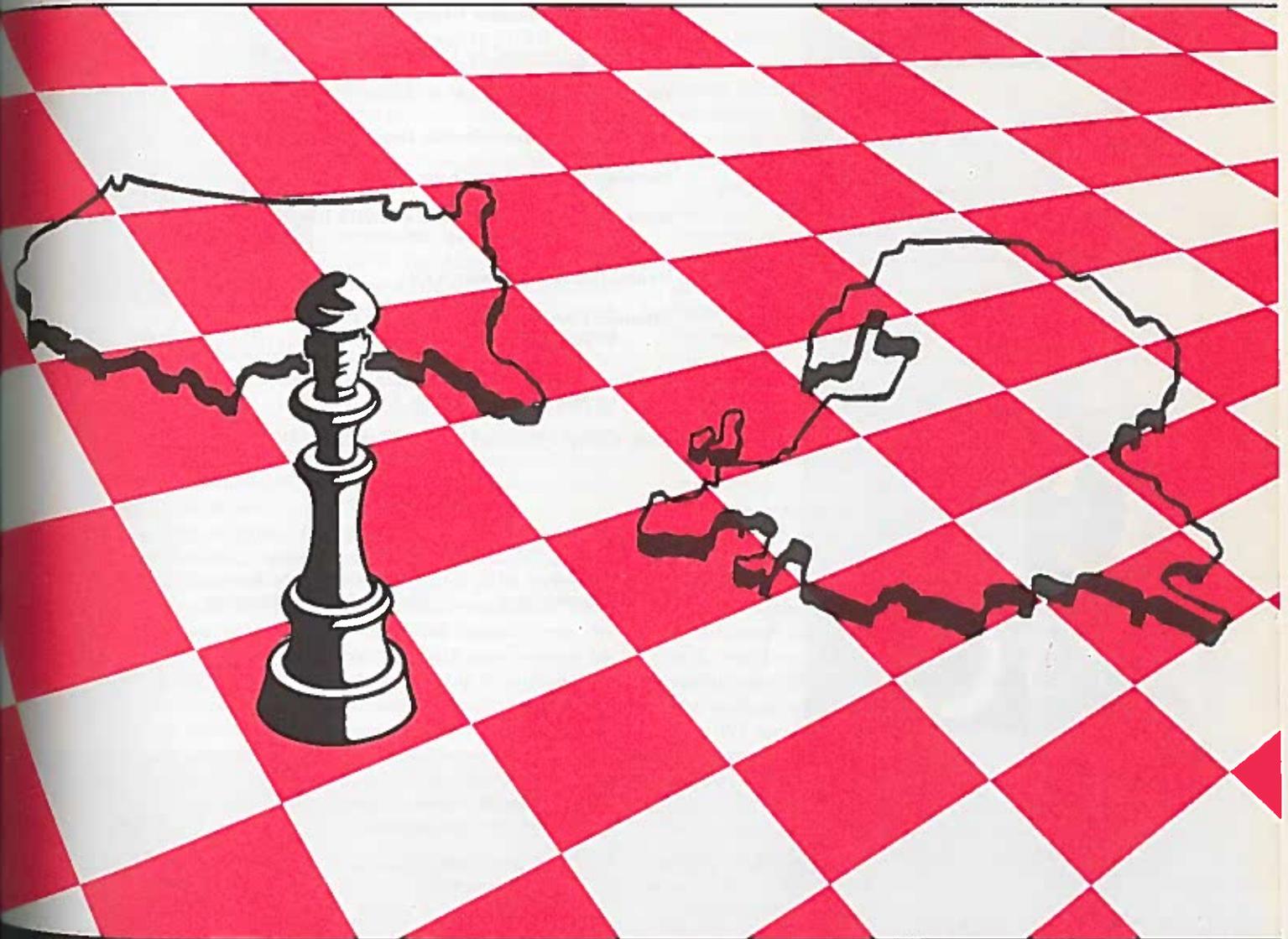


AIR FORCE



CIVIL ENGINEER



Prime BEEF (Base Engineer Emergency Force)

Ready to Move . . . Anywhere In the World

See Page 2

Project Prime BEEF

Base Engineer Emergency Force

More Top-Level Specialties Open to Airmen in Civil Engineering As The CE Force Is Repostured

by Lt Col William E. Meredith

"When the whistle blows are we ready to go?" was the question that spurred the formation of a joint Civil Engineering, Manpower, and Organization Study Group in December 1963. The answer was "NO." However, under Project "Prime BEEF," the answer will be "YES."

Project "Prime BEEF" (Base Engineer Emergency Forces) creates within Air Force Civil Engineering the ability to respond to emergencies, whether they result from acts of aggression or disasters.

