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Techniques for the Fires Brigade

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Preface

This field manual (FM) describes techniques for the fires brigade (FIB) in unified land operations.

The manual replaces FM 3-09.22 and complements FM 3-09.

FM 3-09.24 supports Army capstone doctrine in Army Doctrine Publication (ADP) 3-0, FM 3-90.6, as well as joint doctrine in Joint Publication (JP) 3-0, JP 5-0, JP 3-09, JP 3-13, and JP 3-60.

Defined terms are identified in the text. Definitions for which this publication is the proponent are printed in boldface. These terms and their definitions will be incorporated into the next revision of ADRP 1-02. For other definitions in the text, the term is italicized, and the number of the proponent publication follows the definition. Terms for which this publication is the proponent are indicated with an asterisk in the glossary.

Unless this publication states otherwise, masculine nouns and pronouns do not refer exclusively to men.

This publication applies to the Active Army, the Army National Guard (ARNG)/Army National Guard of the United States (ARNGUS), and the United States Army Reserve (USAR) unless otherwise stated.

Headquarters, United States Army Training and Doctrine Command is the proponent for this publication. The preparing agency is the U.S. Army Fires Center of Excellence and Fort Sill. Send written comments and recommendations on a DA Form 2028 (Recommended Changes to Publications and Blank Forms) to Directorate of Training and Doctrine, 700 McNair Avenue, Suite 117 ATTN: ATSF-DD, Fort Sill OK 73503 by e-mail to usarmy.sill.fcoe.mbx.dotd-doctrine-inbox@mail.mil; or submit an electronic DA Form 2028.

Introduction

SCOPE

This manual describes the fires brigade (FIB) in support of division, corps, or other supported headquarters (HQ) operations in unified land operations. Chapter 1 begins with the FIB organizational framework. Chapter 2 describes FIB mission command and communications. Chapter 3 describes the FIB operations and integrating processes. Chapter 4 describes FIB employment. Chapter 5 provides a summary discussion of FIB sustainment. Appendix A provides an example of a FIB operation order (OPORD). Appendix B describes the training available for field artillery personnel.

The intended audience for this publication is leaders and staff sections within the FIBs and their supporting and supported units. These leaders include those in brigade combat team, division, and corps chains of command; field and company grade officers; middle-grade and senior noncommissioned officers; and brigade, battalion and squadron staffs. This manual provides guidance for division and corps leaders and staffs for training and employment of the FIB. This publication may also be used by Army or other unified action organizations to assist in their planning for working with and supporting the FIB and its operations.

This manual builds on the collective knowledge and experience gained through recent operations, numerous exercises, and the deliberate process of informed reasoning. It is rooted in time-tested principles and fundamentals, while accommodating force design, new technologies, and diverse threats to national security.

SUMMARY OF NEW MATERIAL AND CHANGES FROM FM 3-09.22

Chapter 1 describes the organizational framework for the FIB including—

- The role of the FIB, including the FIB as part of a division and as the force field artillery HQ for the supported higher HQ.
- FIB organization (subordinate units, command, and staff) with a discussion of key personnel duties and responsibilities.

Chapter 2 describes the FIB command post (CP) and CP operations including—

- The command group and the main, tactical, and early-entry CPs.
- A description of FIB CP cells, elements, and sections and their duties and responsibilities.
- A brief summary of the FIB Army Battle Command System (ABCS) and communications network.

Chapter 3 describes FIB operations and integrating processes including—

- A summary of FIB operations process—plan, prepare, execute and assess.
- A summary of FIB targeting and intelligence gained from surveillance, reconnaissance; and target acquisition radars.

- A summary of key continuing activities, including inform and influence activities, fire support coordination, clearance of fires, and airspace control.
- A summary of special considerations for the FIB including early entry operations, joint air attack team operations, suppression of enemy air defenses , terrain management, survey, meteorology and laser management.

Chapter 4 describes FIB employment (how the FIB fights) including—

- A summary discussion of the key factors influencing the FIB's operational environment (combined arms maneuver and wide area security and joint, interagency, intergovernmental, and multinational operations) and operational framework (area of operations, allocation of combat power by purpose, and FIB strike and counterfire operations).

Chapter 5 provides a summary discussion of FIB sustainment.

Appendix A provides an example of a FIB OPORD.

Appendix B describes the training available for fires brigade personnel.

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Chapter 1

Fires Brigade Organizational Framework

This chapter discusses the fires brigade's (FIB) basic roles, capabilities, organization, and command and staff functions/responsibilities. Additionally, it provides a brief description how functional and integrating cells/elements are formed within the FIB Headquarters (HQ).

SECTION I – THE FIRES BRIGADE

ROLE OF THE FIRES BRIGADE

1-1. A FIB's primary task is conducting strike operations (FM 3-09). The FIB is the only Army field artillery organization above the brigade combat team (BCT) and can be directed to execute tasks for any joint, Service, or functional HQ. The FIB is neither organic to any Army organization or echelon, nor is it focused on any specific region or geographic combatant commander's area of responsibility. A division, corps, joint force land component command, or joint task force (JTF) may have a FIB attached or placed under operational control (OPCON), however, the FIB is normally attached to a division HQ. When operating under the control of the joint force commander (JFC) or another Service, the Army Service component command exercises administrative control over the FIB.

1-2. Fires brigades are task-organized to accomplish assigned tasks. The FIB's supported commander assigns the FIB its mission and possibly an area of operations (AO). The supported commander provides guidance on coordinating the FIB's actions with BCTs and other supporting brigades in the command. The FIB's supported commander provides supporting units to the FIB as necessary. The FIB might be required to detach some of its subordinate elements to BCTs or other supporting brigades of the command. BCTs, reconnaissance and surveillance brigades, maneuver enhancement brigades, combat aviation brigades, and sustainment brigades can all support FIB operations.

1-3. When a FIB is attached for training and readiness authority (TRA), the FIB participates in the training events, readiness exercises, and the deployments of its supported command. The supported commander may also direct the FIB commander to assist BCT commanders in training and preparing their organic fires battalions. The FIB has organic units and will receive other assigned or attached units based on task organization for a specific contingency or operation or to meet stationing or other requirements.

1-4. For more information on TRA see Annex B, Fires Brigade Training.

FIRES BRIGADE EMPLOYMENT CAPABILITIES

1-5. The FIB gives the supported commander a HQ to plan, synchronize, and execute close supporting fires for engaged forces, strike, counterfire, and fires in support of decisive and shaping operations throughout the command's AO. The FIB has the necessary mission command structure (described in Chapter 2) to integrate ground and air maneuver forces.

FIRES BRIGADE EMPLOYMENT CAPABILITIES

1-6. The FIB is capable of being a supported or supporting unit that is trained, manned, organized, and equipped to provide for the collective and coordinated use of Army indirect fires, joint fires, and control for its own or a supported HQ operations. This includes synchronizing physical attack, electronic warfare, and computer network operations against enemy and adversary command and control nodes. FIBs have the necessary fire support and targeting structure to effectively execute the entire decide, detect, deliver, and assess targeting process for its assigned mission. The FIB is capable of providing the division, corps, joint force land component commander, JTF, or other supported commander with —

- A force field artillery HQ if so designated by the commander of the FIB's controlling HQ.
- A HQ able to mission command the full complement of Army and joint fire support capabilities. The FIB table of organization and equipment includes a tactical air control party (TACP) that must be resourced by the U.S. Air Force. This normally occurs when the fires brigade is deployed. Control of multinational fires may require augmentation by personnel with the necessary language skills and communications equipment.
- Technical oversight of all field artillery-specific training within the command.
- Assisting the supported commander in training preparation for deployment of the organization's field artillery personnel.

1-7. The FIB is capable of providing fires and radar coverage for—

- Strike operations and counterfire.
- Support of decisive and shaping operations.
- Close support to engaged forces (such as reinforcing fires for BCT organic fires battalions).
- Suppression of enemy air defenses to support joint and Army aviation attack operations.
- Support of special operations forces operating in the AO of the FIB's controlling HQ (for example, a division, corps, JTF, or land component HQ).
- Support of other supporting brigades operating in the FIB's supported commander's AO.

THE FIRES BRIGADE AS A FORCE FIELD ARTILLERY HEADQUARTERS

1-8. The *force field artillery headquarters*, if one is designated by the supported commander, is normally the senior field artillery HQ organic, attached, or placed under the OPCON of that command. The supported commander specifies the commensurate responsibilities of the force field artillery HQ and, if necessary, the duration of those responsibilities (FM 3-09) These responsibilities are based on mission variables such as mission, enemy, terrain and weather, troops and support available, time available, civil considerations (METT-TC) and may range from simple mentoring and technical oversight to full OPCON of all field artillery units organic, assigned, attached, or placed under that command.

1-9. When designated as the force field artillery HQ by a supported division commander, the FIB commander assumes the responsibility as FSCOORD for the division. The division chief of fires serves as the deputy FSCOORD and takes direction and guidance from the FSCOORD. If the FIB is not designated

as the FFA HQ, the Division Chief of Fires maintains this responsibility. As the FFA HQ, the FIB's functions include:

- Recommending field artillery organization for combat to the commander.
- Providing mission command for field artillery units organic, assigned, attached, or placed under the OPCON or tactical control of the command (thus providing unity of field artillery command).
- Assisting the fires cell in producing Annex D (Fires) for the operations order.
- Training of the field artillery units that are assigned, attached, or placed under the OPCON of the command and mentoring of the commanders and leaders of these field artillery units. This includes field artillery technical oversight of the training and assessment of the fires battalions and other field artillery units organic to BCTs and supporting brigades. Assisting the supported commander in training preparation for deployment of the maneuver organizations' field artillery personnel. The extent of oversight duties and responsibilities must be specified by the division or other supported commander to ensure full cooperation and compliance by the BCT and other supporting brigade commanders.
- Advising the supported commander of field artillery related new equipment fielding and software updates within field artillery units.
- Establishing common survey, metrological, and radar target acquisition (TA) plans for the command.
- Planning, preparing, and executing fires for close support of engaged forces, and in support of strike, counterfire, and decisive and shaping operations.
- Providing centralized mission command for the full complement of Army indirect fires, joint fires, and multinational fires provided in support of the command. This is especially useful to the commander in circumstances where major combat operations are likely and when deconfliction of fires across multiple contiguous AOs is required. Centralized mission command of supporting Army and joint fires is useful when unconventional forces are operating either independently or as the only force integrated within indigenous forces and require dedicated all-weather fires and fire support coordination.
- Working with the command's assistant chief of staff, operations (G-3) and fires cell in planning, coordinating, and executing fire support tasks assigned to the command by its higher HQ. This can include assisting in the development of fire support plans; accepting or passing control of fires during passage of lines operations; facilitating single point of contact for outside agency coordination for strike and counterfire; and coordinating sustainment of fire support for nonorganic field artillery units and the command's subordinate units.
- Facilitating and participating in the commander's targeting process

1-10. Designating a force field artillery HQ for a command improves centralized control of field artillery in the force by enhancing—

- The massing of field artillery fires where needed.
- Coverage of the force AO by field artillery fires and radars.

- Rapid shifting of field artillery fires as needed to weight the decisive operation.
- Effective planning for field artillery fires in support of rapid maneuver.
- If so directed by the supported commander, standardization of field artillery training, readiness and maintenance throughout the force.
- Planning the fires and positions of all field artillery units with a general support or general support-reinforcing support relationship to the force.
- Coordinating the counterfire battle for the supported commander.
- Accepting or passing control of fires during passage of lines operations.
- Authorizing changes to approved or doctrinal communications net structures for nets it controls.
- Coordinating the sustainment of subordinate field artillery assets.

1-11. See FM 3-09 for additional information.

ORGANIZATION OF THE FIRES BRIGADE

1-12. Organic FIB assets include a multiple launch rocket system (MLRS) or high-mobility artillery rocket system (HIMARS) battalion, a brigade support battalion (BSB), a signal network support company, a target acquisition battery (TAB), and a headquarters and headquarters battery (HHB). The FIB and each of the subordinate elements can be augmented (task-organized) as required. This may include a combination of one to five rocket/missile (MLRS or HIMARS) and/or cannon fires battalions, as well as other enablers, such as counterfire radars and mission command warfare capabilities (such as, electronic warfare assets). For example, executing strike may require placing additional surveillance, reconnaissance and inform and influence activities assets under the OPCON or tactical control (TACON) of the FIB commander. Alternatively, a supporting battlefield surveillance brigade can retain control of surveillance and reconnaissance assets and provide the information to the FIB. Figure 1-1 depicts the normal FIB organization.

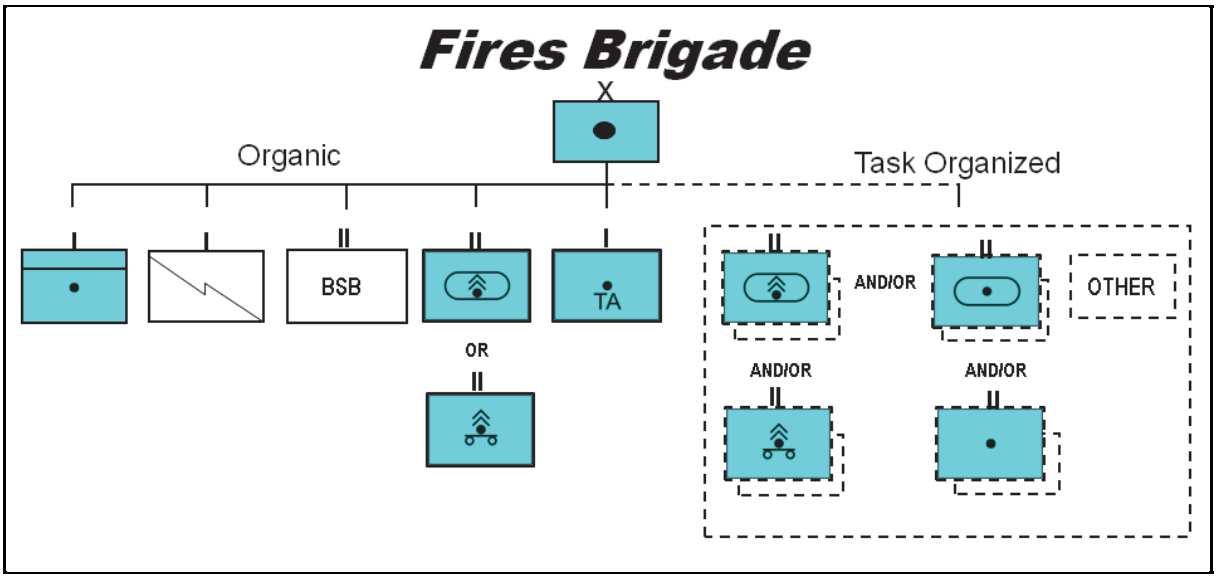

Figure 1-1. Fires brigade organization (example)

HEADQUARTERS AND HEADQUARTERS BATTERY

1-13. The FIB HHB and its assigned brigade staff provide expertise across a broader range of functional areas. Chapter 2 of this field manual (FM) provides a description of FIB command post (CP) sections/cells/elements, their functions, and the duties and responsibilities of the HHB personnel assigned to them.

TARGET ACQUISITION BATTERY

1-14. The TAB is organized with meteorological, survey, and TA capabilities including the AN/TPQ-37 and AN/TPQ-48-50-series radars. The supported commander will normally designate the FIB as the command's counterfire HQ, and may charge the FIB commander with management and coordination of all counterfire radars in the command. Though the BCTs may retain their organic radars, the management of these radars, like those in the TAB, may be directed through the counterfire HQ.

Meteorological Support

1-15. Meteorological support includes providing position and target area support to organic and assigned fires battalions and fires battalions organic to the supported HQ's BCTs when terrain or distances require multiple meteorological stations.

Radar Support

1-16. Radar support includes—

- Detecting, locating, classifying, reporting, and communicating the firing locations and impact points of enemy mortars, artillery, rockets, and missiles that are beyond the range of the radars in the fires battalions.
- General support radar coverage for the supported higher HQ (including special operations forces operating in the supported HQ AO).
- Additional radar coverage for BCTs to support the maneuver of their forces and allow movement of their radar(s).
- Coordination for radar maintenance support provided by the brigade support battalion.
- Confirming the actual burst/impact location of friendly fires when required (for instance if required by the rules of engagement.
- Integration with Indirect Fire Protection Capability units such as the Counter-Rocket Artillery and Mortar system.
- Oversight and integration of the division's radar zone management.
- Recommending and coordinating sectors of search within the supported command's AO and adjusting coverage by field artillery target acquisition (TA) resources as the situation develops. Coordination is required to maintain coverage of critical friendly zones/call for fire zones when attached or when BCT organic fires battalions displace their AN/TPQ-36 radars.

Survey Support

1-17. Survey support includes—

- Ensuring a common survey control for the supported command.
- Establishing declination stations.
- Providing survey control to FIB radars and other users.
- Providing supplemental survey support to BCT organic fires battalions.

Target Processing Support

1-18. Target processing support includes—

- Monitoring the operation of organic and augmenting field artillery TA resources.
- Passing targets produced by the TAB's target processing section to the FIB main CP fires cell's fire control element for attack.
- Maintaining the target production map and the artillery target intelligence file in automated targeting systems.
- Maintaining the current target log when operating in a non-automated environment.
- Requesting battle damage assessment on targets produced and passed to the fire control element for attack.
- Acting as net control station for the force field artillery TA command and intelligence net.

SIGNAL NETWORK SUPPORT COMPANY

1-19. The FIB's signal network support company is organic to the FIB and provides the primary communications support to the brigade including—

- Reach connectivity through the division or other supported HQ.
- Range extension of the FIB's communications services.
- Network management.
- Establishing primary CP voice and/or video capabilities.
- Performing limited signal electronic maintenance.

1-20. The signal network support company deploys, installs, operates, and maintains the mission command information systems networks that support FIB operations and integrate with the division, corps, or theater networks. The signal network support company HQ consists of the command section of the company (commander, executive officer, first sergeant), as well as the supply noncommissioned officer, chemical, biological, radiological, nuclear noncommissioned officer, and unit armorer. Key operational elements of the company include the network operations section, joint network node platoon, and network extension platoon. They enable FIB communications by providing line-of-sight and beyond-line-of-sight connectivity for unclassified, secret, and top secret/sensitive compartmented information voice and data, tactical

network coverage, and CP support. The joint network node platoon is normally located at the FIB main CP and the network extension platoon at the TAC CP, but depending on METT-TC, can be located where they can best support FIB operations.

BRIGADE SUPPORT BATTALION

1-21. The BSB is organized to provide sustainment support (supply, maintenance, field services, and transportation) to the organic units of the FIB. The BSB is a multifunctional unit composed of subordinate units that provide supplies, maintenance, and repair to the units assigned and attached to the FIB during all phases of operations. The BSB's subordinate units include a headquarters and headquarters company, distribution company, field maintenance company, and one forward support company for each fires battalion. The forward support companies are in direct support of the fires battalions with the BSB providing technical oversight. The BSB also provides backup support to the forward support companies and sustainment support on an area basis to those units who do not have such support.

1-22. For more on the FIB BSB see FM 4-90 and Chapter 5 of this FM.

ROCKET/MISSILE BATTALION

1-23. There is one rocket/missile battalion organic to the FIB. It provides long-range fires in support of the division, corps, JTF, or other higher HQ decisive and shaping operations and for conducting counterfire. The battalion could reinforce BCT organic fires battalions. The rocket/missile battalion that is organic to the FIB is organized as either an MLRS or a HIMARS battalion. Both units are capable of firing the full suite of MLRS rockets and Army Tactical Missile System missiles. For more on the rocket/missile battalion see FM 3-09.60.

SECTION II – FIRES BRIGADE COMMAND AND STAFF

FIRES BRIGADE COMMAND

1-24. FIB command includes the—

- **Commander.** The FIB commander has complete responsibility and accountability for the FIB and its actions. He provides his subordinates with missions, resources, and a clear statement of his intent. If the FIB is designated as the force field artillery headquarters he serves as the FSCOORD to the corps/division commander and as the principle advisor to the maneuver commander for all fires functions.

- **Command Sergeant Major.** The brigade command sergeant major is the senior enlisted advisor to the commander.

- **Deputy Commander.** The FIB commander determines the deputy commander's role, duties, and relationship with the staff and subordinate commanders, and normally assigns him specific tactical tasks, duties, and responsibilities that require command oversight.

- **Executive Officer.** The executive officer directs, coordinates, supervises, and trains the staff and is responsible for the operations of the FIB main CP.

