EOBC Gets a New Look

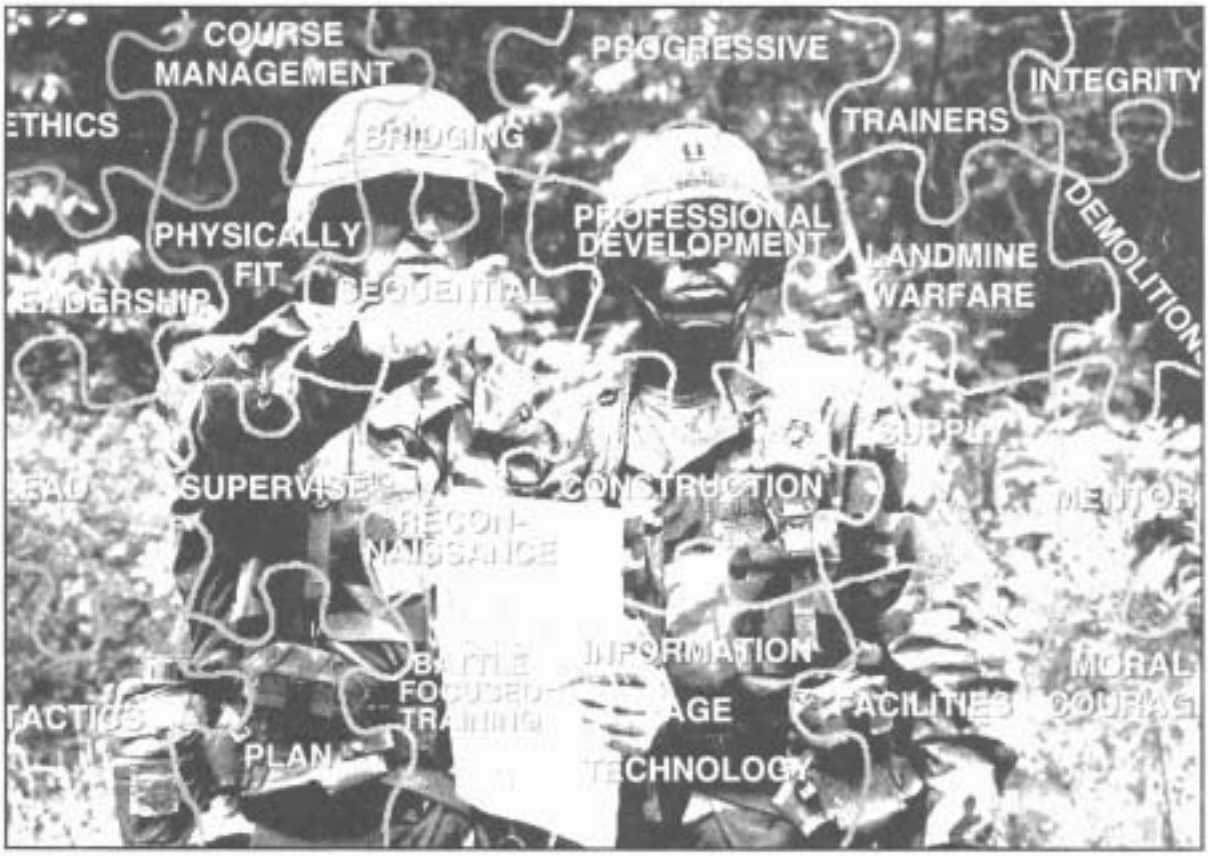
By Lieutenant Colonel Ted A. Thomas

Maneuver commander: "Hey, engineer lieutenant! I need your help in upgrading some roads and building some shelters."

Engineer lieutenant: "Sir, I'm a combat engineer, not a construction engineer. I'm not trained to do those tasks."

Beginning in May 1997, the Engineer Officer Basic Course (EOBC) will have some fairly significant changes. In line with the current *One Corps, One Regiment, One Fight* concept, the Engineer School will train all engineer lieutenants to be *engineers*, not "combat" or "construction" engineers, and they will all complete the same program of instruction (POI). With this new training, all graduating lieutenants soon will be able to respond positively to their maneuver commanders' requests for assistance.

The 554th Engineer Battalion and the Engineer School have eliminated the two-week split in training focus between lieutenants going to combat heavy assignments and those going to combat battalions. Until now, both the construction track and the combat track were two-week classes. Rather than require all students to complete both tracks, which would extend EOBC from its current 17 weeks to 19 weeks, redundant training was eliminated and some classes were shortened.



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Major Changes

Comments and after-action reviews from the field and the combat training centers resulted in many of the following changes to the EOBC:

- Increased leadership training from 6 to 24 hours
- Added a terrain visualization/obstacle integration training exercise without troops (TEWT) (8 hours)
- Added a task force engineer practical exercise (8 hours)
- Added offensive and defensive tactical reconnaissance classes (4 hours)
- Added force-protection construction training (2 hours)
- Added military operations in urban terrain training (3 hours)
- Integrated tactics and combat engineering training (5+ weeks)
- Converted the Project Hammer exercise from a 3-day construction project to a 2-day project-inspection exercise
- Reduced geotechnical training from 26 to 18 hours
- Consolidated exams, saving 8 hours
- Eliminated the medium girder bridge and ribbon raft construction project
- Changed the Army Physical Fitness Tests from weekdays to Saturdays

Training Sequence. In the revised EOBC, each platoon will have the same training sequence throughout the year. Currently, the course is taught in modules because there are normally two or three platoons in each class iteration but not enough instructors to teach all of the platoons the same subject concurrently. Since each platoon has a different sequence of instruction, the modules are independent packages and do not rely on previously taught material. To remedy this problem, there will be nine platoon-sized EOBC classes per year, each consisting of about 60 soldiers. This schedule allows the course to follow a logical sequence and build on prior knowledge, facilitating better learning.