The study group noted that the role of Civil Engineering, in relation to the overall Air Force mission, has changed considerably since World War II. CE now has a direct combat support role. Major weapon systems, such as ICBM's and the DEW line, are dependent on Civil Engineering support. The Civil Engineer is intimately involved in limited war operations. Aircraft are more sophisticated, their engines can be ripped apart by poor or improperly maintained runways; therefore, Civil Engineering units must be able to support the aircraft with the type of facilities they require when they are redeployed to meet emergencies.

Recognizing the inability of the Civil Engineering force to fulfill adequately its direct combat support role,



Lt Col Meredith, Special Asst to the Deputy Director for CE Operations, Hq USAF, he served as Chairman of the Hq USAF Study Group on Project Prime Beef. Previously he was Chief, Operations Branch, Base Maintenance Division, Hq USAF. He attended William & Mary College, Catholic, and Maryland Universities, and the Air Command and Staff College and the Air War College. He is a member of SAME and the American Institute of Plant Engineers.

the study group sought to determine what distribution, alignment, reliability and skills were required for that role. It determined that it was necessary to reposture the Civil Engineering force, both military and civilian, and to realign the skills of enlisted personnel. "Prime BEEF" is designed to fulfill the former objective.

In establishing the new posture for Civil Engineering it was necessary to define essential requirements in accordance with the criteria of AFR 26-10, which states that military personnel will be used in combat, and direct combat support jobs, and civilians in indirect combat support assignments.

The number of military personnel assigned to a CE unit under Prime BEEF is based on those necessary to meet the combat, combat support, training, career development, ZI/Overseas rotation base, and stable assignment requirements. No part of the military Civil Engineering force is overhead. Each airman occupies a valid position in an approved manning document designed to fulfill one, or more, of the above requirements. Civilian personnel would be assigned to non-direct combat support roles and may fill the remaining job assignments.

Prime BEEF consists of four operational teams, which are:

First, the Base Engineer Emergency Forces, Recovery Team, BEEF-R, is the minimum number of military Civil Engineering personnel necessary to maintain essential base operation and maintenance service before, during, and immediately following an attack, or in the event of a major fire, flood, storm, strike or similar emergency. The personnel needed to man the BEEF-R are part of the normal military workforce during non-emergency conditions. They will, however, be prepared to respond to any contingency. To maintain this proficiency the team will be exercised at least once each quarter, and more often if necessary.

Commander of the BEEF-R will be the Base CE. The team will be prepared to maintain essential functions for 36 hours on a two-shift basis. By the end of the 36-hour

period it is expected that civilian personnel, who cannot be ordered to remain on duty during an emergency, will be available and/or support from other mobile CE teams would arrive.

Second, the Base Engineer Emergency Forces, Contingency Team, BEEF-C, is designed for unforeseen contingencies and special air warfare operations and is therefore not attached to a specific flying unit. This is the type of unit that can be called upon to supplement a BEEF-R or F unit in the event they can't be augmented locally.

Third, the Base Engineer Emergency Forces, Flyaway

Team, BEEF-F, is attached to a specific flying unit (TAC or MATS) and will move with, and support, that unit whenever it is deployed. Therefore F and C units must be ready to go at a moment's notice—fly-away kits, consisting of tools, essential light equipment, and critical supplies will be maintained in constant readiness. Shot records, appropriate clothing, and passports will be an integral part of these kits. These teams will also be exercised at least once a quarter. Both F and C units can be deployed in whole or in part.

Fourth, the Base Engineer Emergency Forces, Missile Team, BEEF-M, provides maintenance on facilities beyond the capability of the missile maintenance organization and depot level maintenance for RPIE. If, and when, the missiles are fired, these teams become available for deployment.

When deployed, the mobile teams will be commanded by the second ranking, or a fully qualified Civil Engineering Officer, from their parent unit.

All BEEF-R, C, and F teams conform to a standard manning guide (Fig. 1). Because of the difference in size of installations the manning of BEEF-R teams varies depending on whether the installation is large, small or a site (Fig. 1).

F & C Teams Are Same Size

BEEF-F and C teams do not vary in size, regardless of the size of the installation to which they are attached. This provides not only the capability of interchanging units when necessary, but also of forming teams of specialists for any unusual requirement by taking personnel of specific skill from several mobile teams.

In the latter circumstance, the remainder of the team continues to perform its normal functions as part of the base workforce.

Every installation will have a BEEF-R team, but a BEEF-F, or C team will be formed only at designated installations.

Prime BEEF operating under the emergency conditions outlined above depends upon the reliability and skill of the personnel assigned to the BEEF teams.

Revised Military CE Structure

To insure the necessary skills a completely revised military CE career structure was published this September in AFM 39-1.