DUTIES AND RESPONSIBILITIES OF KEY PERSONNEL

FIRES BRIGADE COMMANDER

1-25. The FIB commander is responsible for planning, integrating, coordinating, synchronizing, and implementing FIB operations in support of division, corps, or other higher HQ operations. He sets the pace and provides unambiguous guidance in the form of missions, tasks, and a clear statement of priorities and commander's critical information requirements to the deputy commander, executive officer, S-3, fire support officer (FSO), and other FIB staff and subordinate unit commanders. Duties and responsibilities of the FIB commander include—

- Executing missions assigned to the FIB by higher HQ.
- Determining specified and implied tasks for the FIB based on the division or other higher HQ concept of operations, concept of fire support, and other guidance in the operation plan (OPLAN)/operation order (OPORD).
- Planning and recommending FIB employment in support of division or other higher HQ operations.
- Recommending allocation of fires, assignment of command and support relationships, and positioning of surveillance, reconnaissance, target acquisition, attack and sustainment assets.
- Ensuring FIB subordinate units are properly task organized and deployed to execute fires for the supported command operations.
- Advising the division or other higher HQ commander on FIB capabilities required to support committed BCTs and support brigades engaged in the current battle and expedite processing of immediate requests for fire support.
- Augmenting, as required, the fire support of a division, corps, or other supported command and the BCTs and support brigades assigned, attached, or placed under the OPCON of that command.
- Overseeing FIB participation in the division, corps, or other supported higher HQ targeting process, to include the joint targeting process when supporting a joint HQ (see FM 3-60and joint publication [JP] 3-60.
- Mission command of the FIB and its subordinate organic, assigned, and attached units and as designated by the higher headquarters, TRA of the BCT fires battalions.
- Assessing combat readiness of FIB subordinate organic, assigned, and attached units.
- Directing mission preparations to include rehearsals.
- Issuing commander's critical information requirements.
- Approving FIB plans and orders.

FIRES BRIGADE COMMAND SERGEANT MAJOR

1-26. The brigade command sergeant major is the senior enlisted advisor to the commander. He is both a specialist and a generalist, as he must have technical competence as a field artilleryman while being broadly knowledgeable in all functional areas such as operations, administration, and sustainment. The command sergeant major best serves as an extension of the commander's eyes and as his primary troubleshooter. He works closely with each of the brigade staff sections, frequently changing his area of focus based on the needs of the unit and the direction of the commander. The command sergeant major usually operates independently of, but complementary to the commander, frequently at a critical location where the commander needs additional supervision, oversight, or observation. Because of this, the command sergeant major requires a vehicle, radio, and driver. The command sergeant major has specific responsibilities, which may include:

- Assist the commander in maintaining effective communication with senior and subordinate leaders and staffs.
- Validate that the commander's directions and intent are being properly communicated through the leadership chain to the front line Soldiers and that their feedback and concerns are reaching the commander.
- Advise the commander and staff on matters pertaining to enlisted Soldiers.
- Advise the brigade commander on assignment and training of fires personnel assigned to maneuver headquarters.
- Assist the S-3 in planning, coordinating, and supervising collective and individual training to include certification requirements.
- Mentor fires battalion sergeant majors and noncommissioned officers.
- Direct noncommissioned officer professional development.
- Develop future leaders from within the enlisted ranks.

FIRES BRIGADE DEPUTY COMMANDING OFFICER AND EXECUTIVE OFFICER

1-27. There are a number of ways FIB commanders have to divide duties and responsibilities among principal subordinates, such as the deputy commander, executive officer, and S-3. For instance the deputy commander might be assigned duties with an external focus such as coordinating with higher staff and the executive officer to duties with an internal focus such as directing the activities of the FIB staff or vice versa. The deputy commander might be responsible for current operations, and the S-3 for planning future operations or vice versa. Depending upon mission variables there is a number of alternatives; one is described below.

Deputy Commanding Officer

1-28. Usually, FIBs have a deputy commander to serve as the second in command. His duties, responsibilities, and authority vary based on the commander's desires, the FIB's mission, and the scope and complexity of operations. The FIB commander delegates responsibility to his deputy commander for specific areas and/or functions. By giving the deputy commander the authority needed to control these areas and functions, the FIB commander extends the span of his own control. Key considerations include—

- The deputy commander might command a portion of the force or the AO, chair key boards and working groups, or oversee readiness.
- The deputy commander does not direct, supervise, or give orders to the executive officer, unless authorized by the commander.
- Coordinating and special staff officers generally do not work for the deputy commander, unless directed by the commander.
- The deputy commander often serves as the commander's representative for negotiations, media activities, and designated key leader engagements.
- The position of the deputy commander enables the executive officer and S-3 to focus on the overall integration and synchronization of current operations. The deputy commander can do this by providing increased senior leader involvement in the planning of future operations.
- The deputy commander may also serve as a temporary liaison officer to unified action agencies and multinational staff or command groups when and where METT-TC conditions dictate.
- The deputy commander serves as the second in command in the commander's absence.

Executive Officer

1-29. The executive officer is the FIB commander's "chief of staff." He directs, coordinates, supervises, trains, and synchronizes the work of the staff, ensuring efficient and prompt staff actions. The FIB commander usually delegates executive management authority (equivalent to command of the staff) to the executive officer for the coordinating and special staff. The commander usually retains responsibility for supervising the personal staff. Staff members inform the executive officer of any recommendations or information they pass directly to the commander or deputy commander and instructions they receive directly from the commander or deputy commander.

1-30. The executive officer must understand the commander's intent and ensure the FIB staff implements it. He monitors the combat status of all subordinate units and ensures that status is provided to the commander and/or deputy commander. The executive officer synchronizes all the elements of combat power into FIB operations to implement the commander's intent and concept of operations. Key duties and responsibilities of the executive officer include—

- Management of the commander's critical information requirements.
- Information management within the FIB.
- Ensuring FIB actions are horizontally and vertically integrated among the FIB CP, higher HQ, and subordinate, supported, and supporting elements.
- Recommending organization of the staff into functional and integrating cells, meetings, working groups, and boards.
- Determination of liaison requirements and supervision of liaison officers.
- Ensuring quality work from staff officers and sections/cells/elements, and ensuring cross talk throughout assessing, planning, preparation, and execution phases.
- Synchronizing the FIB staff during the military decisionmaking process (MDMP).

- Establishing and maintaining staff planning timelines.
- Integration of surveillance, reconnaissance, target acquisition, fires and inform and influence activities within the targeting process and with the MDMP.
- Supervision of the FIB main CP operations and positioning.
- Integration of attached units in accordance with the supported higher HQ and FIB plan.

1-31. The executive officer directs, coordinates, supervises, and trains the staff. He functions as the commander's principal assistant for internal and external staff coordination during assessment, planning, preparation, and execution of missions. The executive officer is responsible for all staff activities. He is responsible for the operations of the FIB main CP. His primary duties and responsibilities in this area include—

- Disseminating commander's guidance and directives.
- Ensuring staff members aggressively communicate with counterparts at higher, subordinate, supported, supporting, and adjacent elements.
- Assisting the commander with mission command.
- Managing the flow of information within the FIB.
- Providing the commander and higher HQ with periodic updates on the status of the current battle, future plans, and warfighting capability assessment.
- Assessing combat readiness of subordinate units after mission completion.
- Overseeing maintaining running staff estimates from the brigade staff.

FIRES BRIGADE STAFF

1-32. The FIB staff assists the commander in exercising his authority and making decisions. The staff must share information vertically and horizontally with each other and among higher and lower HQ counterparts. The FIB staff includes the—

- **Personal Staff.** The FIB commander's personal staff consists of the chaplain, command sergeant major, brigade judge advocate, and public affairs officer. They assist the commander in their areas of expertise and generally are under the direct supervision of the commander.
- **Coordinating Staff.** The FIB coordinating staff consists of the personnel staff officer (S-1), intelligence staff officer (S-2), operations staff officer (S-3), logistics staff officer (S-4), and signal staff officer (S-6). The coordinating staff develops options and recommendations to ensure the FIB commander has access to critical and timely information to assess continually, and to plan, prepare, and execute.
- **Special Staff.** In the FIB, many special staff members are supervisors of staff sections/cells/elements located in the FIB's main CP including the fire support officer (FSO), the air defense airspace management officers, liaison officers, brigade surgeon, and others.

1-33. For more on staff roles and functions see ADP 6-0.

STAFF SECTIONS

1-34. The FIB staff includes the FIB executive officer and various staff sections. Portions of each FIB staff section (coordinating, special and personal) are distributed among three FIB mission command organizations: the command group, TAC CP, and main CP. The FIB TAC CP and main CP are further organized into warfighting functional and integrating cells (described in chapter 2). These cells contain elements from FIB staff sections. Portions of each staff section may be assigned to the FIB main CP and/or TAC CP and to cells and elements within the main CP and TAC CP as desired by the FIB commander.

FIRES BRIGADE COORDINATING STAFF

S-1

1-35. The FIB S-1 is the coordinating staff officer responsible for all matters concerning human resources support (military and civilian). The FIB S-1 provides technical direction to FIB units in the areas of personnel readiness management, personnel accounting and strength reporting, personal information management, casualty operations, postal operations, essential personnel services, reception, replacement, return-to-duty, rest and recuperation, and redeployment, human resources planning and staff operations, and morale, welfare, and recreation operations. He coordinates the staff efforts of the FIB's surgeon and brigade judge advocate, and is the staff point of contact for equal opportunity, retention, inspector general, and morale support activities. The FIB S-1 shares responsibility with the FIB S-4 for manning the sustainment cell and conducting its operations. A more complete listing of S-1 duties is found in FM 1-0, FM 7-15, and ATTP 5-0.1.

S-2

1-36. The FIB S-2 is the FIB commander's principal staff officer responsible for all matters concerning the enemy/threat, the environment as it affects the enemy/threat, intelligence, and counterintelligence. He is responsible for intelligence readiness, intelligence tasks, intelligence synchronization, other intelligence support, counterintelligence, and support to security programs. The S-2, supported by the entire staff, provides the FIB commander with information and intelligence for targeting the enemy/threat's forces, systems, and facilities, including intelligence support for target development, target detection, and for employment of Army indirect fires, joint fires, electronic warfare including scalable fires, and inform and influence activities. The S-2 is directly responsible for developing and coordinating the intelligence annex and providing input to Appendix 4 (Field Artillery Support) to Annex D (FIRES) (including the associated radar deployment order and radar execution matrices) to FIB plans and orders. A more complete listing of S-2 duties is found in FM 2-0, FM 7-15, and ATTP 5-0.1.

S-3

1-37. The FIB S-3 is the FIB commander's principal staff officer responsible for preparing FIB plans and orders, exercising control of subordinate fires delivery formations, and delivering timely and effective fire support. In addition, the FIB S-3 exercises coordinating staff supervision over a number of closely related functions to include TA, survey, meteorology, and chemical, biological, radiological, nuclear, and high-yield explosive operations. A more complete listing of S-3 duties is found in ADP 5-0, ADP 6-0, FM 7-15, and ATTP 5-0.1.

S-4

1-38. The FIB S-4 is responsible for staff oversight of FIB sustainment operations. Although he is the lead sustainment planner in the sustainment cell, the FIB S-4 coordinates with and relies heavily upon the BSB

support operations officer (duties and responsibilities of the BSB support operations officer are described in Chapter 5) and the BSB staff to develop sustainment plans and requirements for FIB operations. When the BSB support operations officer is unable to participate directly in sustainment planning functions, the S-4 will provide input and staff oversight to the FIB in the areas of supply, maintenance, transportation, medical, and field services. The FIB S-4, in conjunction with the BSB support operations officer, acts as the staff integrator for the BSB, which executes sustainment operations for the FIB. The FIB S-4 is also the staff point of contact for administrative unit movements and deployments. He is also the primary staff officer responsible for establishing and maintaining an awareness of the brigade's sustainment capabilities and limitations. A more complete listing of S-4 duties is found in ADP 4-0, FM 7-15, and ATTP 5-0.1.

S-6

1-39. The FIB S-6 is the FIB's coordinating staff officer responsible for all matters concerning command, control, communications, and computer operations. He provides technical oversight of FIB units in the areas of network operations information dissemination, and information assurance. He is also the FIB staff integrator for the signal network support company. A more complete listing of S-6 duties is found in ATTP 5-0.1.

FIRES BRIGADE SPECIAL STAFF

Fire Support Officer

1-40. A *fire support officer* is a field artillery officer from company through theater army who is responsible for either advising the commander or assisting the chief of fires/brigade fire support officer to advise the maneuver commander on fire support matters (FM 3-09). The FIB FSO (together with the S-3) plans and coordinates the fires warfighting function for FIB operations. He works closely with the S-3 to ensure mutual understanding of all aspects of fire support assessment, planning, preparation, and coordination for FIB operations. He assists the S-3 as needed in insuring plans transition smoothly into execution. The duties and responsibilities of the FIB FSO also include—

- Planning, coordinating, and synchronizing Army indirect fires and joint fires for FIB operations. This includes synchronizing physical attack, electronic warfare, and computer network operations against enemy command and/or control systems.
- Coordinating with supported organization FSO/fires cells to integrate FIB fires into the supported organizations' concept of operations.
- Supervising the fires cell's fires, targeting, air defense airspace management element and working with the air support element (United States Air Force tactical air control party) in planning and coordinating the use of Army indirect fires, joint fires, and electronic warfare for FIB operations. Supervising these elements and/or coordinating their efforts in the synchronization of physical attack, electronic warfare, and computer network operations.
- Training these fires cell to perform all of their functions.
- Advising the FIB commander and staff of the capabilities and limitations of available fire support means including Army indirect fires, joint fires, and electronic warfare. This includes advice on synchronizing physical attack, electronic warfare, and computer network operations.
- Participating in the MDMP of the FIB and supported organizations.

- Developing input to FIB plans (if directed) and orders. Directly responsible for developing and coordinating portions of FIB plans (if directed) and orders that describe the concept/scheme of fires for FIB operations including Annex D (Fires) to FIB plans (if directed) and orders.
- Participating in the targeting process in the FIB or higher headquarters as required.

Fires Brigade Staff Judge Advocate

1-41. The FIB's brigade staff judge advocate is the personal staff officer responsible for operational and administrative law support to the FIB and is the FIB commander's personal legal advisor. He provides the FIB staff with legal advice on the complex operational environment. He participates in the targeting process by reviewing targets to ensure they are lawful under the rules of engagement and law of armed conflict. See AR 27-1, FM 1-04, and ATTP 5-0.1 for additional information on the duties of the staff judge advocate.

SECTION III – FIRES BRIGADE STAFF AUGMENTEES

1-42. The FIB does not have coordinating staff officer positions for the functions of the plans staff officer (S-5), S-7, and civil affairs staff officer (S-9). When augmented, duties and responsibilities for these augmentees are as described in the paragraphs that follow. See ATTP 5-0.1 for additional information on the duties of these staff officers.

PLANS STAFF OFFICER (S-5)

1-43. When provided, the S-5 assesses warfighting requirements, solutions, and concepts for each course of action (COA). The S-5 develops plans and orders and determines potential branches and sequels arising from the war-gaming of various COAs. The S-5 coordinates and synchronizes warfighting functions in all plans and orders. The planning staff ensures that the war game of each COA covers every operational aspect of the mission. The members of the staff record each event's strengths, weaknesses, and the rationale for each action. They complete the decision support template and matrix for each COA. The rationale for actions during the war game are annotated and used later with the commander's guidance to compare COAs.

INFORM AND INFLUENCE ACTIVITIES STAFF OFFICER (S-7)

1-44. To assist in developing initial information themes and messages for the command, the S-7 with support from the entire staff, reviews the higher HQ information themes and messages. If available, the staff also reviews internal design products, including the initial commander's intent, mission narrative, and planning guidance. Information themes and messages are refined throughout the MDMP as commanders refine their commander's intent and planning guidance and COAs are developed, evaluated, and decided on.

CIVIL AFFAIRS OPERATIONS STAFF OFFICER (S-9)

1-45. The S-9 ensures each COA effectively integrates civil considerations (the "C" of METT-TC). The civil affairs operations officer considers not only tactical issues, but also sustainment issues. This officer assesses how operations affect civilians and estimates the requirements for essential stability tasks commanders might have to undertake based on the ability of the unified action. Host nation support and care of dislocated civilians are of particular concern. The civil affairs operations officer's analysis considers how operations affect public order and safety, the potential for disaster relief requirements, noncombatant evacuation operations, emergency services, and the protection of culturally significant sites.

This officer provides feedback on how the culture in the AO affects each COA. If the unit lacks an assigned civil affairs operations officer, the commander assigns these responsibilities to another staff member. The civil affairs operations officer represents the other actors' points of view if these agencies are not able to participate in the war game for security or other reasons.

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Chapter 2

Fires Brigade Mission Command and Communications

This chapter describes fires brigade (FIB) mission command and communications. Section I begins with the FIB command post operations. Section II describes FIB command post cells and elements. Section III describes the Army Battle Command System (ABCS) and Section IV describes the FIB communications network.

SECTION I – COMMAND GROUP AND COMMAND POSTS

2-1. Army tactics, techniques, and procedures (ATTP) 5-0.1 defines command group, tactical command post (CP), main CP, and early entry CP as —

- The *command group* consists of the commander and selected staff members who assist the commander in controlling operations away from a command post (ATTP 5-0.1).
- The *tactical command post* is a facility containing a tailored portion of a unit headquarters designed to control portions of an operation for a limited time (ADP 5-0/ATTP 5-0.1).
- The *main command post* is a facility containing the majority of the staff designed to control current operations, conduct detailed analysis, and plan future operations. (ATTP 5-0.1).
- The *early-entry command post* is a lead element of a headquarters designed to control operations until the remaining portions of the headquarters are deployed and operational (ATTP 5-0.1).

COMMAND GROUP

2-2. The FIB commander locates himself wherever he can be most effective. The FIB command group is formed anytime the FIB commander is located away from the FIB main CP or TAC CP. The command group is not a permanent organization and is organized based on the mission. It includes the commander and those he selects to accompany him away from the CP. The actual configuration of personnel, equipment, and capabilities of the FIB command group is mission, enemy, terrain and weather, troops and support available, time available, civil considerations (METT-TC) dependent.

2-3. The command group usually operates using FIB organic assets but may also operate from an Army airborne mission command system helicopter for limited periods. A combat aviation brigade (assigned, attached, or placed under the operational control of the supported headquarters [HQ]) provides this asset. The Army airborne mission command system is a UH-60 aircraft configured with ABCS workstations and communications systems to allow a small command group to conduct operations over extended distances. The Army airborne mission command system has the benefit of being able to move rapidly about the battlefield, quickly cover long distances, use altitude to extend line of sight communications, and facilitate rapid link-ups for face-to-face coordination. The aircraft is equipped with generators that allow for continued mission command operations from stationary ground locations within the division HQ.

ORGANIZATION AND POSITIONING

2-4. A CP is a unit HQ where the commander and staff perform their activities (ADP 5-0). FIB CPs are organized and manned to provide support to the commander in accomplishing the mission. The FIB main CP is primarily designed and equipped to perform long-range planning, analysis, sustainment, coordination, and other supporting functions not directly essential to the immediate control of current operations.

2-5. Specific FIB CP configurations to support 24-hour operations should be established by unit standing operating procedures, mission variables, commander's intent, and higher HQ directives. The CP facilities, personnel, and equipment authorized by the table of organization and equipment will be configured to support the commander's guidance.

MAIN COMMAND POST

2-6. The FIB main CP is the FIB's primary mission command facility. It primarily conducts future planning, analysis for current and future operations, sustainment coordination, and other staff functions. The staff at the main CP operates under the general supervision of the deputy commander or executive officer. The main CP serves as the primary planning and coordination CP for the FIB. The main CP plans, directs and monitors all FIB operations, coordinates with higher and adjacent units, and provides in-depth analysis of information and intelligence together with attendant recommendations to the FIB commander. The main CP assists the commander in controlling cannon, rocket, and missile delivery systems and other fire support assets such as surveillance, reconnaissance, and target acquisition. The main CP receives requests from lower echelons (including brigade combat team (BCT) organic fires battalion fires cells when the FIB is acting as force field artillery HQ) for additional fire support resources and processes them for engagement. CP functions are designed to monitor and track events, assist, and support commanders in mission planning, preparation, and successful management of operations across the spectrum of conflict. Critical functions include (but are not limited to)—

- Maintaining contact and coordinating with higher, adjacent, and subordinate units.
- Adjusting current operation plans (OPLAN)/operation orders (OPORD) for future operations.
- Receiving, analyzing, and disseminating tactical information (vertically and horizontally).
- Maintaining situational awareness.
- Requesting and synchronizing maneuver enhancement and sustainment.
- Coordinating resources and making recommendations to the commander.
- Coordinating fire support.
- Conducting assessment.
- Coordinating airspace control for fire support including surveillance, reconnaissance, and TA assets.
- Receiving and coordinating the use of liaison officers.
- Providing reachback capability to the TAC CP.

COMMAND POST CELLS

2-7. A *command post cell* is a grouping of personnel and equipment organized by warfighting function or by planning horizon to facilitate the exercise of mission command (ATTP 5-0.1). There are two types of CP cells —functional and integrating. Functional cells group personnel and equipment by warfighting function. Integrating cells group personnel and equipment to integrate warfighting functional cell activities. Cell elements are generally manned by personnel of the FIB table of organization and equipment. Individual main CP elements (or combinations of elements) and/or selected personnel from these elements merge to form the FIB current operations cell and the plans integrating cell as required.