The nine classes per year support the schedule projected for the Maneuver Support Center. The Military Police and Chemical Schools have seven classes per year in their basic courses. Seven of the EOBC classes will align with theirs, allowing the three schools to share training during inprocessing and soldierization, as well as the common core instruction. The EOBC field training exercise will move to the 12th and 13th weeks of the course to coincide with the other schools' field training exercises.

Terrain Visualization/Obstacle Integration TEWT. The Joint Readiness Training Center (JRTC) and the National Training Center (NTC) noted that obstacles usually are not employed or sited properly within the commander's intent. The new TEWT requires lieutenants to build an engagement area by envisioning it from the enemy side, noting its intervisibility lines, determining the types of obstacles to emplace and where to emplace them, and coordinating these activities with a maneuver commander. A maneuver officer from the Engineer School's Department of Tactics, Leadership, and Engineering will assume the role of maneuver commander.

Task Force Engineer Practical Exercise (PE). This exercise was added to the curriculum because of JRTC comments. In 1989, the EOBC shifted its primary focus to the engineer restructure initiative (ERI), leaving out the light community. The new PE teaches the planning and coordination skills needed across the full spectrum of engineer assignments. Under the ERI concept, company executive officers are heavily involved in the task force engineer mission. The task force engineer PE consists of orders process instruction—going through the deliberate decision-making process, developing and evaluating courses of action, and participating in wargaming and synchronizing the engineer effort in combined arms operations. This instruction will benefit all lieutenants, regardless of their assignment, but it will be especially valuable for those going to light divisions.

Combat Engineering and Tactics Training. Module sequencing will allow a seamless transition from combat engineer training to tactics training. Currently, these subjects are taught as independent, stand-alone blocks of instruction. In the revised EOBC, they will be introduced in a logical sequence. For example, when instructors teach the fundamentals of land mines (such as the M21 antitank mine), they will describe how mines are armed and used in a minefield; then they will explain why and how minefields are used in tactical operations.

Project Hammer. This exercise will focus on platoon leader responsibilities rather than performing carpentry, plumbing, and wiring projects. Lieutenants will learn about blueprints, bills of

material, material takeoff lists, and quality assurance and inspection procedures. When engineers from light units deploy to undeveloped countries such as Somalia and Haiti, they are often among the first soldiers on the ground. They need engineer construction skills to build base camps, provide waste disposal, upgrade or build main supply routes, and perform many other engineer-related tasks. To fill that need, all engineers will receive the training required to perform their missions during operations other than war.

Conclusion

The Engineer School's goal is to produce the best-trained lieutenant it can in 17 weeks. Although these young officers cannot become experts in all the subjects taught at the school, they will receive a broad range of training opportunities and experience. This will be a tremendous advantage when they arrive at a unit. Lieutenants leave the basic course excited about being an Army officer and eagerly look forward to leading a platoon and serving their country. It then becomes the unit's responsibility to sharpen their warfighting and leadership skills. These young officers are the future leaders of the Engineer Corps. Soldiers are our credentials, but our junior leaders are our legacy.

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obstacles that will allow him to disengage when he chooses. Wide dispersion will negate the already difficult concept of shifting engineer units across task forces to support multiple operations.

At the same time, maneuver units will be faced with an increasingly complex array of countermobility threats. Among these are the use of mines and other obstacles in great number, plus better use of the terrain's natural countermobility effects, to asymmetrically combat American superiority in speed and firepower. Land mines are a cheap, deadly, and almost-insurmountable threat to the mobility of U.S. forces. The problem will get worse as more countries acquire a dynamic obstacle-emplacing capability by using systems equivalent to our Volcano and artillery- and helicopter-delivered scatterable mines. The lesson of Desert Storm will be very clear to our enemies: The American Army cannot be allowed to freely maneuver its armored forces.

Even the nature of the threat will pose an increasingly difficult problem. The mountains of Bosnia and Iran, the ricefields of Korea, the jungles of Africa and South America, and urban sprawl everywhere are certainly more challenging to our mobility than the north German plain or the Iraqi southern desert.

Despite *Army Vision 2010*'s claim that the Army is the service of choice to ensure full-spectrum dominance, divisions become *less* capable of full-spectrum operations with the loss of an engineer battalion. Combat engineer battalions often are the unit of choice in operations other than war. They deploy as mechanized infantry when Bradleys are inappropriate, as firefighters, and as relief for all kinds of disasters. In all operations (garrison, combat, and operations other than war) TRADOC's Division XXI design will result in a huge increase in operational tempo and personnel tempo for the two engineer battalions.

While the basic organizational structure of an engineer brigade and three battalions remains sound, heavy division engineer battalions still need major internal changes to meet the rigorous requirements of both today's and tomorrow's battlefields. Clearly, we must resource key staff officers such as the S2, signal officer, and maintenance officer; restructure the maintenance section to provide company-oriented contact teams; and provide a desperately needed organic medical evacuation and treatment capability.

Focus on Success

The 299th Engineer Battalion in the 4th Infantry Division's experimental force has worked diligently to improve the battalion's capability by using recent lessons learned and future warfighting concepts. The differing approaches taken by TRADOC and the 4th Infantry Division are extraordinary: One whittled away at an old structure to arrive at a predetermined manpower cap, while the other focused on warfighting and improved capabilities.

Deletion of an engineer battalion from the division structure does indeed save personnel spaces, but it creates a poor warfighting design. It repeats mistakes of the past. It fails to capitalize on lessons learned, recent innovations, and battle-proven structures. It fails to address the challenges of the future. It is the wrong force design for the Army's division of the 21st century. The Army needs to reinforce, not destroy, the successes of today's heavy division engineer brigade.

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