The new career structure provides, from an occupational standpoint, homogenous groupings of knowledge and skill areas, and a more realistic career development program for enlisted personnel. Specialty descriptions have been updated to reflect the complexity of today's sophisticated facilities, tools, equipment and materials. Among the objectives of these changes was the improved utilization of military personnel by expanding the scope of duties and responsibilities.

Under the new career structure military personnel will be trained and utilized only in areas where the skills developed can be applied to the combat and direct combat support roles of the Civil Engineering force.

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Fig. 1

Manning of "Prime BEEF" Teams

TITLE	AFSC	BEEF-R			BEEF (F & C)
		Large	Small	Site	
Base Civil Engineer	5526	2	1		
Construction Engineer	5534	1	1		2
Maintenance Engineer	5544	1	2	1	
Industrial Engineer	5574	1	1		
Sqd Commander	7024	1	1		
First Sergeant	01090	1	1		
Admin Supervisor	70270	1	1		
Admin Specialist	70250	2	1	1	
Work Control	556XX	4	3	2	1
Supply	646XX	2	1		
Cost and Real Property Account	554XX	3	2	1	1
Site Development	553XX	3	3	2	2
Electricians	542XX	6	3	1	2
Line Men	542XX	4	3	2	2
Refrig'n. & Air Cond'ng	545XX	5	3	1	2
Liquid Fuels	546XX	4	4		2
Heating Systems	547XX	8	4	2	3
Pavements	551XX	12	6		4
Const. Equip. Operator	551XX	10	6	2	4
Carpentry	552XX	7	5	2	4
Masonry	552XX	3	2		2
Protective Coating	552XX	4	3	1	1
Plumbing	552XX	10	6	3	4
Metal Processing	532XX	3	2		1
Gen. Maint. Mechanic	555XX	4	2		2
Electric Power Prod.	543XX	7	5	5	4
Refrig'n. & Air Cond'ng Plants	545XX A	2	1	1	
Heating Plants	547XX A	5	2	2	1
Water & Waste	563XX	10	6	1	4
Engr. Entomology	566XX	2	2	1	2
Fire Protection	571XX	38	20	2	10
Total Military		166	103	33	60

Prime BEEF ... cont'd.

Often, prior to the career structure revision, there was no relationship between the skills identified for military authorizations and the skills needed for direct combat support. In addition too often a man assigned to a given specialty would be in a "dead-end" career which would offer him no hope of rising above the 5 level.

Under the revised career structure the "dead-end" is eliminated. There are now ten 9-level slots within the CE career structure, and no matter what the entry specialty it is possible to progress to one of them.

The new career structure (Fig. 2) provides four basic career areas. The 54XX career field, formerly *Facilities*, is now the *Civil Engineering Mechanical/Electrical* field; the 55XX, formerly *Construction*, is the *Civil Engineer Structural/Pavements* field; the 56XX, formerly *Utilities*, is the *Civil Engineering Sanitation* field. *Fire Protection*, 57XX, remains unchanged.

21 Career Ladders

These four basic career areas provide 21 career ladders which feed into the ten "supergrade" slots.

Typical of the revised career structure is the 55XX field. There are ten career ladders in this field leading to four supergrade positions. Two ladders offer inputs to the 55190, Pavements Superintendent, level. Masonry and entomology skills have been removed and a 3/5/7 progression in the Pavement Maintenance and Construction Equipment Operator career ladders remains.

Four ladders: Carpentry, Masonry, Protective Coatings, and Plumbing feed into the 55290, Structural Superintendent. The Building Maintenance Mechanic ladder has been removed from this area. The Masonry ladder has been revised to a structural mason (concrete and steel) configuration and the Painter job specialty rewritten to embrace technical knowledge in the areas of protective coatings, corrosion control and the effects of electrolysis and given the Protective Coating title.

The Cost and Real Property Accounting, General Maintenance, and Work Control ladders lead to the 55690, Work Control Superintendent. The Cost and Real Property Accounting career ladder is new. It was developed to satisfy a long standing requirement. Despite the legal and regulatory requirements imposed on Civil Engineering to keep real property and cost accounting records, prior to the creation of this career ladder, all personnel needed to fulfill this requirement were drawn from the comptroller and administrative fields.