Functional Cells

2-8. Functional cells coordinate and synchronize forces and activities by warfighting function. The functional cells within a CP are intelligence, movement and maneuver, fires, protection, sustainment, and mission command. The functional cells in the main CP are scalable to accommodate staff augmentation when required. The arrangement of warfighting functional cells within the main CP supports the temporary movement of staff between cells and elements within the main CP or between the TAC CP and the main CP. There may also be one or more coordinating, special and personal staff sections residing at the main CP that are not organized into cells or elements. The main CP includes the command group (when the command group is not forward with the TAC CP or conducting liaison with a supported division, corps, joint task force [JTF], or other higher HQ). See ATTP 5-0.1 for additional information on functional cells.

2-9. The FIB is specifically designed and organized to implement the fires warfighting function. Consequently, not all warfighting functions are organized into their respective separate (pure) warfighting functional cells. The main CP is not organized with functional cells for the movement and maneuver or protection warfighting functions. All warfighting functions are either represented or can be made available to serve temporarily in the FIB CP as part of an integrating or functional cell as needed. Should the FIB be called upon to integrate attached ground and air maneuver forces for limited operations, a temporary movement and maneuver element may be formed. Manning can be accomplished by a combination of personnel drawn from other FIB main CP warfighting functional cells, their elements, and liaison or other personnel from maneuver, aviation, engineer, special operations forces, civil affairs, or other units that can be assigned, attached, or placed under the operational control of the FIB.

Integrating Cells

2-10. Integrating cells are organized by planning horizon. They coordinate and synchronize forces and warfighting functions within a specified planning horizon and include the plans, future operations, and current operations integration cells. The FIB is not resourced for a future operations cell.

Plans Cell

2-11. The plans cell is formed on an as-needed basis as directed by the commander, deputy commander, or executive officer. The plans cell may be led by the S-3, fire support officer (FSO), or other key staff officer designated by the commander. When activated, the plans cell is responsible for planning operations for the mid-range to long range time horizons. It develops plans, orders, branches, and sequels based on orders from higher echelons, projected outcome of the current operation, and the FIB commander's guidance. It will normally consist of a designated core group of planners and analysts drawn from elements of the main CPs functional cells, which can be augmented based on mission planning requirements. All staff sections are required to assist as needed. The deputy commander or executive officer may assign tasks to other main CP cells and elements concerning requirements or their inputs and contributions necessary for the plans cell to accomplish its functions.

Current Operations Cell

2-12. The main CP current operations cell is responsible for monitoring and controlling operations throughout the FIB AO, including counterfire operations. It maintains the common operational picture, coordinates with higher, subordinate, and adjacent units, analyzes information, and provides recommendations to the FIB commander. The FIB operations staff officer (S-3) (supported by the assistant S-3) leads the current operations cell. It is manned as required by staff personnel from warfighting functional cells as selected by the S-3 based on mission variables. The deputy commander or executive officer assigns tasks to other main CP cells and elements concerning requirements or their inputs and contributions necessary for the current operations cell to accomplish its functions.

2-13. The organization of the main CP facilitates work and security, smoothes traffic flow, and takes advantage of cover and concealment. The main CP does not have the organic equipment to conduct mission command on the move, so it must operate in a stationary mode. The main CP, as currently resourced, is 50-percent mobile and requires two lifts to displace with organic transportation assets. The detailed internal staff standing operating procedures (developed by each individual FIB) outline CP configurations and functions of individuals assigned. Flexible configurations accommodate the use of different types of existing buildings found in the AO and losses of equipment. Both temporary and long-term configurations should be planned.

2-14. Functional and integrating cells are not single staff sections. In a sense, they are combined arms staff components manned by personnel from various FIB staff sections.

POSITIONING THE MAIN CP

2-15. The primary considerations in positioning the FIB main CP are communications (higher, lower, and adjacent HQ), maintaining mission command control over subordinate and supporting units, survivability, accessibility and proximity to the supported higher headquarters. The FIB commander determines the best location for the main CP based on the above considerations and any plan for use of the TAC CP. When deployed to an AO, the main CP is normally located in an area that reduces exposure to enemy surveillance and long-range indirect fires. Because of the nature of the FIB mission and the potentially wide dispersion of its units, the main CP cannot move with its subordinate elements. The main CP relies on its ability to communicate both voice and digitally to control its dispersed elements and receive reports. Its communications capability allows it to position anywhere in the division; corps, JTF, or other supported HQ AO and remain in contact with its subordinates and the supported HQ. It will typically locate within two to five kilometers (km) of the division, corps, or other supported command's TAC CP. If the FIB is not assigned an AO, the main CP's position must be coordinated with other brigades for terrain management and security. If the FIB is assigned an AO, the main CP will locate within the FIB AO. Displacements should be planned so that the main CP is stationary during critical phases of the battle. Mission command on the move is an option, but has limitations based on systems' functional capabilities. In many cases, operations on an extended battlefield, and certainly for noncontiguous operations, will cause serious communications challenges that must be factored into the positioning decision. Ultimately the commander determines where to locate the main CP. Options for locating the main CP include —

- With one of the BCTs or supporting brigades of the supported higher HQ. This could be with a maneuver enhancement or sustainment brigade with its HQ located in the division, corps, JTF, or other supported HQ sustainment area.
- With the combat aviation brigade. This allows for dispersed staff and commanders to reach the main CP quicker.

- Within the supported command's sustainment area, in close proximity to a fixed-wing air base. This facilitates coordination and meetings between the TAC CP and main CP, other elements of the division, or other supported or higher HQ including the corps, JTF, theater army, joint force commander, or joint force land component commander (JFLCC).

TACTICAL COMMAND POST

2-16. A tactical command post for the FIB is not supported by doctrine or table of organization and equipment (TOE). Any personnel or equipment used to form a tactical command post must come from the FIB's organic assets. The TAC CP is a facility containing a tailored portion of the FIB HQ designed to control portions of an operation for a limited time. The FIB commander employs the TAC CP as an extension of the main CP to help control the execution of an operation or specific task. It includes only the Soldiers and equipment essential to the tasks assigned. The TAC CP relies on the main CP for planning, detailed analysis, and coordination. The TAC CP might be formed as an alternate CP when the main CP displaces, when the commander must be positioned away from the main CP, or when the mission requires a second CP to control operations. The TAC CP is usually configured as a lean, highly mobile, forward deployed CP or with the same capabilities as the main CP (although in a much more austere form). The TAC CP is capable of mission command for all units assigned, attached, or placed under the operational control or tactical control of the FIB. Usually, or in accordance with commander guidance, the S-3 is normally responsible for the TAC CP. The TAC CP is normally manned by —

- The S-3.
- A current operations officer, normally the assistant S-3.
- An intelligence officer, normally the assistant intelligence staff officer (S-2).
- Selected staff from the intelligence, fire control, operations and counterfire, targeting, fires, air support, inform and influence activities, and air defense airspace management element in the FIB main CP.
- Other staff area representatives from main CP elements as required for a particular operation (for example, selected staff from the sustainment element).

EARLY-ENTRY COMMAND POST

2-17. An early-entry command post is a lead mission command element of a HQ designed to control operations until the remaining portions of the HQ are deployed and operational. It normally includes members of the Main CP and additional planners, intelligence analysts, liaison officers, and others as required. During contingency operations, the FIB may organize its own early-entry CP to provide temporary mission command until a fully functional main CP deploys into the AO. Normally austere, its specific design is driven by METT-TC and may vary from deployment to deployment. The early-entry CP controls all units committed to the current operation, and conducts those critical mission command functions required to support the division, corps, or other supported higher HQ in tactical operations as it initially deploys into an unsecured area.

2-18. To be effective, the early-entry CP is normally sequenced in the deployment to arrive as soon as possible after the initial BCT and the division, corps, or other supported higher HQ early-entry CP and the airhead or beachhead is secure. The early-entry CP coordinates fire support for the current division, corps, JTF, or other supported HQ operation and synchronizes the flow of follow-on FIB subordinate, attached, or supporting units into the AO and phases them into the division, corps, or other supported HQ fight. It also

begins initial planning for the conduct of future operations (branches and sequels). It serves as the FIB's mission command link early in the deployment between FIB organic, assigned, and attached forces on the ground, in the air, and at home station and the higher HQ. It continues this function until the remainder of the FIB mission command systems arrive. Normal doctrinal functions will be transferred to the main CP cells and elements as they arrive and are prepared to assume those functions.

2-19. The early-entry CP is not a permanent or a fixed organization. Each situation or contingency mission may demand different requirements, depending on the specific mission. Each early-entry CP is designed around a basic functional structure of elements representing each of the FIB functional cells as well as elements capable of performing the integrating cell functions for plans and current operations, including sustainment. It is usually the first FIB CP to deploy to a joint operations area and should contain a tailored staff focused on deployment into and employment of forces in the division or other supported command's AO. Including a FIB brigade support battalion (BSB) support operations officer/planner among early-entry CP personnel is critical to ensuring sustainment systems are in place and functioning as FIB units begin to arrive in the joint operations area. The staff should be capable of performing the initial intelligence analysis, execution, adjustment decision making, and problem solving associated with deployment into the operational area and reception, staging, onward movement, and integration.

2-20. When notified to prepare for deployment, the early-entry CP will maintain a higher readiness posture, configuring equipment, and personnel into an early-entry CP package to fit constrained lift, with the other equipment and personnel prepared to follow. While the early entry CP is deploying, the Main CP monitors deployment of subordinate units, controls the deployment of the remainder of the FIB HQ, and coordinates with the gaining division, corps, or controlling joint HQ.

BRIGADE SUPPORT BATTALION COMMAND POST

2-21. The BSB CP has a special role in controlling and coordinating the administrative and logistical support for the FIB. Improvements in communications and information systems mean the FIB is no longer required to operate a sustainment area CP or sustainment cell that is collocated with the BSB CP (that is, assuming communications is uninterrupted between the FIB main CP and the brigade sustainment area). If needed the FIB personnel staff officer (S-1), logistics staff officer (S-4), and surgeon representatives may be positioned in the BSB CP. The BSB CP performs the following functions for the FIB—

- Tracking the current operation so the BSB may anticipate support requirements before units request them.
- Serving as the entry point for units entering the FIB sustainment area in contiguous operations.
- Monitoring main supply routes and controlling sustainment vehicle traffic.
- Coordinating the evacuation of casualties, equipment, and detainees.
- Coordinating movement of personnel killed in action.
- Coordinating with the sustainment brigade for resupply requirements.
- Assisting in operation of a detainee facility or a dislocated civilian collection point.
- Providing representation to the FIB main CP in support of sustainment planning.
- Establishing and maintaining the brigade supply support activity.

SECTION II – COMMAND POST FUNCTIONAL CELLS, ELEMENTS, AND SECTIONS

PERSONNEL SECTION

2-22. Personnel services are those sustainment functions related to Soldiers' welfare, readiness, and quality of life. Personnel services complement logistics by planning for and coordinating efforts that provide and sustain personnel. Personnel services include human resources support, financial management, legal support, religious support, and band support.

2-23. Duties and responsibilities of the S-1 HQ element include—

- Human resources planning and operations.
- Monitoring and reporting human resources-related friendly force information requirements and essential elements of friendly information.
- Develop manning recommendations, priorities and courses of action for the division commander with regard to management of the 13-series career field personnel. Coordinating with the human resources operations center of the sustainment brigade or theater sustainment command for external human resources support.
- Developing the personnel running estimate and assessing the supportability of various courses of action from a human resources perspective.
- Providing FIB staff supervision for S-1 element, Army health system support, legal support, religious support, and enemy prisoner of war and detainee operations.
- Developing input to FIB plans and orders. Directly responsible for preparing, coordinating, or providing input to the personnel running estimate and human resources-related input to Annex F (Sustainment) and Annex J (Inform And Influence Activities) (if required by the commander) with the S-4 and BSB support operations officer and including appropriate input from other staff (for example, the brigade surgeon, judge advocate, and chaplain for Army health system, legal and religious support portions) to FIB plans and orders.

INTELLIGENCE AND TARGETING CELL

2-24. Led by the S-2, the main CP's intelligence and targeting cell provides the FIB commander and staff with intelligence information essential to the operation and survival of the FIB and its subordinate units. The intelligence and targeting cell is focused on executing the intelligence warfighting function including providing intelligence support to targeting for FIB operations. This functional cell contains intelligence, targeting, and topographical information and services elements.

2-25. The *intelligence warfighting function* is the related tasks and systems that facilitate understanding of the operational environment, enemy, terrain, and civil considerations (ADP 3-0). The intelligence and fires warfighting functions have a dynamic relationship. In order for the force commander to bring to bear the maximum combat power from his fire support system upon the enemy, he must have a reliable picture of the disposition of his enemy. He obtains this through organic and reach-back intelligence capabilities. Artillery target intelligence can come from many sources such as the following—

- Direct observation by special operations force, scouts, and forward observers.
- Electronic warfare sources such as the Prophet radio frequency intercept system.

- Human intelligence sources employed by military intelligence tactical human intelligence platoons.
- Weapons-locating radars (for example, AN/TPQ-36, AN/TPQ-37, and AN/TPQ-48 through -50 series).
- Unmanned aircraft systems.
- Higher HQ and joint sources HQ assistant chief of staff, intelligence (G-2) elements.
- Maneuver formations down through the squad level.

2-26. Information feeds from these sources populate intelligence databases. These databases generate target nominations that are digitally transmitted to the Advanced Field Artillery Tactical Data System (AFATDS) for mission processing. Assessment of fires on enemy forces, combat functions, and facilities generates additional intelligence.

INTELLIGENCE ELEMENT

2-27. Duties and responsibilities of the intelligence element and its personnel include—

- Collecting, analyzing, and disseminating combat information. In hostile areas, the intelligence element requires continuous operations.
- Synchronizing available surveillance, reconnaissance, and TA assets.
- Rerouting information on any enemy activity that will adversely affect the FIB, division, corps or other supported HQ mission. Threats to the supported HQ mission include air and ground (direct and indirect) delivered fires, and the use of electronic warfare.
- Performing intelligence preparation of the battlefield (IPB) and preparing in-depth artillery focused IPB products relevant to the FIB AO in coordination with the division or other supported HQ G-2. The FIB IPB is not an independent product. It is an extension of the supported HQ IPB focused on specific fire support and/or artillery related intelligence requirements. The IPB process is a continuous process.
- Performing intelligence support to targeting.
- Developing the enemy order of battle, with emphasis on strike capabilities.
- Performing battlefield damage assessment and requesting battlefield damage assessment reports.
- Assisting the S-3 in subordinate unit positioning to ensure units are deployed in consonance with IPB insights and survivability requirements.
- Controlling the employment of all surveillance, reconnaissance, and TA assets that are organic, assigned, attached, or placed under the operational control of the FIB, to include integrating and synchronizing the employment of these assets with the FIB S-3, division, corps, or other supported HQ plan(s) and with adjacent HQ.
- Developing intelligence products (running estimates/annexes/appendices/templates) and other intelligence input to all FIB plans and orders. Directly responsible for developing and

coordinating ANNEX B (INTELLIGENCE); and providing input to Appendix 3 (Targeting) and to TAB __ (Target Acquisition) to Appendix 4 (Field Artillery Support) to Annex D (Fires), to FIB plans and orders. This includes developing the radar deployment order, radar execution matrices, and ensuring the associated radar deployment order designates positions and establishes cueing procedures.

- Conducting target value analysis to identify potential high-value target (HVT) sets associated with critical enemy functions that could interfere with the friendly COA or that are vital to enemy success.
- Facilitate the development of target selection standards by determining the accuracy of acquisition systems, associated target location error, and the expected dwell times of targets.
- Providing recommendations and input to the FIB's fires cell targeting element (if located in the fires cell) and targeting working group as they develop the high-payoff target list and attack guidance matrix for the FIB commander.
- Monitoring enemy artillery tactics and techniques within the FIB AO and reporting to the FIB and FIB supported HQ fires cell or equivalent staff section/cell/element.
- Exchanging combat information and intelligence with the supported HQ, BCTs, support brigades, FIB subordinate units, reinforcing/reinforced units, and adjacent units as appropriate.
- Providing input for development of a ground and air defense plan to the FIB S-3 and air defense airspace management element of the fires cell.
- Assisting the S-3 with planning, coordination, and conduct of operational security.
- Coordinating external FIB security requirements.
- Supporting the development of the commander's critical information requirements, specifically priority intelligence requirements.
- Conducting predictive analysis of enemy indirect fire locations and anticipated times to fires.
- In coordination with the higher headquarters conduct targeting folders and new analysis of any enemy cells operating in the brigade area.

TARGETING ELEMENT

2-28. Duties and responsibilities of the targeting element and its personnel include—

- Collecting, analyzing, and disseminating combat information. In hostile areas, the intelligence element requires continuous operations.
- Performing intelligence support to targeting.
- Assisting in developing intelligence products (running estimates/annexes/appendices/templates) and other intelligence input to all FIB plans and orders. Directly responsible for developing and coordinating Annex B (Intelligence); and providing input to Appendix 3 (Targeting) and Tab _ (Target Acquisition) to Appendix 4 (Field Artillery Support) to Annex D (Fires), to FIB plans and orders. This includes developing the radar deployment order, radar execution matrices, and

ensuring the associated radar deployment order designates positions and establishes cueing procedures.

- Conducting target value analysis to develop target selection standards, high-value targets, and targeting data based on the FIB commander's high-payoff target list and attack guidance matrix.
- Providing recommendations and input to the FIB's fires cell targeting element (if located in the fires cell) and targeting working group as they develop the high-payoff target list and attack guidance matrix for the FIB commander.
- Providing input for development of a ground and air defense plan to the FIB S-3 and air defense airspace management element of the fires cell.
- Supporting the development of the commander's critical information requirements, specifically priority intelligence requirements.

OPERATIONS AND COUNTERFIRE CELL

2-29. Led by the S-3, the operations and counterfire cell focuses not only on overall execution of both the FIB current operation but directs execution of its counterfire operation as well. The cell also contains a survey element that coordinates for topographical information and services.

2-30. This cell is sufficiently staffed that selected personnel may be forward with the TAC CP when the TAC CP is deployed. As the S-3 may be located in the TAC CP, the operations officer must be postured to assume the lead role if the S-3 is not present in the main CP or if communications with the S-3 is lost.

2-31. The operations and counterfire cell tracks and maintains situational understanding of all FIB assets. Duties and responsibilities of the operations and counterfire cell include—

- Executing fires in support of a division, corps, or other higher HQ current operations (including special operations forces operating in the supported HQ's AO).
- Planning, coordinating, and controlling FIB tactical movements.
- Acting as the supported higher HQ's force field artillery HQ command net control station.
- Monitoring the supported higher HQ's tactical situation.
- Maintaining the common operational picture for the brigade.
- Receiving and disseminating rules of engagement, fire support coordination measures (FSCM), maneuver graphics, and other situational awareness information.
- Providing the intelligence and targeting and fires cells (and other staff as well) data on planned, current, pending, or changing missions.
- Coordinating survey and meteorological requirements.
- Determining logistical support priorities.
- Integrating space assets to support the FIB mission (see FM 3-14).

- Positioning of assigned radars, meteorological sections, and supporting fire support-related units. This includes dissemination, using AFATDS, of the radar deployment order prepared by the FIB S-2. See Appendix G, FM 3-09.12.
- Maintaining and updating subordinate and supported unit information and digital/voice status.
- Monitoring the operation of organic and augmenting TA resources.
- Recommending and coordinating the sectors of search within the FIB (and/or controlling HQ AO) area for radars; recommending critical friendly zones and call for fire zones.
- Ensuring tactical fire control with supporting field artillery and TA assets.
- Integrating digital fires, the networked fires architecture, and tactical standing operating procedures for all FIB organizations.
- Monitoring processing of planned fires in the supported higher HQ fire support plan.
- Coordinating clearance of all fires with units.
- Maintaining and updating the current active no-fire areas list.
- Maintaining digital link to field artillery and TA assets.
- Tracking and maintaining situational understanding of close air support.
- Tracking and maintaining situational understanding of naval surface fire support (NSFS).
- Transmitting fire missions to the battalion fire direction center for processing.
- Requesting assessment reports.
- Ensuring mission-fired reports and artillery target intelligence reports are received and processed.
- Processing fire plans in support of special operations task forces.

2-32. **A fire plan is a tactical plan for using the weapons of a unit or formation so that their fires will be coordinated.**

2-33. The operations and counterfire cell is responsible for coordinating development, publication, and dissemination of all FIB standing operating procedures and plans and orders. The operations and counterfire element is directly responsible to the S-3 for developing and coordinating the following annexes to FIB plans and orders—

- Annex A (Task Organization).
- Annex C (Operations).
- Appendix 10 (Airspace Control) to Annex C (Operations).
- Appendix 1 (Air and Missile Defense) to Annex E (Protection).

- Appendix 6 (Chemical, Biological, Radiological, and Nuclear Defense) to Annex E (Protection) (if required).
- Annex G (Engineer).
- Annex L (Reconnaissance and Surveillance).
- Annex N (Space Operations) (if required).

