force Base in Ohio. NASIC is the primary Department of Defense producer of foreign aerospace intelligence. NASIC develops its products by analyzing all available data on foreign aerospace forces and weapons systems to determine performance characteristics, capabilities, vulnerabilities, and intentions. As the DoD experts on foreign aerospace system capabilities, the center historically has also been involved in supporting American weapons treaty negotiations and verification.

These tours are important to the FA 40s as they expose FA40s to critical reach back venues to support space related situations in the field, who provides what products to whom, and aspects of the nation's space industrial base. Organizing these tours is not like planning a family vacation, unless, of course you have a family of 29 and you go to multiple locations. A lot of logistics is involved to pull off these tours. The logistics includes but is not limited to, scheduling flights for a large group to travel together, at the best fares; scheduling a variety of ground transportation options; arranging hotels, tour visits, and meals. A glitch in any of these areas requires the skill of adapting because in every class "Murphy" is alive and well. In the end, though, it's all worth it in meeting the challenging requirements to educate the Army Space Professionals.

Lenny Gehrke, FWC DCD Training Branch