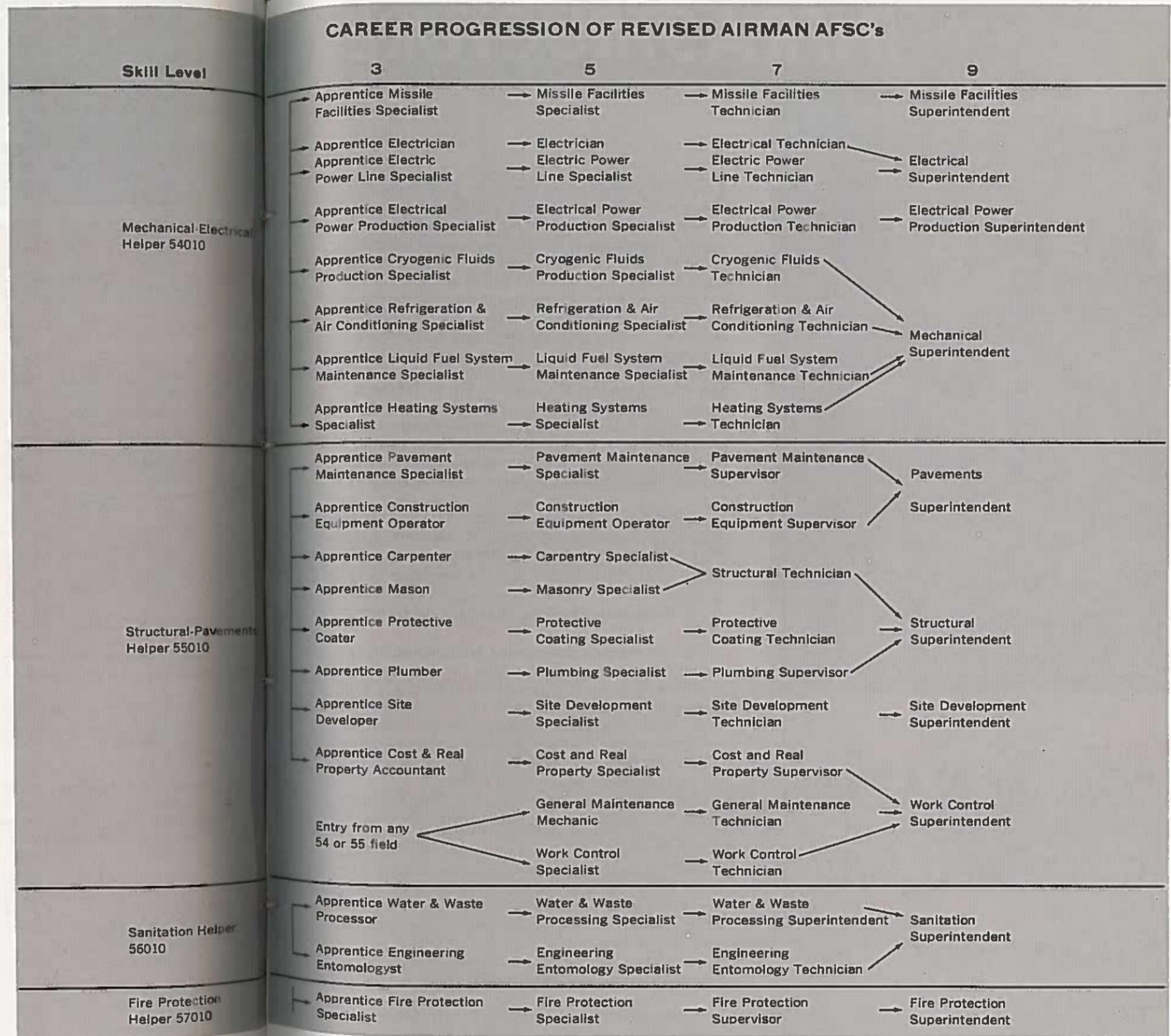
New: Site Development

The General Maintenance ladder has been rewritten to recognize the higher proficiency required of those who enter it from other career ladders at the 5-level.

The fourth supergrade slot in the 55XX career field evolves from a totally new and different career ladder; Site Development. Sub-professional military engineering knowledge is required for this ladder. Airmen must be trained and qualified to design and engineer Civil Engineering construction/maintenance-type projects under the supervision of Professional Engineers. This ladder, besides offering a challenging career, takes advantage of those personnel who enter the Air Force with one or two years' college in a suitable discipline. It offers them the chance, through Operation Bootstrap, to complete their education and enter the Civil Engineering career field as officers while working in their area of interest.

Revisions in the other Civil Engineering career areas are similar to those in Civil Engineer Structural/Pavements. The emphasis is on quality, the quality in skills necessary to make Prime BEEF go.

Civil Engineering has, through Prime BEEF and the revised AFSC's, met the challenge of providing a force capable of responding to world wide contingencies. Implementation of this program is projected for the immediate future since "hard core" military manpower requirements have been identified within cur-



rent resources. However, the position of "Prime BEEF" and adjustments to the military/civilian mix cannot be

accomplished immediately. Considerable time will be required to overcome many hurdles, such as administrative factors,

manpower ceilings, career development problems, training mission changes, etc. It is the job of every person within

Civil Engineering to get behind Prime BEEF and make this period of transition as successful and as smooth as possible.