FIRE CONTROL ELEMENT

2-34. The FIB fire control element controls the delivery of tactical field artillery fires in support of current operations. It provides tactical fire control through automated mission command systems with manual backup and communications equipment.

2-35. Duties and responsibilities of the FIB fires cell's fire control element include—

- Controlling the fires of organic, assigned, and other fires battalions (R, GSR, GS) controlled by the FIB.
- Requesting the attack of targets by nonorganic systems, as required.
- Maintaining the digital fires architecture for all fire support organizations in the FIB and maintaining connectivity with those of the division, corps, JTF, or other supported higher HQ.
- Monitoring and operating fire direction and fire support coordination nets in the FIB.
- Disseminating field artillery targets to appropriate firing elements in coordination with the S-3, FSOs, and reinforcing/reinforced field artillery (as appropriate).
- Using the commander's attack guidance to analyze targets for attack.
- Reviewing the supported higher HQ and FIB commander's attack guidance to ensure they are applied to all fire mission requests. Ensure all brigade elements have the proper guidance and attack criteria entered into digital systems for both current and planned operations. This includes all subordinate battalion fires cells throughout the FIB, which will require close coordination with the supported higher HQ fires cell (or equivalent staff section/cell/element).
- Executing preplanned fires as requested by subordinate battalion fires cells, observers, and reinforced units.
- Coordinating fire mission processing procedures with fires cells, reinforced/reinforcing units, and targeting/intelligence assets as appropriate. This includes digital fire mission routing and AFATDS intervention rules.
- Responding to immediate fire requests in the priority established by the FIB commander's attack criteria.
- Determining registration requirements in coordination with the S-3.
- Providing technical fire direction assistance to subordinate battalion fire direction centers, as required.

- Coordinating for technical fire direction in case of catastrophic loss of the technical fire direction capability of battalion fire direction centers.
- Ensuring that all fire missions comply with current FSCMs.
- Assisting the S-3 in monitoring ammunition expenditures; including ammunition lot management. Recommending changes to attack criteria or other tactical fire direction guidance, as necessary.
- Conducting mutual support operations, as required.
- Establishing and practicing standard procedures for fire control element operations in a degraded mode.
- Ensuring the FIB and subordinate battalions meet the five requirements for accurate predicted fires including accurate target location and size; accurate firing unit locations; updated weapon and ammunition information; valid meteorological information; and accurate computational procedures.

TOPOGRAPHICAL INFORMATION AND SERVICES ELEMENT

2-36. Duties and responsibilities of the topographical information and services element include—

- Supporting FIB IPB by producing the combined obstacle and related terrain analysis overlays.
- Supporting the fires cell and targeting element with analysis of traffic possibilities, routes, choke points, avenues of approach, and obstacles.
- Supporting the intelligence and targeting cell's intelligence and target development elements with visible area infiltration routes, landing zones, drop zones, cover, and concealment analysis for positioning intelligence collectors, and developing long-range surveillance unit target folders.
- Supporting targeting with line-of-sight, mobility, cover and concealment studies, and structural information on man-made targets.
- Providing terrain products to FIB subordinate and supporting units on request.

2-37. For more on topographic information and services see FM 3-34.331, and FM 6-2.

FIRES CELL

2-38. The main CP's fires cell plans, coordinates, synchronizes, and integrates the fires, movement and maneuver, and protection warfighting functions for FIB operations—

- The *fires warfighting function* the related tasks and systems that provide collective and coordinated use of Army indirect fires air and missile defense, and joint fires through the targeting process (ADP 3-0).
- The *movement and maneuver warfighting function* is the related tasks and systems that move and employ forces to achieve a position of relative advantage over the enemy and other threats. (ADP 3-0). Direct fire is inherent in maneuver.

- The *protection warfighting function* is the related tasks and systems that preserve the force so the commander can apply maximum combat power to accomplish the mission (ADP 3-0).

2-39. The FIB fires cell includes an air support, HQ, air defense airspace management, inform and influence activities, and fires elements. Fires cell members often locate in other cells within the command post.

2-40. The operations and counterfire, target processing, and fire control elements form the nucleus of the main CP's current operations integrating cell. Each of the other elements in the fires cell assists these current operations core elements by providing additional expertise or dedicated manpower on an as needed basis. Conversely, the FSO, fires, inform and influence activities, air defense airspace management, air support element, and liaison elements are the fires cell's primary contributors to the FIB main CP's plans integrating cell, when that cell is activated. All elements in the fires cell assist with planning by providing expertise or dedicated manpower on as needed basis.

Note: Depending on mission variables and the desires of the FIB commander, the targeting element may be part of either the fires cell or the intelligence cell. It works well in either place.

AIR SUPPORT ELEMENT

2-41. The fires cell's air support element normally consists of the Air Force tactical air control party (TACP) assigned or attached to the FIB. The TACP's air liaison officer leads the TACP and advises the FIB commander and staff on air support and its effects. He leverages the expertise of his TACP with linkages to the supported higher HQ TACPs to plan, coordinate, synchronize, and execute air support operations. He also maintains situational understanding of the total air support picture.

2-42. Duties and responsibilities of the FIB TACP include planning, coordinating, and directing aerospace support for the FIB. The TACP attached to the FIB is resourced to support FIB operations from both the TAC CP and main CP. When the TAC CP is deployed the TACP essentially splits into two smaller TACPs, one coordinating and executing close air support in the current operation from the TAC CP, and the second assisting the FIB executive officer and staff in planning and coordinating FIB operations from the main CP. TACPs coordinate activities through an Air Force air request net and the advanced airlift notification net. TACP duties and responsibilities include—

- Serving as the Air Force commander's representative, providing advice to the FIB commander and staff on the capabilities, limitations, and employment of air support, airlift, and reconnaissance.
- Providing an Air Force coordination interface with the FIB fires cell, subordinate battalion fires cells, and the air defense airspace management element.
- Assisting in the synchronization of air and surface fires and preparing the air support plan.
- Providing direct liaison for local air defense airspace management activities.
- Integrating into the staff to facilitate planning air support for future operations and advising on the development and evaluation of close air support, air interdiction, reconnaissance, and joint suppression of enemy air defenses programs.
- Providing terminal control for close air support and operating the Air Force air request net.

- Developing input to FIB plans and orders including Appendix 10 (Airspace Control) to Annex C (Operations), Appendix 5 (Air Support) to Annex D (Fires), and Appendix 1 (Air and Missile Defense) to Annex E (Protection) to FIB plans and orders.

2-43. For more on the TACP see joint publication (JP) 3-09.3 and FM 3-56.2.

FIRES CELL HEADQUARTERS ELEMENT

2-44. The fires cell's HQ element supervises selected (normally the fires and inform and influence activities personnel) elements in planning, coordinating, synchronizing, and integrating the use of Army indirect fires and joint fires through the targeting process. This includes synchronizing (with the S-3) physical attack and inform and influence activities against enemy and adversary command and control nodes.

2-45. The FIB fires cell's HQ element may be located either at the main or TAC CP in support of current operations. When at the FIB main CP, the fire support HQ element has a stable mission command environment from which to guide and monitor functioning of the fires and inform and influence activities elements and the interaction of the elements with other FIB CP elements. Collocation of the fires cell HQ element with the commander can be vital for synchronized delivery of fires in support of both FIB operations and those of the supported command. If the command group is deployed, secure long-range voice and digital communications between the fire cell HQ element and the fires cell's fires and influence activities elements must be assured. The fires cell's fires elements and inform and influence activities element must maintain voice and digital connectivity with the command group wherever it is located. When the FSO is at the main CP a deputy or assistant FSO and a fire support noncommissioned officer from the fires element may be provided to the command group to make sure up-to-date fires information is available to the command group by maintaining connectivity with the fires cell. If the FSO is away from the main CP and communication between the fires cell and the FSO is lost, the deputy FSO in the main CP must be postured to assume a lead role in planning. Additionally, if communications with the FSO is lost, the deputy FSO must be postured to assume a lead role in fire support planning, coordination, synchronization, and integration. Duties and responsibilities of the fires cell HQ element include—

- Executing FSO duties and responsibilities described in Chapter 1 of this FM and ATTP 5-0.1.
- Leading the FIB staff in the targeting process to turn the supported commander's intent and desired effects into specific targets, surveillance, and TA tasks, and engagements. This includes: providing targeting guidance (in coordination with the fires cell's operations and counterfire and fire control elements); developing and coordinating planned close air support/air interdiction targets; coordinating and synchronizing the various fire support tasks; and (with the S-3) serving as the primary integrator of fire support for the FIB. See FM 3-60.
- Working closely with fires cell's fires and inform and influence activities elements and the Staff Judge Advocate to ensure FIB operations are consistent with the rules of engagement and international law.
- Providing the FIB staff with immediate access to the operational law expertise they need to provide scalable fires for FIB operations and to a FIB supported HQ in an increasingly complex and legally intensive operating environment.

AIR DEFENSE AIRSPACE MANAGEMENT

2-46. The fires cell's air defense airspace management is designed to work with a division, corps, or theater army airspace control cell and is capable of limited independent operations should the FIB be employed independent of a division, corps, or other higher HQ. The air defense airspace management element is equipped to receive the joint air picture and coordinate digitally directly with the battlefield coordination detachment within the air operations center. The air defense airspace management element implements and disseminates the airspace control order for FIB and below (the fires and/or air support element provides the same function for the air tasking order). The air defense airspace management element also develops and disseminates the FIB's air defense plan and provides the air picture and early warning functions. During the planning process the air defense airspace management element is the principle staff element that plans and coordinates airspace use by indirect surface-to-surface fires, air and missile defense, Army aviation, and unmanned aircraft system (UAS) assets in support of FIB operations. The air defense airspace management element submits air control means requests to the division and corps airspace command and control elements for synchronization, de-confliction, and further processing of airspace control means for inclusion in the airspace control order. If deployed as a separate task force, the FIB may receive additional TACP and theater airlift liaison officers to assist in mission planning for the use of joint assets.

2-47. Duties and responsibilities of the air defense airspace management/brigade aviation element include—

- Planning and requesting immediate airspace control or airspace coordinating measures.
- Deconflicting airspace through the appropriate control authority.
- Controlling airspace use in the FIB AO (if the FIB is assigned an AO).
- Maintaining the air and missile defense and airspace control running estimates.
- Supporting the fires cell airspace control requirements.
- Providing staff support for airspace control.
- Serving as the airspace control point-of-contact for FIB subordinate units.
- Providing future airspace control order/air tasking order requirements.
- Coordinating sensor and tactical digital information link coverage.
- Advising the commander and staff on all air and missile defense-related issues.
- Monitoring current enemy air and missile activities.
- Providing threat early warning.
- Tracking friendly air and missile defense operations including unit positioning, status, coverage fans, sensor plans, changes in the air tasking order, high-priority target lists, airspace control procedures (including airspace coordinating measures), rules of engagement, and number and type of air defense missiles available.

- Coordinating current operations of subordinate air and missile defense forces and passing critical air and missile defense information.
- Ensuring the direction of beyond-line-of-sight/non-line-of-sight air and missile defense fires complies with the joint integrated air defense system.
- Assisting with airspace coordination and execution, focusing on defense readiness conditions, air defense warning and weapon control status.
- Providing and managing linkage to the joint surveillance integration automation project, and managing and developing the common operational picture into situational understanding.
- Synchronizing current operational protection of the third dimension.
- Coordinating FIB current operations with the deputy area air defense commander.
- Providing mission command system integration of air and missile defense functions with the air liaison officer, air support element, and other fires cell elements as needed.
- Providing situational awareness of UAS.
- Planning and coordinating air and missile defense augmentation.
- Developing input to FIB plans and orders. Directly responsible to the S-3 for developing and coordinating Appendix 1 (Air and Missile Defense) to Annex E (Protection) and Appendix 10 (Airspace Control) to Annex C (Operations) to FIB plans and orders.

2-48. For more on airspace control see FM 3-52, FM 3-52.2, and JP 3-52.

INFORM AND INFLUENCE ACTIVITIES ELEMENT

2-49. Under direction of the FSO, the FIB fires cell's inform and influence activities element (in concert with the fires elements) synchronizes the planning of fire support including Army indirect fires and joint fires to support the commander's intent through physical destruction, information and denial, enemy system collapse, and erosion of enemy will.

2-50. The fires cell synchronizes physical attack, electronic warfare, and computer network operations against enemy and adversary mission command. The FIB fires cell's inform and influence activities element is responsible for aspects of scalable fires in support of FIB operations. This includes planning, coordinating, synchronizing, and integrating inform and influence activities and the nonlethal aspects of mission command warfare for FIB operations—

- Cyber electromagnetic activities are part of combined arms operations to seize, retain, and exploit an advantage over adversaries and enemies in both cyberspace and across the electromagnetic spectrum, denying and degrading adversary and enemy use of the same, and protecting friendly mission command networks and systems.
- Inform and influence activities synchronize themes and messages with actions to support operations. Use it to inform domestic audiences and influence foreign friendly, neutral, adversary, and enemy audiences through key leader engagements and other designated venues.

Note: Army forces receive support for computer network operations from combatant commands and Army Service component commands. High-demand, low-density assets provide these capabilities. Army fires cells such as those in the FIB, BCT, division or corps (or other FIB supported command's) coordinate with counterparts in higher echelon organizations (for example, theater army fires cell, battlefield coordination detachment, and electronic warfare coordination center) to obtain needed support.

2-51. Duties and responsibilities of the inform and influence activities element include—

- Coordinating inform and influence activities and electronic warfare for FIB operations. This includes developing information related measures of performance and measures of effectiveness for FIB assessment. Through reach-back, the inform and influence activities element has access to information necessary to enhance situational understanding to support FIB operations and, when necessary, making recommendations for augmentation with selected inform and influence activities and electronic warfare capabilities. Augmentation broadens the range of these assets available to the FIB.

- Working closely with the FIB S-3, FSO, and the fires element (and other FIB staff elements as necessary) to identify inform and influence activities and electronic warfare requirements, focus necessary FIB assets, integrate them into the targeting process, and assess the effectiveness of those activities.

- Coordinating with the division, corps, or other supported higher HQ's inform and influence activities, military information support operations, public affairs, and electronic warfare personnel to ensure FIB inform and influence activities and electronic warfare is synchronized with that of the supported HQ. In the context of decisive action, the manner in which inform and influence activities and electronic warfare operations are planned, coordinated, and executed in concert with the FIB overall mission is crucial to meeting the FIB and supported HQ commander's intent.

- Requesting support for specific inform and influence activities and electronic warfare capabilities from higher HQ. These functions may include electronic attack, electronic warfare support, computer network operations, and psychological operations based on METT-TC factors. The inform and influence activities element integrates and synchronizes these augmentation assets with FIB operations.

- Assisting the intelligence cell's intelligence and targeting elements in analyzing enemy courses of action, identifying high-value targets, and providing input to the intelligence plan.

- Coordinating the execution of nonlethal fire support tasks assigned by the supported higher HQ (including support for special operations forces operating in that higher HQ' AO).

- Conducting mission planning analysis, course of action development, and coordinating production of the scalable fires aspects of the fire support running estimate.

- Developing input to FIB plans and orders. Directly responsible to the FSO and S-3 for developing and coordinating the inform and influence activities and electronic warfare portions of FIB plans and orders.

FIRES ELEMENT

2-52. Under direction of the FSO, the fires cell's fires element (in concert with the information operations element) synchronizes the planning of fire support including Army indirect fires and joint fires to support the commander's intent through physical destruction, inform and influence activities, enemy system collapse, and erosion of enemy will. The requirements for strike, counterfire, or fires in support of shaping operations will be given to the FIB in the form of mission orders. For example, if the division, corps, or other supported higher HQ were conducting an attack to seize an objective or series of objectives, the FIB would likely receive fires tasks to isolate and reduce objectives, disrupt reinforcement, protect flanks, and interdict enemy artillery.

2-53. Duties and responsibilities of the FIB fires cell's fires element include—

- Coordinating with the S-2, intelligence cell, and the targeting element (may be assigned to either the intelligence or fires cell) to integrate fire support targeting requirements into the overall surveillance and collection plans for the division, corps or other supported HQ.
- Assisting the intelligence cell's intelligence and targeting elements in analyzing enemy courses of action, identifying high-value targets, and providing input to the intelligence plan.
- Coordinating the execution of fire support tasks (to achieve both lethal and nonlethal effects) assigned by the supported higher HQ (including support for special operations forces operating in that higher HQ' AO).
- Conducting mission planning analysis, course of action development, and coordinating production of the fire support running estimate.
- Developing input to FIB plans and orders. The fires element is directly responsible to the FSO for developing and coordinating portions of FIB plans and orders that describe the scheme of fires for FIB operations including Annex D (Fires) to FIB plans and orders.
- Developing recommendations (working with the air defense airspace management element and, when provided, the brigade aviation element and TACP) for FSCMs as part of the OPLAN/OPORD development process. This includes recommendations for the division, corps, or other supported higher HQ fire support coordination line (if used), and airspace coordination areas as needed. The recommendations include the measures' location, establishment, duration, movement, and cancellation.
- Synchronizing the OPORDs of subordinate units. Translating the commander's intent into tasks to subordinate units and parameters for automation systems in support of FIB operations.
- Conducting fire support coordination with higher, adjacent, and subordinate unit fires cells.
- Coordinating tactical airspace control within the FIB AO and with higher/adjacent fires cells outside the AO.
- Planning for, requesting, coordinating, and executing joint fires (air, surface, and subsurface) for the brigade.
- Integrating attached or cooperating unified action agencies into fire support operations for the brigade.

LIAISON SECTION

2-54. Duties and responsibilities of the liaison section include—

- Establishing liaison with higher, adjacent, and supported units (as required).
- Exchanging data and coordinating fire support across boundaries, when directed.

PUBLIC AFFAIRS SECTION

2-55. Duties and responsibilities of the public affairs section include—

- Planning, coordinating, integrating, and synchronizing the employment of public affairs in FIB operations. See FM 3-61.1 for more information.
- Working closely with the FIB FSO and the fires cell's fires element and targeting element (if assigned to the fires cell) to identify public affairs requirements, focus necessary FIB assets, integrate public affairs into the targeting process, and assess the effectiveness of those activities. This includes coordinating and de-conflicting efforts of augmentation elements such as public affairs teams and media personnel.

STAFF JUDGE ADVOCATE SECTION

2-56. Duties and responsibilities of the staff judge advocate section include assisting the operations officer by providing international law and operational law assistance, including advice and assistance on implementing the DOD law of war program particularly during the targeting process. See FM 1-04 and ATTP 5-0.1 for additional information on the duties of the staff judge advocate.

SIGNAL SECTION

2-57. The signal section's focus is on those tasks integral to the mission command warfighting function that support and facilitate FIB CP operations and information management. This includes tasks associated with acquiring friendly information, managing relevant information, and directing and leading subordinates. For more on the mission command warfighting function see ADP 3-0, ADP 6-0, and ATTP 5-0.1.

2-58. Both the FIB commander and the mission command system are important in FIB operations. Information systems—including communications systems, intelligence support systems, and computer networks—form the backbone of the commander's mission command system. They allow the FIB commander to lead from anywhere in the FIB AO. The mission command system supports his ability to make informed decisions, delegate authority, and synchronize the warfighting functions. Moreover, the mission command system supports the commander's ability to adjust plans for future operations, even while focusing on the current fight. The staff works within the commander's intent to direct subordinate units and control resource allocations. They also are alert for enemy or friendly situations that require command decisions and advise the commander concerning them. Through mission command, the commander initiates and integrates all systems and warfighting functions toward mission accomplishment.

2-59. The FIB S-4 and signal staff officer (S-6) must coordinate to ensure there are no gaps in the maintenance system for communications security, computers, and other specialized mission command equipment.

2-60. Duties and responsibilities of the signal section include but are not limited to—

- Developing the FIB's tactical information network and associated architecture.
- Advising the S-3 on CP locations based on communications capabilities.
- Assessing FIB mission command vulnerability to enemy and civilian actions.
- Recommending FIB network priorities and constraints needed to accommodate bandwidth limitations.
- Exercising staff coordination with the FIB signal network support company.
- Integrating the FIB's information systems with the warfighter information network.
- Planning and directing communications protocols and user interfaces between the global information grid and the FIB network.
- Managing radio frequency allocations and assignments.
- Developing input to FIB plans and orders. Directly responsible to the S-6 for developing and coordinating the mission command portions of FIB plans and orders including as Paragraph 5: (Command and Signal) and Annex H (Signal) to FIB plans and orders.
- Coordinating communications requirements with adjacent and higher HQ S-6/assistant chief of staff, signal (G-6)/communications system directorate of a joint staff (J-6).
- Integrating the FIB's information systems to create a common operational picture and disseminating the common operational picture.
- Storing relevant information.
- Providing communications security support to the FIB and all attached organizations.
- Communicating with joint, interagency, intergovernmental, and multinational agencies.
- Maintaining selected components of the FIB mission command system.
- Supervising signal-related maintenance.

2-61. For more on information management see ADP 3-0 and ATTP 5-0.1.

SUSTAINMENT (S-4) SECTION

2-62. The FIB logistics section's focus is executing the sustainment warfighting function for FIB operations.

2-63. See FMs 4-0 and 7-15 for more detailed information on the duties and responsibility of the S-4. For more on the relationship between the sustainment and fires warfighting functions see FM 3-09.

2-64. The FIB sustainment section typically collocates with the BSB in the FIB sustainment area. Its positioning is the responsibility of the FIB deputy commander, executive officer, or BSB commander.

2-65. Duties and responsibilities of the sustainment section involve providing FIB staff oversight for execution of sustainment tasks including—

- Maintenance.
- Transportation.
- Supply.
- Field services.
- Distribution management.
- Contracting.
- Explosive ordnance disposal.
- Related general engineering.

2-66. The sustainment section is also responsible for developing input to the sustainment portion of FIB plans and orders. The sustainment cell is directly responsible for developing and coordinating paragraph 4: Sustainment and Annex F (Sustainment) (with the BSB support operations officer for logistics; and the S-1, brigade surgeon, staff judge advocate and chaplain for personnel services, Army health system support, and legal and religious support portions of the paragraph and annex).

MEDICAL PLATOON

2-67. Army health system support is a component of the military health system that is responsible for operational management of health service support and force health protection missions for training, pre-deployment, deployment, and post-deployment operations. Army health system includes all mission support service performed, provided, or arranged by the Army medical department to support health service support and force health protection mission requirements for the Army and as directed, for joint, intergovernmental agencies, coalition, and multinational forces.

2-68. The FIB medical platoon coordinates Army health system support for both health service support and force health protection. It coordinates Army health system support operations with the division or other supported HQ surgeon section and with supporting medical units/elements, as required. The FIB surgeon establishes medical treatment guidelines for FIB subordinate medical treatment elements.

2-69. The duties and responsibilities of the medical platoon include—

- Ensuring timely planning, integration, and synchronization of Army health system support with the FIB operations plan.
- Coordinating for health service support and force health protection augmentation as required, ensuring that all FIB Army health system support requirements are met.

UNIT MINISTRY TEAM

2-70. Duties and responsibilities of the unit ministry team include—

- Providing or performing collective and denominational religious worship services and religious coverage in the operational environment.
- Providing spiritual care and counseling to Soldiers, family members, and authorized Army civilians with spiritual comfort, moral support, and encouragement.

- Advising the commander on issues of religion, ethics, and morale (as affected by religion), including the religious needs of all personnel for whom the commander is responsible.
- Planning, coordinating, and resourcing precise religious support per the mission variables.
- Advising the commander on religious aspects of the local environment.

SECTION III – DIGITAL COMMAND POST OPERATIONS

2-71. The CPs for digitized units will be small, mobile, deployable, and equipped to access, process, and distribute the information and orders needed by their echelon. This section outlines the internal operations of a digital CP. For additional information, see ADP 6-0.

2-72. The digital CP is a collaborative application that enables users to collect, collate, display, map, and analyze data. Users can do this collectively or individually, in real time. It provides planning and mapping tools to support the commander's battle management and by rapidly processing and correlating combat information from all available sources. It provides the FIB commander with an advanced, distributed, collaborative, decisionmaking environment, thus eliminating his need to be at a fixed CP.

2-73. The digital CP depends on the ABCS for most of its data and will continue to depend on ABCS until ABCS is retired and replaced. The primary data server for command post of the future is the CoMotion repository. The server connects to a data bridge that pulls in real-time data from a variety of servers located on external machines. CoMotion receives data related to unit positions map overlays, and more, in a synchronous method.

2-74. The four main digital CP applications are—

- **MapData.** MapData caches imagery and map data locally and feeds into both the CoMotion application and the Command Sight application.
- **CommandSight Application.** CommandSight provides a three-dimensional map-based view of the AO.
- **CoMotion Client.** CoMotion Client is a versatile commander's view into geospatial, temporal, and other forms of data.
- **OpenPhone Voice Over Internet Protocol Client.** This client integrates with the CoMotion Client to provide seamless audio communications across multiple channels.

DATA EXCHANGE

2-75. The manner in which data is exchanged is central to digital CP operations. ABCS systems share information either directly with one another, or with using databases. The joint common database is a database that resides on all the ABCS computers within a CP, and provides data for the common applications that generate the common operational picture. Battlefield information flows dynamically back and forth between ABCS systems and the joint common database. When data is entered through an automated system, this change is forwarded to all ABCS subscribers on the CP's tactical local area network and posted to the common operational picture.

2-76. CPs also exchange data with each other. This exchange enables CPs to maintain the same data in the joint common databases of different CPs. Data generated by each automated system flows to its counterpart

system at adjacent echelons. Each automated system then transfers this information to the joint common database at that echelon. Friendly or “blue” picture position information flows from Force XXI battle command—brigade and below (FBCB2) upward through the FBCB2 system software (embedded battlefield command) on the server located at each echelon. Then this information is deposited into that echelon’s joint common database. This data exchange ensures that all CPs have joint common databases resembling one another. This is essential to creating the common operational picture.

DIGITAL COMMAND POST LAYOUT

2-77. The standardized integrated command post system is the new generation of CP facility systems to support digitized units. The standardized integrated command post system is a mission command enabler, providing the platforms from which to conduct digital CP activities. The standard integrated command post system is designed to facilitate CP operations by providing the flexibility, commonality, and operational capabilities needed to enhance unit mobility and integrate ABCS and associated communication and networking equipment. It supports the integration of these control assets into platforms that can serve as a stand-alone CP or as an integrated element in a larger digitized CP.

2-78. The standard integrated command post system has seven CP variants, including tracked and wheeled vehicle mounted vans, tents, and hard shelters. The digital CP enables collocation of staff sections/cells/elements and supporting communications systems to facilitate both face-to-face interaction and digital data exchange. A typical FIB CP is shown in figure 2-3.

2-79. As with the analog CP, the digital CP's physical setup must facilitate communication and analysis of information, as well as accommodate computer hardwire requirements. Within the digital CP, information is processed at two locations: individual workstations and the combat information center. The focus of the individual workstation is the individual automated system and the specific warfighting function it supports. At his workstation, the staff member inputs and monitors data within his sphere of responsibility. He accesses data posted to web pages and shared files by other staff sections/cells/elements in the local area network and wide area network to carry out his warfighting function and duties. The focus of the combat information center is integrated battle monitoring and decisionmaking. It is a special location within the CP for the display of information. The combat information center is the central area for viewing information in order for the commander and his staff to maintain situational understanding. The large screen display accomplishes this, and is the only area in the CP where all key automated system data can be viewed simultaneously. It is the place where battlefield vision is supported best. The commander uses the combat information center to illustrate his guidance and, with his staff's assistance, to develop and maintain the common operational picture.

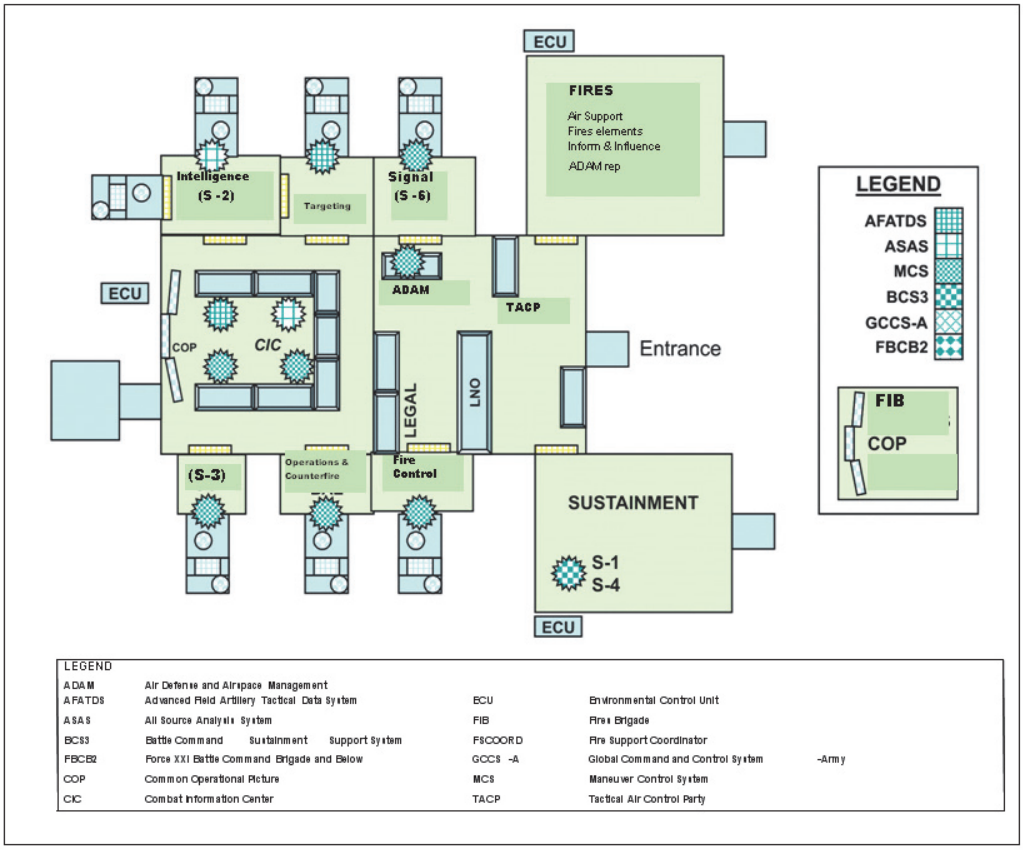

Figure 2-3. Typical fires brigade CP layout (example)

2-80. Combat information centers vary by unit modified tables of organization and equipment. However, the typical combat information center has two or more large screen displays, each capable of displaying nine sub-screens. Each sub-screen can display the common operational picture and can be configured in various ways to best support the commander's information display preferences. The more sub-screens used, the lower the resolution of the image. For this reason, each large screen display screen should use no more than four sub-screens. With two large screen displays, this allows the display of eight sub-screens, which should be sufficient.

COMBAT INFORMATION CENTER DATA DISPLAY MANAGEMENT

2-81. Information management plays a key role in the abilities of commanders and staff to maintain an accurate picture of the battlefield in the combat information center. With feeds from each ABCS system, the combat information center's large screen display enables them to see more of the battlefield and to receive greater amounts of real-time battlefield information from warfighting functions than is available currently with analog systems.

2-82. More information is not necessarily beneficial to mission planning and accomplishment. Data must be filtered, fused, and focused to create meaningful informational displays relevant to the commander's mission. These displays or tactical pictures must be presented in a logical manner on the large screen display to support situational understanding. Electronically stored information is readily available through a minimum number of computer keystrokes and there is less need to print paper copies of the information. However, information saved electronically is often forgotten, once the information is out of the viewer's

sight. Therefore, leaders and staff must know what data is available to them so they can make conscious decisions about what is to be displayed. Though the large screen display has the capability for displaying any automated system electronic data, the narrative and static aspects of some information still lends itself to paper copy posting within the CP. This is especially true for information that is less likely to change during a mission. In turn, this optimizes the use of large screen display sub-screens by freeing them to depict dynamic ABCS digital content.

2-83. The commander, deputy commander, executive officer or S-3, fire support officer, and operations personnel must be able to orchestrate warfighting function coordination through the display of key information on the large screen display. Each staff section/cell/element must maintain information that relates to their warfighting function, using visual graphics that support the common operational picture. To facilitate information control and display, staff sections/cells/elements and their supporting systems should be arranged around the large screen display to facilitate staff interaction, coordination, and information analysis. The common operational picture is displayed on the S-3's maneuver control system (MCS) or MCS-Light large screen display. Common operational picture control and manipulation and CP local area network administration are aided by centrally collocating the CP server and the automated system that projects the common operational picture centrally. The ability to view the large screen display through the automated system controlling the common operational picture facilitates communication and navigation through data. During discussions in the combat information center, personnel can focus staff on key portions of the common operational picture either verbally or with a laser pointer.

2-84. Data is displayed on the large screen display via the common operational picture using the ABCS common operational picture application, or through overlays provided by individual automated systems. Portraying the common operational picture graphically requires METT-TC analysis of information. The common operational picture displays enemy (shown as red feed and graphics), friendly (shown as blue feed and graphics), terrain (shown as characteristics and impact), and civilian considerations (shown as gray feed and graphics). Friendly analysis occurs in the combat information center by all warfighting functional cells and systems. Each automated system provides warfighting function overlays for subsequent data manipulation and consolidated viewing in the form of operational pictures that form the common operational picture. Enemy analysis is especially time sensitive information. This demands ready availability of All Source Analysis System (ASAS) and other systems that are protected from CP traffic flow.

2-85. The MCS whiteboard or electronic whiteboard (also known as "show me") equips leaders and staffs with the capability to conduct collaborative sessions. Participants at distributed locations are linked with audio and view the same enemy and friendly common operational picture on an MCS display. The "telestation" feature of whiteboard enables each participant to use a mouse (with a crayon drawing capability) to depict locations, graphics, and other coordination measures that the participants can view on their screens.

DIGITAL RUNNING ESTIMATES

2-86. Not all key information can be depicted graphically on the large screen display. Therefore, such information must be captured in a readily available, continuously updated format for quick dissemination and assimilation. Each staff section should maintain a running estimate (in narrative form at division and higher, and in graphical form at the FIB and fires battalion). These graphical running estimates correspond to wing board and map data in the analog CP.

2-87. Digitization eliminated the need to post information to wing boards, but it created the need to organize digital data. Units must capitalize on the tactical local area network web pages that each staff

section maintains to organize and post critical mission data. By placing digital running estimates on a web page, each staff section supports the commander and staff's needs to quickly review, update, and use information for battle monitoring and planning. Establishing a standard running estimate format facilitates navigation through the estimate, and cross-referencing between estimates. Running estimates also should list available warfighting function overlays by name. This enables viewers to focus better on graphical review within the ABCS common operational picture application, and to focus all echelons and staff on the same, most current data. Through digitally equipped liaison officers, analog units should access these digital estimates to obtain current operational data and to help synchronize their operations with digital units.

INFORMATION MANAGEMENT

2-88. The staff must be organized to support the information management process of "collect, process, store, display, disseminate, and dispose." Doctrine, tactics, techniques, procedures, and unit standing operating procedures guide this process. The staff must operate according to established procedures that specify access to common automated data systems, common displays, and report formats. The staff must be organized to enable vertical and horizontal flows of information. This organization should provide links between teams within staff sections, between staff sections within a CP, and between CPs at the same, higher, and lower echelons.

2-89. Digitization enables commanders and staff to focus more on the execution of combat operations, and much less on planning, coordination, and processing of information. Commanders and staff will have much more data upon which to base their decisions. Their challenge will be to manage the flow of vast amounts of data so the right information gets to the right person at the right time.

2-90. These five factors are very important when managing data—

- **Relevancy.** Determining the relevant information from the vast amount of data available.
- **Responsibility.** Ensuring that each product is the assigned responsibility of a specific staff section.
- **Accuracy and currency.** Ensuring that data is correct and up to date.
- **Dissemination**. Ensuring that information generated by the staff gets to the right personnel.
- **Evaluation.** Ensuring that information is appropriately assessed.

DISSEMINATION

2-91. Due to bandwidth limitations, it might not be possible routinely to send out products through email. On the other hand, it is insufficient merely to post information to a web site or shared folder, and expect others to use it. With the exception of routine, scheduled postings and updates, staffs must notify users when such changes are made. When a product is posted or revised, staff sections must notify other staff sections and units that are at the same, lower, and higher echelons. This notification must include instructions on precisely where to find the product and its file name. This requires units to establish standing operating procedures that specify file naming conventions and file management procedures. Whether forwarding products or providing notification of product postings in shared files and web pages, it is essential the right personnel receive the right information. Correct address information using the ABCS address books and message handling tables must be established to ensure that data is sent to the correct battlefield automated system. Addressees must be the users employing the individual ABCS system rather

than generic role names in the address book. If this is not done correctly, information on one automated system will not flow to other automated systems, even in the same CP. During initialization, operators also must create and distribute automated data systems that can be operated via messages in the current version of ABCS. This ensures that automated systems are able to share the right kind of information.

EVALUATION

2-92. There is a tendency to accept computer data at absolute face value because it is part of a computer-automated system, and, therefore, assumed to be always correct. Users of digital systems must resist this tendency. Errors can be introduced through failures in automated data and communications systems, human error when inputting data, and failing to update information in a timely manner. Data must be evaluated within the context provided by situational understanding to verify that it is accurate and current. Users must follow up discrepancies to ensure they have the right information.

DIGITAL DUTIES AND RESPONSIBILITIES

2-93. Staff functions as described in ATTP 5-0.1 do not change fundamentally in the digital CP. These functions are carried out differently using the digital tools that ABCS provides. Digitization also requires personnel to perform new functions as listed below. These digital CP post tasks should be conducted in addition to, and as a part of standard staff responsibilities.

COMMANDER

2-94. The commander—

- Provides command guidance for employing ABCS.
- Provides automation resources.
- Establishes automation support priorities.
- Specifies information to be included in the unit's common operational picture.
- Establishes the commander's critical information requirements and ensures they are included in the ABCS.
- Ensures subordinate leaders are trained to employ, operate, and sustain automation.
- Trains subordinate leaders and staff to create, maintain, distribute, and use the common operational picture.

FIB DEPUTY COMMANDER/EXECUTIVE OFFICER

2-95. The deputy commander/executive officer—

- Coordinates the staff to ensure ABCS integration across automated systems.
- Ensures the staff integrates and coordinates its ABCS activities internally, vertically (with higher HQ and subordinate units), and horizontally (with adjacent units).
- Manages the commander's critical information requirements; ensures satisfaction of the commander's critical information requirements.

- Directs the creation and distribution of the common operational picture, including procedures for updating enemy and friendly situational understanding.
- Monitors the information filters, collection plans, and networks that distribute the common operational picture.
- Provides guidance for automation support.
- Coordinates the staff to ensure automation support.
- Supervises the FIB main CP.
- Monitors liaison teams with analog (non-digitized) units and multinational forces for their contribution to the common operational picture.

PERSONNEL STAFF OFFICER

2-96. The S-1—

- Maintains responsibility for human resources functions of the Battle Command Sustainment Support System.
- Employs Battle Command Sustainment Support System to monitor and report on human resources-related functions.
- Deploys and manages the electronic military personnel office (Defense Integrated Military Human Resources System when deployed).

INTELLIGENCE STAFF OFFICER

2-97. The S-2—

- Acts as staff proponent for ASAS and the integrated meteorological system.
- Supervises ASAS and integrated meteorological system operations and support.
- Provides guidance on employment and support of ASAS and integrated meteorological system.
- Supervises the information security program; evaluates security vulnerabilities.
- Assists the S-6 to implement and enforce local area network security policies.
- Provides software application expertise on proponent systems.

OPERATIONS STAFF OFFICER

2-98. The S-3—

- Acts as staff proponent for MCS, AFATDS, air and missile defense workstation (AMDWS), and FBCB2.
- Plans, integrates, and employs ABCS.

- Provides operational and support guidance regarding network employment to subordinate units.
- Maintains overall responsibility for the FBCB2 improved data modem.
- Creates, maintains, and displays the common operational picture; maintains situational understanding of all units.
- Coordinates with S-6 for communications connectivity in support of ABCS.
- Provides software application expertise on proponent systems.
- Assigns liaison officers and coordinates their digital support.

SUSTAINMENT STAFF OFFICER

2-99. The S-4—

- Acts as staff proponent for Battle Command Sustainment Support System.
- Supervises Battle Command Sustainment Support System operations and support.
- Provides guidance on employment and support of Battle Command Sustainment Support System.
- Provides software application expertise on proponent systems.

SIGNAL STAFF OFFICER

2-100. The S-6—

- Serves as signal subject matter expert to the commander; advises the commander and staff on all signal support matters.
- Monitors wide area network performance; integrates the CP local area network.
- Maintains responsibility for all automation information system, automation and network management, and information security.
- Ensures consistency and compatibility of automation systems.
- Develops the ABCS annex for plans and orders.
- Develops ABCS annexes to the garrison and tactical standing operating procedures.
- Plans and monitors operator digital sustainment training.
- Monitors and reports on the status of all automation equipment.
- Manages the networks; is responsible for network employment, network configuration, and network status monitoring and reporting.
- Receives planning worksheets with local area network/wide area network requirements.
- Ensures unit information network connectivity between unit and higher/lower echelons.

- Plans, coordinates, and manages network terminals.
- Develops, modifies, and manages network need lines, unit table of organization and equipment, and automated system configuration files.
- Plans, coordinates, and manages communications links including reach-back communications.
- Coordinates with higher echelon signal officers for additional communications support.
- Develops and coordinates the signal digital support plan.
- Determines system and retransmission requirements for the tactical situation.
- Coordinates with higher, adjacent, and subordinate units to develop the signal digital support plan.
- Manages the release of ABCS software within the unit.
- Provides a focal point for automation support (help desk).
- Implements and enforces local area network security policies (information assurance).
- Establishes communications security accountability, distribution, destruction, and security procedures within the unit.

COMMON OPERATIONAL PICTURE

2-101. A common operational picture is a single display of relevant information within a commander's area of interest tailored to the user's requirements and based on common data and information shared by more than one command. Each automated system provides its own unique view or "picture" of the operational environment which, taken together, comprise the common operational picture. The commander can tailor the components of the common operational picture to fit the tactical situation, key features of the operational environment, and his own requirements for mission command. The common operational picture is continuously updated; as data changes throughout the network, the common operational picture reflects those changes. This enables personnel to "see" the operational environment more accurately and in near real time. Personnel can quickly access and display on a single screen the critical, time-sensitive information, intelligence, and data drawn from the other automated system within the CP, or from higher and lower echelons.

SECTION IV – THE ARMY BATTLE COMMAND SYSTEM

2-102. Information management is the science of using procedures and information systems to collect, process, store, display, disseminate, and protect knowledge products, data, and information.

2-103. The FIB is equipped with the ABCS, which gives the FIB significant advantages in collecting technical information, and distributing information and intelligence rapidly. The ABCS enables commanders to rapidly gain reliable information and, therefore, achieve information dominance in their operational environment. The ABCS satisfies two critical mission command requirements interoperability and situational awareness. The ABCS employs networks that are interoperable with theater, joint, and combined mission command systems.

2-104. The ABCS consists of battlefield automated systems, which comprise the core for ABCS and provide capabilities that support the warfighter's mission needs. Each system aids in planning, coordinating, and executing operations by providing access to, and the passing of information from, a horizontally integrated mission command network. The systems discussed identify those automation systems that may assist the FIB to conduct its mission. The list should not be considered all inclusive. Rapid equipment fielding, particularly of commercial equipment, can make any list invalid based on new technology. Fire support personnel must rapidly adapt to employ the systems issued to their unit.

2-105. The ABCS v6.4 provides a net-centric data management capability on a dedicated server. This ABCS version differs from earlier versions due to the incorporation of the centralized information server. The addition of the ABCS information server to the FIB CP structure enables horizontal information exchange. In addition, the ABCS information server employs a publish-and-subscribe server methodology. The ABCS information server helps the 10 ABCS systems to interoperate as one; thus, ABCS is called a "system-of-systems."

ARMY BATTLE COMMAND SYSTEM OVERVIEW

KEY FIRES BRIGADE MISSION COMMAND SYSTEM

2-106. The FIB uses primary mission command systems. These systems are linked to the global command and control system-Army (GCCS-A), creating seamless connectivity from FIB/BCT to corps. These five mission command systems correspond to the movement and maneuver, fire support, protection, intelligence, and sustainment warfighting functions—

- **Maneuver control system.** The Maneuver Control System (MCS) is usually found in the fires cell's operations and counterfire element.
- **Advanced Field Artillery Tactical Data System.** The AFATDS is usually found in the fires cell's elements.
- **Airspace Workstation.** The Airspace Workstation is found in the Air Defense Airspace Management element.
- **Air and missile defense workstation.** The AMDWS is usually found in the FIB fires cell air defense airspace management element.
- **All-source analysis system**. The ASAS is usually found in the FIB's intelligence cell.
- **Battle command sustainment support system.** The Battle Command Sustainment Support System is usually found in the FIB's sustainment cell.

Maneuver Control System

2-107. The MCS is the commander's/staff's primary tactical planning and execution, monitoring, mission command capability from battalion to corps. The MCS serves as a mission-critical system allowing commanders and staffs to visualize the area of operations and synchronize elements of combat power for successful execution of combat operations. The MCS operator can tailor the applications to display graphically the picture of the battlefield he chooses. A combination of systems automatically feeds data to the MCS to produce the view of the battlefield. These ABCS sources can be local and remote. The MCS is primarily used for creating and sending OPORDs in a CP. It also is equipped with digital collaborative tools that commanders and staffs use to plan future operations and review past operations.

2-108. The Maneuver Control System Gateway is a notebook computer that provides some of the services that are found on a server and has the ability to connect to a server, if needed. The server and the workstation support Army maneuver functions and provide the common operational picture for the rest of the command post.

Advanced Field Artillery Tactical Data System

2-109. The AFATDS provides the Army and Marine Corps the automated fire support command, control, and communications portion of the ABCS. AFATDS capabilities/characteristics include—

- AFATDS is an integrated fire support asset manager that operates as part of a networked tactical data processing system. It provides decision aids and an information system for the control, coordination, and synchronization of all types of fire support means. It uses common hardware/software from the Army tactical mission command system and is utilized from theater army down to platoon. AFATDS interfaces with all of the other ABCS systems via a common operating environment using a combination of database transfer, various message formats (such as joint variable message format and United States message text format), or an ability to print data for distribution.

- AFATDS is also designed to interface with all existing and future fire support systems, other ABCS/Army Tactical mission command systems, other services, allied forces, and joint mission command systems. AFATDS enhances the responsiveness, survivability, and continuity of fire support operations via dispersed processing centers, intelligent remote terminals, and distributed database management.

- AFATDS is capable of interfacing with the other Army tactical mission command system components in message or hard copy format. With MCS, this equates to the transmission of friendly situation reports, battlefield geometry, and free text messages. The interface with ASAS is more extensive and includes the following: mission-fired report, commander's targeting criteria, intelligence summary, artillery intelligence criteria, target coordination request, free text, and target intelligence data report.

- AFATDS automates screening and filtering of potential targets and mission requests, to include target clearance and coordination in accordance with the commander's targeting guidance and attack criteria. Decision aids permit fully automated fire mission processing. For example, AFATDS prioritizes fire missions based on target value analysis and ensures that fire missions comply with FSCMs and unit zones of responsibility. It is also capable of deciding which type of fire support asset should engage a particular target (for example, field artillery, mortars, attack helicopters, naval gunfire, or air) and recommending the best attack method for a given system (for instance, volleys, ammunition type, and firing unit). Although commanders can specify which missions to stop for review/coordination and can resort to voice execution, human intervention is not usually recommended. AFATDS was designed to plan and execute fire support automatically for optimum efficiency.

- AFATDS is composed of a common suite of hardware and software in varying configurations at different operational facilities interconnected by tactical communications. Upgrades to both hardware and software occur periodically, and provide increased capability and performance. Because of this, the FIB must periodically verify the compatibility of their systems with those of the units with which they may operate.

Airspace Workstation

2-110. The Airspace Workstation runs the Tactical Airspace Integration System (TAIS) software which provides a near-real-time air picture for airspace deconfliction including indirect fires trajectories. Airspace deconfliction consists of the following two activities:

- Planning: Where deconflicting planned airspace activities maximizes airspace usage and the application of combat power in a synchronized and safe manner.
- Operations: Where the modification or addition of airspace control measures (ACMs) must occur in near-real-time to support decisive action.

Air and Missile Defense Workstation

2-111. The AMDWS is the mission command component of the air and missile defense planning and control system. It is the staff planning and situational awareness tool used to integrate sensors, air defense fire units, and CPs from the air defense artillery battery echelon to the theater echelon. Air and missile defense planners use AMDWS to display air and missile defense plans, and air situational awareness to ABCS and commanders at all echelons. It also is the air and missile defense planning and control link to joint/allied mission command systems. The AMDWS provides visibility of air breather tracks (for example, aircraft, UAS, cruise missiles), and tactical ballistic missiles (for example, launch point, impact point, and current location).

All Source Analysis System

2-112. The ASAS is the ABCS intelligence fusion system that provides a timely, accurate, and relevant picture of the enemy situation to warfighters. ASAS provides graphic representations of the enemy situation to ABCS. It provides combat leaders all source intelligence to support visualization of the battlefield, and more effectively conduct the land battle. The system capabilities enable the Soldier to collaborate with other systems, process and analyze all source intelligence, support non-structured threat analysis, provide predictive analysis, produce a correlated ground picture, disseminate intelligence products, and provide target nominations. It also supports management of surveillance and reconnaissance assets, intelligence collection, provision of combat intelligence/operations security mission support, and provision of electronic warfare support, and protection. The ASAS interoperates with organic intelligence and electronic warfare sensors; ABCS; joint, theater, and national sensors and preprocessors; as well as other service intelligence processors.

2-113. ASAS-Light provides intelligence processing on a laptop computer. ASAS-Light users (for example, S-2s) are primarily users of preprocessed intelligence information and graphic IPB products received from military intelligence units. The ASAS Light have been engineered to support the warfighter by providing enhanced situational awareness in combat situations as well as office automation and planning capabilities while in a garrison environment. ASAS Light provides tailored software functionality and a communications interface capability to the operational sections and elements of maneuver Battalions, Brigades, and Aviation Squadrons. The ASAS Light system provides operators/analysts with tools to receive and disseminate collateral information, to perform online analysis, and process intelligence products. See TM 11-7010-336-12&P for additional information on the ASAS-Light

2-114. The ASAS-L Intelligence Fusion Station provides units outside the Analysis and Control Element (ACE) with remote capability for automated intelligence collection and management functions. The Intelligence Fusion Station serves as a robust CPU intelligence data base management system and data base replicator for units to operate ASAS Light software. It provides the user with the ability to input, process,

receive, and send near real-time intelligence data, and to manage and replicate the intelligence data base. See TM 11-7010-328-12&P for additional information on the Intelligence Fusion Station.

Note: ASAS will be replaced by the Distributed Common Ground System-Army.

Battle Command Sustainment Support System

2-115. The Battle Command Sustainment Support System is the Army's maneuver sustainment mission command system that provides a concise picture of unit sustainment requirements and support capabilities. It provides a running estimate of evolving logistics situations, including an assessment of current combat power that is essential for warfighters to assess their units' capabilities to complete their mission. The Battle Command Sustainment Support System integrates the logistics common picture as well as in-transit visibility, enabling the warfighter to view material in the logistics pipeline. Ultimately, Battle Command Sustainment Support System will be able to provide automated future combat power assessments, (for example, projecting changes in asset status in 24, 48, and 72-hour representations). As the system can operate on commercial computers, see the appropriate technical manual for the system used.

Force XXI Battle Command Brigade and Below

2-116. FBCB2 is the mobile information system that provides a control capability for units operating at the tactical level. FBCB2 integrates with the ABCS subsystems, and can transmit situational awareness and provide mission command messaging. All Army FIBs have FBCB2. FBCB2 operates using two forms of communication—

- FBCB2-terrestrial uses a radio-based tactical mobile network.
- FBCB2 blue force tracking uses satellite communications.

2-117. FBCB2 is found on platforms down to platoon level and on key leader platforms at battalion and brigade. Current software enables terrestrial and blue force tracking units to share situational awareness. Future software will enable the exchange of some mission command messaging between terrestrial and blue force tracking units.

FBCB2-Terrestrial

2-118. FBCB2-terrestrial is part of the lower tactical internet. It uses the enhanced position location and reporting system (EPLRS), and the single channel ground and air radio system-advanced system improvement program. EPLRS is currently found on all FBCB2 equipped vehicles in the FIB Selected FIBs have EPLRS equipped platforms down to platoon leader and platoon sergeant; wingmen have single channel ground and air radio system-advanced improvement program radios utilizing sub net.

FBCB2-Blue Force Tracking

2-119. FBCB2-blue force tracking uses a light band (L-band) satellite link for communications. FBCB2-blue force tracking shares situational awareness (for example, blue position reports and geospatial reports) with terrestrial units and ABCS systems that use reach back tunnels found in regional operation centers. Currently FBCB2-blue force tracking is not a secret level system and therefore cannot share mission command messaging with ABCS systems. FBCB2 is authorized at FIBs down to platoon leader and platoon sergeant level.

FIRES BRIGADE SUPPORTING MISSION COMMAND SYSTEMS

DIGITAL TOPOGRAPHIC SUPPORT SYSTEM

2-120. The digital topographic support system (DTSS) provides automated support for terrain mapping and analysis, and creation of topographic products within the timeframes required by today's Army. DTSS provides S-3 engineer sections with the capability for geospatial data generation, collection, and management; geospatial information processing, presentation, and analysis; and engineer survey and map reproductions for mission command terrain visualization. DTSS manages the digital topographic database for ABCS. It also can create annotated image maps from scanned or digital imagery.

INTEGRATED METEOROLOGICAL SYSTEM

2-121. The integrated meteorological system is a tactical, automated weather data receiving, processing, and dissemination system. It provides timely weather and environmental effects, forecasts, observations, and decision aid information to warfighting commanders through ABCS. Selected S-2 sections are fielded with integrated meteorological system to provide near-real-time weather data to conduct IPB. Additionally, integrated meteorological system provides information to all ABCS battlefield functional areas.

GLOBAL COMMAND AND CONTROL SYSTEM-ARMY

2-122. The GCCS-A is the interface between the tactical ABCS systems found at FIB/BCT and higher levels. The system architecture links users via the secret internet protocol router network for worldwide communication. GCCS-A provides common operational picture and associated friendly and enemy status information. It also provides force employment planning and execution tools such as receipt of forces, intra-theater planning, readiness, force tracking, onward movement, and execution status. GCCS-A is not usually fielded to the FIB but in contingency operations could be.

MISSION COMMAND PERSONAL COMPUTER

2-123. The mission command personal computer enables staff sections to interface with GCCS-A using a local area network within the CP. It depicts current locations of friendly and enemy units; creates, imports, and exports maps/overlays; and shares overlays and message traffic.

SECTION V – THE FIRES BRIGADE COMMUNICATIONS NETWORK

2-124. The FIB relies on a federation of communications networks that collectively enable mission command. Not all components of the network are under FIB control. The network is a critical tool in FIB operations and must be robust, redundant, flexible, and adaptive to the commander. It is important that all FIB leadership be familiar with the capabilities and limitations of the components of the FIB communications network. The following is a list of those networks that may be encountered at the brigade.

- Combat net radio.
- Blue force tracking.
- Enhanced position locating reporting system.
- Mobile subscriber equipment.
- Joint network node network.

- Trojan SPIRIT.
- Sustainment satellite communications.
- Global broadcast service.

COMBAT NET RADIO

2-125. The FIB uses combat net radios primarily for voice mission command transmission and secondarily for data transmission where other data capabilities do not exist. The combat net radio is primarily designed around the single channel ground and airborne radio system, single-channel tactical satellite and the high frequency radio.

2-126. For more on combat net radio and other tactical radio systems see FM 6-02.43.

SINGLE CHANNEL GROUND AND AIRBORNE RADIO SYSTEM

2-127. The most prevalent radio for the FIB, battalions, and batteries is the single channel ground and air radio system family of radios. Single channel ground and air radio system is used for short-range, secure voice communications. Based upon line of sight, it has a planning range of 35 to 40 kms. Since large terrain features can block line of sight radios, retransmission teams usually are used to ensure coverage of the FIB AO. Single channel ground and air radio system features include—

- Very high frequency; frequency modulation radio system.
- Secure communications by transmitting tactical voice and data, using communications security and frequency hopping technologies.
- Single channel (single frequency) mode for interoperability with older radios.

SINGLE CHANNEL TACTICAL SATELLITE RADIOS

2-128. The use of satellite communications gives the commander the greatest range. It is useful to users separated by long distances, such as rapid deployment forces and special operations units. The single-channel tactical satellite radio transmits in the ultra high frequency/very high frequency/extremely high frequency range, which requires the antenna to have line of sight with the satellite. Their lightness, availability, ease of use, and interoperability with Army digital telephones and cryptographic systems make them valuable for mobile and covert operations spanning the spectrum of military missions. Satellite access time must be requested in advance. This radio has a narrow and wide bandwidth and can transmit data.

Spitfire

2-129. The Spitfire provides battalion CPs with an advanced satellite communication system. The Spitfire is a single-channel, man-portable ultra high frequency satellite communications terminal. The Spitfire provides line of sight communication and has communications security embedded. With the use of the single channel ground and air radio system internet controller, it can support beyond line of sight extension of the tactical internet when operating in a retransmission mode.

Single Channel Anti-Jam Man-Portable Terminal

2-130. The single channel anti-jam man portable terminal provides FIB CPs with a man-portable, secure, anti-jam communications capability. The single channel anti-jam man-portable provides the primary means

for long-range secure communications to the mobile command group during forced entry operations. It operates in stationary mode and can interface with mobile subscribe equipment and combat net radio, single channel anti-jam man-portable transmits and receives low rate data and voice in extremely high frequency band in selectable, point-to-point broadcast modes. It can provide paging capability and range extension for the tactical internet.

Improved High Frequency Radio

2-131. The improved high frequency radio is a modular designed man pack, vehicular-mounted, or fixed station radio operating at 2 to 30 megahertz (MHz). It uses ground and sky-wave propagation paths for medium- to long-range communications. The improved high frequency radio is the primary component of improved high frequency radio sets. A single side band radio operates in either the upper or the lower sideband. When used with appropriate data modems the improved high frequency radio accepts input of voice and data rates up to 2400 bytes per second. The improved high frequency radio passes highly perishable mission command information for medium- to long-range communications (50 to 300 kms).

OTHER TACTICAL RADIOS

2-132. Also found within the brigade are radios that provide the transport layer for situational awareness, multi-band, multi-mode radios capable of diverse missions, and hand held radios used for squad/section operations.

2-133. FBCB2 is a situational awareness system composed of hardware and software, and uses either of the following two methods of communications.

BLUE FORCE TRACKING L-BAND SATELLITE COMMUNICATIONS

2-134. FIBs equipped with FBCB2-blue force tracking use commercial L-Band satellite communications to communicate between platforms. The hub for this satellite data traffic is a regional operations center known as a mission management center.

ENHANCED POSITION LOCATING REPORTING SYSTEM

2-135. FIBs equipped with FBCB2-terrestrial use the enhanced position locating reporting system to provide rapid, jam-resistant, secure data transfer between FBCB2 systems. The enhanced position locating reporting system consists of a digital radio, and a network management capability (such as the net control system or enhanced position locating reporting system network manager), which establishes and controls the network of individual radios. The planning range for ground-to-ground communications is 3-10 kms between radios, depending on power output settings and terrain and 100 kms for line of sight ground to air communications. Enhanced position locating reporting system features include—

- Secure, electronic warfare resistant data communications, primarily in support of ABCS.
- Control digital messaging, providing robust, on the move, high-speed, automated data exchange for FBCB2.
- Near real-time position location and reporting in support of friendly situational understanding.

MULTI-BAND MULTI MODE RADIOS

2-136. Multi-band, multi-mode radios are capable of performing multiple operations from a single package—

- **AN/PRC-117F.** The AN/PRC-117F radio family is a multi-band, multi-mode man-pack radio that covers the entire 30-512 MHz frequency. The PRC-117F provides secure interoperability with single channel ground and air radio system and a host of other tactical radios. It can be configured for man-pack, vehicular and base station applications suitable for operation in a multi-mission service environment. The radio is interoperable with legacy encryption systems, single channel ground and air radio system-advanced improvement program, and HAVE QUICK II/electronic counter/counter measures operation in voice and data modes. It acts as a translator between otherwise incompatible radios.

- **AN/PRC-150 (C).** The AN/PRC-150(C) is a multi-band tactical radio system. An advanced high frequency-single side band/very high frequency/frequency modulation-man pack radio provides reliable, long-range, secure, and tactical communications.

- **HAVE QUICK II.** The AN/VRC-83 (V) 2 ultra high frequency/very high frequency-amplitude modulation HAVE QUICK II radio is used for ground-to-air communications. The AN/VRC-83 provides anti-jam, secure communications links in support of U.S. Air Force and Army missions. This radio provides a means to communicate in the ultra high frequency-amplitude modulation and very high frequency-amplitude modulation single channel modes as well as in the ultra high frequency HAVE QUICK II anti-jam mode.

HAND HELD OR SQUAD RADIOS

2-137. Hand held or squad radios are hand held or body mounted radios normally used by dismounted troops for short range communications—

- **AN/PRC-148 (V) (C).** The AN/PRC-148 (V) (C) is a secure, handheld radio that operates amplitude modulation/frequency modulation in the 30-512 MHz frequency range for use by joint Services reconnaissance and infantry units. The AN/PRC-148 is capable of providing units with a standardized and maintainable hand held radio, which contains embedded Type 1 communications security. It is interoperable with single channel ground and air radio system and HAVE QUICK II in the single channel mode and the electronic counter/counter measures frequency hopping modes.

- **Radio Set F43G.** The F43G handheld radio is a commercial off-the-shelf system purchased by the military. It is a short-range, hand-held, non-militarized radio fielded with a headset and an encryption module. It is employed at the lowest echelon of command, to control squads/teams/sections. The ICOM F43G is a portable ultra high frequency radio that operates in the 38-430 MHz frequency range.

Communications Systems Supporting Battalion and Fires Brigade Command Posts

2-138. The major communications systems supporting CPs are the joint network node (JNN) and mobile subscriber equipment (MSE). There are also dedicated transport systems to support specialized functions such as intelligence (Trojan SPIRIT) and sustainment satellite communications.

JOINT NETWORK NODE

2-139. The joint network node-network suite of equipment is the network enabler fielded to provide timely, network enabled support to tactical modular force design formations. The major components of the JNN transport are the unit hub nodes, which are the primary components of the network service center, the JNN at the division and brigade, and the CP node at battalion. The joint network node-network enables independent operations and direct termination into the theater network, global information grid, or directly into a joint HQ. The joint network node-network has voice and data switching equipment allowing independent operations and enabling both circuit switching and internet protocol based networking. The JNN provides FIB and battalion connectivity to the global information grid primarily through a commercial satellite based architecture. The joint network node-network will also work with existing terrestrial transport line of sight and high capacity line of sight radios, ground mobile forces satellites, tropospheric scatter (AN/TRC-170), secure mobile anti-jam reliable tactical terminal, and commercial Ka-band satellite, when available.

MOBILE SUBSCRIBER EQUIPMENT

2-140. The MSE system is the forerunner of the JNN suite of equipment currently fielded to many FIBs. It is a packet and circuit switched communications system that relies primarily on line of sight links, but can be connected using the ground mobile force satellite network for reach back.

2-141. The MSE consists of node center switches, large extension nodes, small extension nodes, forced entry switches, radio access units, and the necessary line of sight assemblages for network connectivity.

2-142. The MSE system provides both voice and data communications on an automatic basis using a technique called flood-search routing. The system supports both mobile and wire subscribers with a means to exchange mission command information in a dynamic tactical environment. The tactical packet network portion of MSE is a packet switching network that is overlaid on the circuit switching network of MSE. Along with providing data communications, the tactical packet network provides data interoperability with adjacent systems, including commercial networks.

TROJAN SPIRIT II

2-143. The Trojan SPIRIT II (AN/TSQ-190) provides compartmentalized information connectivity to the FIB S-2 and intelligence cell via commercial band satellite. This system consists of secure voice, data, and facsimile, video, and secondary imagery dissemination capabilities. The system receives, displays, and transmits digital imagery, weather and terrain products, templates, graphics, and text between continental U.S. bases and deployed forces.

COMBAT SUSTAINMENT SUPPORT SATELLITE COMMUNICATIONS

2-144. The combat sustainment support satellite communications provides the capability for forward support companies in the FIB to travel with their fires battalions during combat operations, set up at the quick halt, and continue to provide connectivity to joint logistics through all subsequent phases of operations from special operations to redeployment.

2-145. Combat sustainment support satellite communications systems include combat sustainment support very small aperture terminals integrated with wireless combat sustainment support automated information systems interfaces, which provide dedicated communications to the logisticians in the FIB and fires battalion sustainment cells and HQ BSB. This enables sustainment Soldiers in the field to electronically

transmit supply requisitions and receive near real time status reports on their orders, 24-hours-a-day, and 7-days-a-week.

BANDWIDTH OPTIMIZATION

2-146. If leaders take proactive measures, sufficient bandwidth should be available to support necessary staff interaction at all levels. To do this, commanders and staff should take the following measures to optimize bandwidth—

- Commanders should establish clear guidance as to when information is to be sent throughout the network; they must pay particular attention to critical phases of an operation.
- Involve the S-6 closely in all phases of the MDMP to ensure support for information management priorities.
- Send messages and data only to recipients who truly require the information.
- Forward emails with long histories or many attachments only when necessary.
- Enable users to download documents from a file transfer protocol site, server, or website (a "pull" system) instead of sending documents directly to many recipients (a "push" system).
- Use file transfer protocol instead of email when sending large files.
- Compress files or convert them to an application file type that results in a smaller sized file.
- Transmit text via United States message text or joint variable message format whenever appropriate.
- Vary the suspense times for responses if several senders must reply to the same recipient; this prevents a large number of messages from being downloaded at the same time.
- Anticipate times when network activity is lowest and establish report suspenses during these times; avoid establishing suspenses for reports in high usage times.
- Transmit graphics, imagery, and briefing slides only when essential; if text will suffice, use it instead.
- Update information (particularly imagery, such as maps) only as often as is required by the tactical situation.
- Use smaller color palettes (for example, 256 colors) to create graphics.
- Minimize or eliminate animation.
- Consider sending a graphic in sections rather than as a single large image.
- Transmit a graphic in the following priority of formats: .gif, .jpeg, .bmp, or .tiff; if higher clarity of image is necessary, reverse this priority.
- Transmit scanned documents only if necessary; when necessary, first save them as PDF documents and then transmit.

- Keep the recipients to a minimum if a large message must be sent to multiple recipients.
- Minimize the use of sound files. Send .wav files in automated systemic 8- or 11-bit mono format, if possible.
- Display the minimum essential icons by carefully using filters when defining the common operational picture.
- Update the common operational picture using the longest possible time interval appropriate to the tempo and tactical situation.
- Conduct video teleconferencing via high-speed large bandwidth data transport whenever possible; otherwise, quality is severely degraded.
- Do not use web pages with a lot of complexity or illustrations.
- Enforce net discipline; users must remember the tactical internet is for combat operations, and not for personal/non-mission-related communications.
- Establish unit standing operating procedures that economize on bandwidth usage.
- Be brief.

Chapter 3

The Fires Brigade Operations and Integrating Processes

This chapter describes the fires brigade (FIB) operations and integrating processes. Section I begins with a discussion of mission orders. Section II describes the FIB operations process: including the functions of assess, plan, prepare, and execute. Section III describes targeting. Section IV describes intelligence, surveillance, and reconnaissance and target acquisition (TA). Section V is devoted to key continuing activities including information management, fire support coordination, clearance of fires, and airspace command and control. Section VI concludes this chapter by discussing special considerations including joint air attack team (JAAT) operations, suppression of enemy air defenses (SEAD), terrain management, survey, meteorology, and laser management.

SECTION I – MISSION ORDERS FOR THE FIRES BRIGADE

3-1. The FIB receives its tasks in the form of mission orders from the division, corps, or other supported higher headquarters (HQ).

3-2. *Mission orders* are directives that emphasize to subordinates the results to be attained, not how they are achieve them (APD 6-0). A mission order for a FIB includes the following—

- Supported commander's intent and concept of operations.
- Commander's critical information requirements and other information requirements.
- Fire support tasks.
- Priorities for fire support.
- Minimal coordinating instructions.

3-3. The FIB staff performs mission planning, determines what assets can best fill the division, corps, joint task force (JTF) or other supported command's fire support requirements and tasks its subordinate units.

3-4. The FIB can plan for and employ its organic fire support assets and those it receives as attached, under its operational control (OPCON), or tactical control (TACON). The FIB may provide these units mission, tasks, and support relationships as part of field artillery organization for combat and tasks to subordinate units in FIB plans and orders. These may include additional surveillance, reconnaissance, TA, and/or other fire support assets. It also includes ground reconnaissance and surveillance, manned aviation, and additional unmanned aerial assets from division or higher echelons. These assets augment the FIB based on the higher HQ or supported command's mission analysis or the requirements of a particular mission.

3-5. Depending on the size of the division, corps, JTF, or other supported command's area of operations (AO) and the unassigned areas within it, the FIB may not have the resources to provide fire support in all unassigned areas simultaneously such as during forced entry, or parachute/air assault operations. The FIB

focuses its assets in the division, corps, JTF or other supported command's unassigned areas based on the fire support requirements and priorities established by the supported commander.

3-6. The FIB's higher HQ may assign the FIB an AO in order to more clearly focus the FIB's capabilities or to use it in an economy of force role such as during stability operations or defense support of civil authorities.

SECTION II – THE FIRES BRIGADE OPERATIONS PROCESS

3-7. The operations process is a commander-centric activity, informed by the mission command approach to planning, preparing, executing, and assessing military operations (ADP 3-0). The process serves as a template for coordinating other actions associated with an operation. These include integrating processes, continuing activities, and actions specific to each operations process activity. Integrating processes and continuing activities occur throughout an operation. Commanders synchronize them with each other and integrate them into all operations process activities. The integrating processes, continuing activities, and specific actions are related within the operations process as shown in figure 3-1.

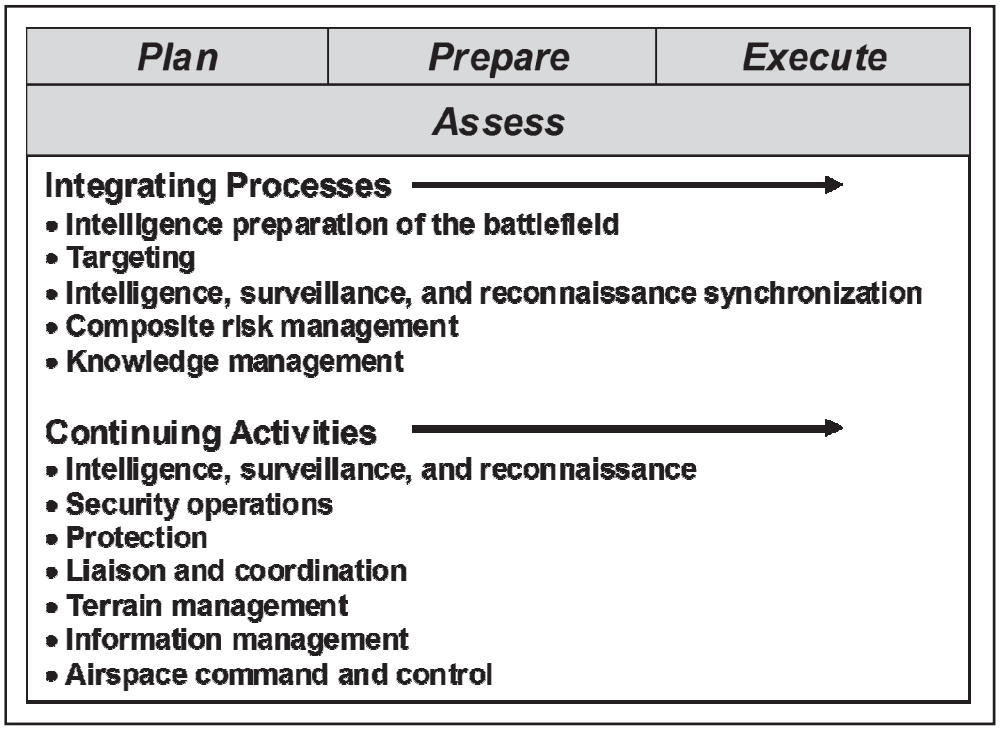

Figure 3-1. Fires brigade operations and integrating processes

PLANNING

OVERVIEW

3-8. Planning is the art and science of understanding a situation, envisioning a desired future, and laying out effective ways of bringing about that future (ADP 3-0). Planning involves envisioning a desired end state and describing the conditions and most effective methods to achieve it. It includes formulating one or more courses of action for accomplishing the mission. The FIB commander and staff consider the

consequences and implications of each course of action. Once the commander selects a course of action, planning continues until the plan or order is published. Planning continues throughout an operation. At minimum, the FIB staff refines plans for branches and sequels throughout an operation.

3-9. Plans forecast but do not predict. A plan is a continuous, evolving framework of anticipated actions that guides subordinates through each phase of the operation. Any plan is a framework from which to adapt, not an exact blueprint. The measure of a good plan is not whether execution transpires as planned, but whether the plan facilities effective action in the face of unforeseen events. Good plans foster initiative, account for uncertainty and friction, and mitigate risk.

3-10. Scope, complexity, and length of planning horizons differ between operational and tactical planning. FIB planners integrate FIB capabilities with those of other support brigades, and with other organizations participating in unified action activities. Comprehensive, continuous, and adaptive planning characterizes successful operations at both the operational and tactical levels.

3-11. The FIB begins planning upon receipt of a mission from its higher HQ (division, corps, JTF, or other supported command). Its primary focus is to provide fire support that meets the requirements and priorities of the higher HQ commander and staff. The FIBs higher HQ must ensure that it allocates the resources the FIB needs to accomplish its missions. Assets assigned to the FIB may include fire support, surveillance, TA, maneuver, manned aviation, ground reconnaissance, civil affairs, sustainment, or other assets from echelons above the FIB.

3-12. To develop plans to accomplish its assigned mission, the FIB follows the seven-step military decisionmaking process (MDMP) outlined in ADP 5-0 and ATTP 5-0.1. Other references give particular insight for the FIB staff including—

- The decide function of the decide, detect, deliver, and assess (D3A) targeting process is part of planning and is summarized briefly later in this chapter. For an in-depth description of the targeting process see FM 3-60.
- FM 3-09 provides insight for field artillery task organization.

MODIFICATIONS

3-13. There are several reasons the FIB commander may modify the MDMP. The following paragraphs present a few of these reasons—

- **Time-Constrained Environment.** In a time-constrained environment, the staff might not be able to conduct a detailed MDMP, and might choose to abbreviate the process as described in ADP 5-0. The abbreviated process still uses all seven steps of the MDMP, but the steps are done in a shortened and less detailed manner.
- **Parallel Planning.** Usually, the MDMP does not begin until receipt of the operation order (OPORD) from higher HQ. However, a change in the situation, anticipation of an order from the higher command or critical information requirements, can lead the commander to require that planning begin based on apparent changes. This is referred to as parallel planning. It is accomplished by issuing warning orders to subordinate units at various stages of the MDMP. These warning orders give subordinate units the information they need to conduct mission analysis.

- **Distributed Planning.** Digital communications and information systems enable members of the same staff to execute the MDMP without being collocated. Distributed planning saves time and increases the accuracy of available information by allowing for the rapid transmission of voice and data information that staffs can use over a wide geographical area.

- **Collaborative Planning.** Collaborative planning is the real time interaction among commanders and staffs at two or more echelons developing plans for a particular operation. The main benefits of collaborative planning come as much from engaging meaningfully in the process as it does from the product itself. While the plan may convey the decision, participating in collaborative planning conveys the context of the decision, as well as an understanding of the available options and the relationships among forces.

FIRE SUPPORT PLANNING GUIDELINES

Useful Checklists

3-14. Due to time constraints, it may not be possible to accomplish all the actions listed in tables 3-1 through 3-4 however, these guidelines should serve as a "road map" for fire support personnel.

Table 3-1. Long range planning

Action	*Responsibility*
Obtain enemy order of battle and develop situation template.	S-3, S-2
Check the attack guidance matrix and update as necessary based on current enemy.	S-3, FSO
Develop field artillery and mortar force ratios to be used in war gaming and planning.	S-3, S-2
Legend S-2 – intelligence staff officer S-3 – operations staff officer FSO – fire support officer	

Table 3-2. Planning for the immediate battle

Action	*Responsibility*
Receive higher headquarters operation order.	Staff, S-3, FSO, and fires cell
Conduct mission analysis.	Staff, S-3, FSO, and fires cell
Identify specified/implied tasks of fire support.	S-3, FSO, and fires cell
Identify intent for maneuver and fire support guidance, including priorities for support.	Commander
Course of action development, war game, and produce the decision support template. Conduct initial targeting working group session to determine high-payoff targets and plan for attack. Decision support template documents include responsibilities for observing named areas of interest, target areas of interest, and decision points. Recommendations for attack of target areas of interest by weapon system and the associated trigger point. Development of fires brigade directed obstacles. Initial development of fires brigade target list and target overlay. Input for the initial fires brigade synchronization matrix.	S-2, S-3, FSO, Air Liaison Officer, Aviation Liaison Officer, and Staff Judge Advocate

Table 3-2. Planning for the immediate battle (cont.)	
Action	***Responsibility***
Formulate commander's attack guidance (based on field artillery attack matrix and target value analysis).	Commander, S-3, FSO, and fires cell
Compute number of field artillery targets available for allocation. Allocate field artillery volleys and targets for planning based on commander's priorities.	S-3, FSO and fires cell, Fires Battalion S-3s
Develop commander's attack criteria from FIB commander's attack guidance and enter it into fire support computer.	S-3, FSO, and fires cell
Develop the fire support execution matrix. Distribute the fire support execution matrix to subordinate battalion fire support officers and to division and corps fires cells.	FSO
Conduct rehearsals. Include as many members of the fire support system as possible: subordinate fires cells, forward observers, fires battalion S-3s, fire direction officers, supported unit mortar platoon leader(s), radar warrant officers, air liaison officers, aviation liaison officers, and others as necessary. If time does not allow for a face-to-face rehearsal, consider using radio (dependent on the existing threat). At a minimum, war game the fire support plan with the S-3, FSO, fires battalion S-3s, and fire direction officers present. The rehearsal should cover— ● Verification of target grids, numbers, and trigger points. ● Positioning of observers. ● Positioning and movement of field artillery and mortars. ● Communication networks and variables. ● Obstacle plan with fire support. ● Use of close air support and attack helicopters. ● Maneuver control measures and fire support coordination measures (FSCM), including field artillery, mortar, and air-delivered weapon risk estimate distances.	Commander, S-3, FSO, fires cell, and Fires Battalion S-3s
Legend S-2 – intelligence staff officer S-3 – operations staff officer FSO – fire support officer	

Table 3-3. Execution planning

Action	***Responsibility***
S-3, FSO, and selected fires cell personnel position themselves where they can best execute the fire support plan (not always with the FIB commander).	S-3, FSO, and fires cell
Communicate with— ● Supported commander. ● Subordinate/higher fires cell. ● Fires battalion fire direction centers and other fire support assets (for example, tactical air control party).	S-3, FSO, and fires cell
Legend S-3 – operations staff officer FSO – fire support officer	

Table 3-4. Provide battle tracking

Action	*Responsibility*
S-3, FSO and fires cell planners should know the location of all maneuver elements to company level (and their future plans for movement). The location of fire support assets to include, at a minimum: supporting radars; supporting mortars, organic and direct support/reinforcing field artillery battalions, and the ammunition status of these assets; subordinate battalion/squadron fires cells; and the division and corps fires cell. The assigned targets and primary/secondary observers within their responsibility. The location of all current and proposed FSCMs.	S-3, FSO, and fires cell
Clear fires rapidly, positively, and safely within their maneuver commander's area of operations. Ensure that the maneuver commander approves clearance.	S-3, FSO, and fires cell
Execute fires in accordance with the next higher HQ fire support execution matrix. Fire support execution matrices should be produced at company level and above.	S-3, FSO, and fires cell
Change priority targets to support the maneuver commander's scheme of maneuver throughout the operation.	S-3, FSO, and fires cell
Legend S-3 – operations staff officer FSO – fire support officer	

Quick Fire Planning

3-15. The S-3, fire support officer (FSO), and fires cell planners must ensure that subordinate fires battalion S-3s, fire direction centers, and supported maneuver battalion/squadron fires cells understand the quick fire plan and how it is used. Quick fire planning techniques constitute an informal fire plan. Quick fire planning differs from deliberate fire planning in that it is normally done for an unanticipated event or operation and may originate as a bottom-up rather than as a top-down process. The S-3, FSO, and fires cell planners are responsible for—

- Identifying targets in the target list to be engaged.
- Allocating all fire support assets available to engage the targets in the plan.
- Preparing the schedule of fires.
- Disseminating the schedule to all appropriate units and staff for execution.

3-16. The quick fire planning sequence begins with receiving the OPORD. The S-3, FSO, and fires cell planners get the following decisions from the commander—

- Targets to be engaged.
- Desired effects on targets.
- Order and timing of target engagement.
- Duration of fires.
- H-hour.
- Priority of fires.
- Priority for targeting.
- Priority for execution.
- Time check.

- Estimated rate of movement.
- Need for target adjustment.
- Concept of the operation, to include objective and defensive positions, maneuver control measures, and obstacles.

3-17. The quick fire sequence continues with the following actions—

- Find out what assets are available for the operation. Concurrently, send a warning order to all attack units and staff. These include the fires battalion S-3s, mortar platoon leader, air liaison officer, naval gunfire liaison officer (NGLO), and aviation liaison officer (if applicable).
- From the fires battalions—obtain the firing units that will be designated to fire in the quick fire plan schedule.
- From the supported maneuver commander—obtain the availability of the mortar platoon (company FSO to battalion FSO for the mortars if a company operation) for inclusion as a firing unit into the schedule of fires.
- From within the FIB fires cell—obtain close air support (CAS) mission information. Coordinate CAS requirements with the air liaison officer (ALO) (for example, aircraft type, ordnance, time on station, laser codes, and control procedures).
- From the order or from the NGLO—obtain the availability of naval aircraft and/or NSFS.
- Evaluate requirements for fire support coordination measures (FSCM) to control and expedite fires, safeguard troops, adhere to rules of engagement, or meet specific commander's guidance. Identify those FSCMs that may be time or event driven. Identify, recommend, and gain approval on FSCMs as appropriate, and initiate necessary coordination and dissemination as soon as possible.
- Plan targets in accordance with the scheme of maneuver, commander's guidance, and allocated assets. This includes assets to use, munitions mix, shell-fuze combinations, duration of fire for each target, and time to fire.

3-18. After receiving the commander's approval, disseminate the fire plan to attack systems, higher HQ fires cells, and those who will implement the plan (FSOs, forward observers [FO], and subordinate battalion/squadron fires cells). Ensure that the subordinate fires cells and/or fire support teams (FIST) understand the fire plan. At a minimum, address—

- Positions or locations of FSOs and/or observers during the conduct of the operation.
- Who is to initiate the fire plan or initiate the fire request on specific on-call targets? Include the agency to be contacted, when the target is to be initiated, and the communications network to be used.
- Which unit has priority of fires or priority targets, if applicable?
- The use of methods of control in modifying the plan should it become necessary during the execution of the plan.
- Any additional FSCMs established to support the quick fire plan.

- The fire support attack elements available when additional targets of opportunity arise during the execution of the plan.
- If time allows, conduct a rehearsal to ensure comprehension of the plan. Inform the commander when the fire support plans are ready. Review the fire support plans and modify them as necessary.

Risk Management

3-19. *Risk management* is the process of identifying and controlling risks arising from operational factors and making decisions that balance risk cost with mission benefits (JP 2-0). Risk management is an integral part of planning, and must take place at all echelons of the FIB during each phase of every operation. Both tactical and accidental risks are always present in all operations. Leaders should never approach risk management with "one size fits all" solutions to the risks that their unit faces. Commanders must manage risks to their forces to accomplish the mission and take care of Soldiers.

3-20. For more on risk management see FM 5-19.

PREPARATION

OVERVIEW

3-21. *Preparation* consists of activities that units perform to improve their ability to execute an operation (ADP 3-0). Preparation creates conditions that improve friendly forces' chances for success. It facilitates and sustains transitions, including those to branches and sequels.

3-22. Preparation requires staff, subordinate units, and Soldier actions. Mission success depends as much on preparation as on planning. Rehearsals help staffs, units, and individuals to better understand their specific role in upcoming operations, practice complicated tasks before execution, and ensure equipment and weapons are properly functioning. Key preparation activities include—

- Plan refinement.
- Surveillance and reconnaissance.
- Rehearsals to include subordinate confirmation briefs and backbriefs.
- Task-organizing.
- Training.
- Troop movements.
- Preparations checks and inspections.
- Sustainment preparations.
- Integrating new Soldiers and units.

3-23. Several preparation activities begin during planning and continue throughout an operation. Many preparation activities continue during execution. Uncommitted forces prepare for identified contingencies

and look to the operation's next phase or branch. Committed units revert to preparation when they reach their objectives, occupy defensive positions, or pass into reserve.

REHEARSALS

3-24. The FIB conducts rehearsals to ensure mission success. Techniques for conducting rehearsals are limited only by the commander's imagination and available resources. Generally, six techniques are used—

- Full-dress.
- Reduced-force.
- Terrain-model.
- Sketch-map.
- Map.
- Network.

3-25. In select circumstances, such as when a missile firing battery has the requirement to respond directly to a FIB on-order fire mission, the FIB HQ may participate in those rehearsals conducted by subordinate units. Generally, four types of rehearsals are used by battery and smaller sized units —

- Backbrief.
- Combined arms rehearsal.
- Support rehearsal.
- Battle drill or standing operating procedure (SOP) rehearsal.

3-26. See ATTP 5-0.1 for additional information on rehearsal types.

3-27. The FIB S-3, FSO, and fires cell planners should participate in the division, corps, JTF, or other supported commander's rehearsal. Rehearsals improve total comprehension of the plan. Participants who are unclear on specific portions of the plan find answers through the repetitiveness afforded by rehearsing the operation. See ATTP 5-0.1 for a detailed discussion of rehearsals.

3-28. Rehearsal procedures should be established as part of the unit SOPs. At a minimum, the standing operating procedures should identify the following—

- Who will participate in the rehearsal?
- What should be rehearsed?
- What is the sequence of the rehearsal?
- What is the priority of the methods for rehearsals (representative or actual terrain, model, map, sand table, wire, or radio)?

3-29. The fire support plan may be rehearsed as part of the division, corps, JTF, or other supported higher HQ rehearsal. All assigned and attached combined arms units that comprise or support the FIB will participate when possible. Normally, the S-3 directs the rehearsal using a synchronization matrix and/or

execution checklist; the FSO should use his fire support execution matrix. The rehearsal is normally executed by reciting and/or performing—

- Actions to occur.
- Possible friendly initiatives.
- Possible reactions to enemy initiatives.
- Control measures.
- Significant events relative to time or phases of the operation.

3-30. For each phase or time period of the operation, the FSO (depending upon mission, enemy, terrain and weather, troops and support available, time available, civil considerations [METT-TC]) should cover the following—

- Verify grid locations for critical targets.
- Verify trigger points for each target, and the target engagement criteria.
- Confirm a primary and backup observer for each target.
- Verify primary and backup communications links for each observer.
- Verify that each target has a task and a purpose (what effects are to be achieved), and that targeting priorities are clearly outlined.
- Verify the method of engagement (for example, at my command, time on target, or when ready).
- Verify that attack guidance, such as unit(s) to fire, shell/fuse combination, and number of volleys, is specified for each target.
- Verify that the movement plan specifies when and where units will move.

Fire Support Rehearsal

3-31. The fire support rehearsal is crucial to mission accomplishment because it ensures that fires are synchronized according to the fire support plan. The fire support rehearsal focuses on maximizing the ability of fire support systems to support the fire support plan, and achieve the commander's intent. Technical fire control issues are not addressed in the fire support rehearsal, but are resolved in subordinate fires battalion rehearsals. The FIB commander, deputy commander, executive officer, S-3, FSO, and subordinate battalion representatives attend the fire support rehearsal. FIB staff officers attending may include the ALO, air defense artillery officer, and airspace management officer, and others as needed. Subordinate units often bring personnel that may include the S-3, FSO, and combat observation and lasing team (COLT) members. The deputy commander or executive officer, assisted by the FSO, usually supervises the rehearsal for the FIB commander.

3-32. The fire support rehearsal should ensure the synchronization of fire support with the operations plan. Time will inevitably be short, so the rehearsal focuses on the critical portions of the plan. The critical document supporting the fire support rehearsal is the fire support execution matrix, which includes all fire support tasks. To conduct the fire support rehearsal, the FIB follows the same procedures outlined in the combined arms rehearsal sequence of events.

3-33. Fire support rehearsals focus on the execution of fire support tasks and on the fire support execution matrix, the effectiveness of fire support coordination measures (FSCM), and the timing and synchronization of all fire support efforts with each other and with the supported command's operations. Fire support rehearsals serve to refine the fire support plan, ensure understanding by all fire support personnel, and prove the feasibility of executing the current plan.

3-34. A fire support rehearsal may include all key maneuver or other supported unit and fire support personnel involved in planning and executing the fire support plan, to include subordinate fires battalion tactical operations centers. The fire support rehearsal may also be limited in scope. Two examples of fire support rehearsals that are limited in scope are one that is focused only on the FIB level fire support participants (such as the fires cell, S-3, FSO, Army aviation liaison officer, and ALO) and one that is centered on the FIB through battery fire support network of fires cells, and, as tasked, FISTs and COLTs.

3-35. A fire support rehearsal may be used to prepare for a combined arms rehearsal. It may be necessary to conduct the rehearsal after a combined arms rehearsal to refine and reinforce key fire support tasks and to ensure fire support covers any changes to the maneuver or other supported unit plan. If a combined arms rehearsal is not conducted, a fire support rehearsal may serve as the primary preparation for execution of the fire support plan.

3-36. Units may use the fire support execution matrix as fire support rehearsal script. Subordinate fires battalions may use their OPORDs as the fire support rehearsal script.

3-37. Alternative friendly courses of action (branches and sequels to the plan) may also be rehearsed, if time permits. Rehearsals may be concluded with a summary of each unit's status (to include firing unit ammunition status) and location. This summary facilitates planning of future operations.

Rehearsal Sequence

3-38. The following rehearsal sequence guidelines can be used to conduct rehearsals. They can be modified as needed and tailored to fit offensive or defensive operations. The sequence begins with—

- Ensuring that all key players are present.
- Orienting participants to the map, sand table, and/or maneuver graphics that will be used for the rehearsal.
- Discussing each event completely and then moving on to the next event (this applies to both an integrated maneuver/fire support rehearsal and a separate fire support rehearsal).
- Identifying the maneuver event.

3-39. The sequence continues with discussion of the supporting fire support action in terms of—

- "Where"—target location.
- "Who"—execution responsibility and communication links (primary, alternate and backup).
- "Why"—purpose.
- "When"—engagement criteria.
- "What"—desired effects (ammunition and shell-fuze combination required to render destruction, neutralization, or suppression or other desired effects).

3-40. The rehearsal sequence ends with a recap of all critical fire support actions by the individual responsible (S-3, FSO, battalion FSOs, attachments)—

- ALO and NGLO recap the critical CAS and naval surface fire support (NSFS) events.
- FSOs verify all applicable frequencies, call signs, and code words.
- Conduct final scrub of target list and fire support execution matrix.
- Exchange information (for example, updated ammunition counts).
- FSOs quickly recap all critical fire support events using the essential task format.

3-41. For additional information on rehearsals, see ATTP 5-0.1.

EXECUTE

OVERVIEW

3-42. *Execution* puts a plan into action by applying combat power to accomplish the mission and using situational understanding to assess progress and make execution and adjustment decisions (ADP 3-0). The FIB can conduct offensive, defensive, and stability operations simultaneously. The degree of emphasis placed on each will vary depending on the situation. The force design of the FIB allows it to conduct the fire support missions necessary to support within the supported higher HQ AO or within the FIB's own AO, either with its organic assets or with augmentation from the division, corps or other higher echelon. The employment of the FIB is described in Chapter 4 of this FM.

RAPID DECISIONMAKING AND SYNCHRONIZATION PROCESS

3-43. The rapid decisionmaking and synchronization process is a decisionmaking and synchronization technique for commanders and staff to use during execution. Two significant differences between the rapid decisionmaking and synchronization process and MDMP are—

- The rapid decisionmaking and synchronization process is based on an existing order. Control mechanisms in the order (commander's intent, concept of operations, and commander's critical information requirements) identify the commander's priorities. Leaders use these priorities as criteria for making decisions.
- The rapid decisionmaking and synchronization process seeks an acceptable solution, while the MDMP seeks the optimal (most desirable) one. Using the rapid decisionmaking and synchronization process lets FIB leaders avoid the time-consuming requirements of developing decision criteria and comparing courses of action. Under the rapid decisionmaking and synchronization process, leaders combine their experience and intuition with situational awareness to quickly reach situational understanding. Based on this, they develop and refine workable courses of action.

3-44. The rapid decisionmaking and synchronization process includes five steps—

- Compare the current situation to the order.
- Determine that a decision, and what type, is required.

- Develop a response.
- Refine and validate the course of action.
- Implement.

3-45. After the analysis is complete, staff members begin synchronization needed to implement the decision. This synchronization involves collaboration with other staff cells and subordinate staffs and among commanders. Once the decision on the course of action is made, the FIB current operations integrating cell issues a fragmentary order directing the implementing actions. It may be written or verbal. If the decision does not affect the overall operation, this directive may be released by the cell chief in the form of an update (after coordination). If time permits, another control mechanism is to verify if subordinates understand critical tasks. Methods for doing this include the confirmation brief and backbrief. This is done both between commanders and within staff elements to ensure mutual understanding.

ASSESS

3-46. *Assessment* is continuously monitoring and evaluating the current situation and the progress of an operation (ADP 3-0). Assessment precedes and guides every activity within the FIB operations process and concludes each FIB operation or phase of an operation. Assessment helps the FIB commander and his staff to adjust operations and resources as required, determine when to execute branches and sequels, and make other critical decisions to ensure current and future operations remain with the mission and desired end state. Assessment criteria include measures of effectiveness and measures of performance—

- **Measure of Effectiveness.** A *measure of effectiveness* is a criterion used to assess changes in system behavior, capability, or operational environment that is tied to measuring the attainment of an end state, achievement of an objective, or creation of an effect (joint publication [JP] 3-0). Measures of effectiveness are criteria that determine whether the FIB is doing the right things or are additional or alternative FIB actions required.
- **Measure of Performance.** A *measure of performance* is a criterion used to assess friendly actions that is tied to measuring task accomplishment (JP 3-0). Measures of performance are criteria that determine whether the FIB is doing things right—for instance a measure of performance might ask "were the FIB's weapons employed as intended on the planned target, and did the expected physical or functional damage occur?"

3-47. The FIB commander and staff determine measures of effectiveness and measures of performance during planning. They consider measures of effectiveness and measures of performance as early as mission analysis, and include them and related guidance in commander and running estimates. The FIB operations staff officer (S-3) and intelligence staff officer (S-2) have overall responsibility for conducting FIB assessment activities.

3-48. For more on assessment see ADP 3-0, FM 3-09, FM 3-60, JP 3-0, JP 3-09, and JP 3-60.

SECTION III – FIRE SUPPORT PLANNING AND THE TARGETING PROCESS

3-49. ATTP 5-0.1 provides detailed information on the MDMP. The purpose of this section is to provide amplifying information for the FIB staff and others who are involved in the fire support planning process. Fire support planning is integrated with and supports the targeting process without establishing separate processes or an additional set of steps. Fire support planning and the targeting process are integrated activities that are mutually supportive.

3-50. Targeting is the process of selecting and prioritizing targets and matching the appropriate response to them, considering operational requirements and capabilities (JP 3-0). The "decide," "detect," "deliver," and "assess" functions of the targeting process are not phased or sequenced in lock step fashion, rather they frequently occur simultaneously throughout planning and execution. For example, based on information received through "detect," "deliver," or "assess" actions, decisions may be reconsidered and revised.

TARGETING PROCESS STEPS

DECIDE

3-51. "Decide" is the first function of the targeting process. It should answer the following questions—

- What targets should be acquired and engaged?
- When and where are the targets likely to be found?
- How long will the target remain once acquired?
- Who or what can locate the targets?
- What accuracy of target location will be required to attack the target?
- What are the priorities for surveillance, reconnaissance and TA objectives and asset allocation?
- What priority intelligence requirements are essential to the targeting effort and how and by when must the information be obtained, processed, and disseminated?
- When, where, how, and in what priority should the targets be engaged?
- What are the measures of performance and measures of effectiveness that determine whether the target has been successfully attacked and the desired effects generated by doing so?
- Who or what can engage the targets, and how should the attack be conducted (for example, number/type of attack elements, and ammunition) to generate intended effects and required assets/ resources based on commander's guidance?
- What or who will obtain assessment or other information required determining the success or failure of each engagement? Who must receive and process that information, how rapidly, and in what format?
- Who has the decisionmaking authority to determine success or failure, and how rapidly must the decision be made and disseminated?
- What actions will be required if an engagement is unsuccessful and who has the authority to direct those actions?

3-52. The "decide" function of the targeting process generally begins with the MDMP as the staff is developing the operation plan (OPLAN)/OPORD. It does not end when the plan/order is completed; it continues by continuously validating previous targeting decisions and making new targeting decisions based on changed circumstances or changed guidance. Based on the commander's concept of the operation, intelligence preparation of the battlefield (IPB) is conducted and the staff prepares the surveillance and reconnaissance plans (if those assets are available to the FIB) and the targeting working group determines

the targets that, if successfully attacked, will contribute to the success of the mission. The targeting working group recommends how each target should be engaged in terms of the degree and duration of the commander's desired effects; constructs a list of high-payoff targets; determines target selection standards; and prepares the attack guidance matrix for the commander's approval. Subsequently the targeting working group prepares a targeting synchronization matrix that includes the high-payoff target list, surveillance, reconnaissance assets (if available), and TA assets tasked to acquire them, attack resources tasked to attack them, desired effects and associated measures of performance and measures of effectiveness for assessment, and the assets tasked to conduct assessment. These targeting process products are briefed to the commander and his decisions translated into the OPLAN/OPORD and subordinate annexes.

DETECT

3-53. "Detect" is the next critical function of the targeting process. It often begins concurrently with decision processes, as key information is required to support the decisionmaking process. The S-2 is the main figure in directing the effort to detect high-payoff targets identified in the decide function of the targeting process The surveillance and reconnaissance plan is a key link between the MDMP and fire support planning and targeting. It links acquisition assets to finding specific enemy formations or required information to answer the commander's critical information requirements. Named areas of interest and target areas of interest are the focal points for the surveillance and reconnaissance plans. Execution of the surveillance and reconnaissance plans begins during preparation and continues throughout execution. Targets and suspected targets are developed by the intelligence and targeting cell and passed to the fires cell for comparison with the attack guidance matrix. Those targets that meet established criteria are passed to appropriate units for attack during execution.

DELIVER

3-54. The "deliver" function occurs primarily during execution, although some inform and influence activities and cyber electromagnetic activities-related targets may be engaged while the FIB is preparing for the overall operation.

3-55. Delivery involves fires, which encompass Army indirect fires, air and missile defense, and joint fires. The integration and synchronization of cyber electromagnetic activities is also a task of the fires warfighting function.

3-56. The S-3, FSO, and the main command post (CP) fires cell orchestrate the deliver function of the targeting process for the FIB.

ASSESS

3-57. The "assess" function of the targeting process occurs throughout the operations process but is most intense during execution. Assessment includes evaluating the operations against measures of performance and measures of effectiveness. Assessment provides a basis for the FIB commander, S-3 and FSO to evaluate the contribution fire support efforts have made towards achieving the desired end state. *Combat assessment* is the determination of the overall effectiveness of force employment during military operations. Combat assessment is composed of three major components: (a) battlefield damage assessment; (b) munitions effectiveness assessment; and (c) reattack recommendation (JP 3-60). Combat assessment typically focuses on determining the results of weapons engagement (with both lethal and nonlethal capabilities), and thus is an important component of Army and joint fires and the targeting process. Battlefield damage assessment determines *what* was done. Munitions effectiveness assessment determines *how* it was done. Reattack recommendation merges the picture of battlefield damage assessment with

munitions effectiveness assessment and compares the result with measures of performance and measures of effectiveness developed during the "decide" function. This assessment continues with a return to the "decide" function.

3-58. *Combat assessment* is the determination of the overall effectiveness of force employment during military operations. Combat assessment is composed of three major components: (a) battlefield damage assessment; (b) munitions effectiveness assessment; and (c) reattack recommendation (JP 3-60). Combat assessment typically focuses on determining the results of weapons engagement (with both lethal and nonlethal capabilities), and thus is an important component of Army and joint fires and the targeting process. Battlefield damage assessment determines *what* was done. Munitions effectiveness assessment determines how it was done. Reattack recommendation merges the picture of battlefield damage assessment with munitions effectiveness assessment and compares the result with measures of performance and measures of effectiveness developed during the decide function. This assessment continues with a return to the "decide" phase.

CONTINUOUS REFINEMENT

3-59. Targeting is continuously refined and adjusted during targeting working group sessions, update briefings, and during discussions between commanders and staff as the operation unfolds. The targeting process is cyclical. The command's battle rhythm determines the frequency of targeting working group sessions.

3-60. The result of fire support planning is an effective, integrated, executable fire support plan. An effective fire support plan clearly defines fire support requirements and focuses on achieving the FIB commander's desired effects. An effective fire support plan uses all available acquisition and attack assets and puts the best combination of fire support assets against high-payoff targets s to generate effects that support the division, corps or other supported higher HQ's commander's and the FIB commander's intent. An integrated fire support plan provides the focus and timing for acquisition and attack systems in attacking high-payoff targets to generate effects at the point in time and space needed to support the concept of operation. An integrated fire support plan coordinates and combines with maneuver and other warfighting functions to maximize the results of each attack in generating desired effects. An executable fire support plan ties detect and deliver assets to the high-payoff targets and includes subsequent assessment.

3-61. For an in-depth description of the targeting process see FM 3-60.

THE TARGETING WORKING GROUP/TARGETING BOARD

3-62. A *working group* is a grouping of predetermined staff representatives who meet to provide analysis, coordinate, and provide recommendations for a particular purpose or function (ATTP 5-0.1). The targeting working group is critical to facilitating the targeting process and integrating targeting with FIB and division, corps, JTF or other supported higher HQ operations. The purpose of the targeting working group is to focus and synchronize the FIB with division, corps, JTF or other supported higher HQ combat power and resources towards finding, attacking, and assessing current high-payoff targets by using the D3A targeting process methodology. Targeting working group success requires focus, participation by all warfighting functional representatives, preparation by all participants, and the rapid development and dissemination of required products. The targeting working group—

- Verifies and updates the high-payoff target list.
- Verifies updates, and re-tasks available collection assets for each high-payoff target.

- Recommends delivery systems to engage each target.
- Confirms that assets have been tasked to assess whether the desired effects have been generated by attacking the target.
- Identifies target nominations for attack by division, corps or joint assets.
- Synchronizes lethal and nonlethal actions (to include cyber electromagnetic activities and inform and influence activities).
- Synchronizes fire support, cyber electromagnetic activities, and inform and influence activities assets to generate desired lethal and nonlethal effects.

3-63. The targeting board is a temporary grouping of selected staff representatives with delegated decision authority to provide targeting decision recommendations for command approval. When the process or activity being synchronized requires command approval, a board is the appropriate forum. The targeting board is usually chaired by the deputy commander or executive officer.

SECTION IV – SURVEILLANCE, RECONNAISSANCE, AND TARGET ACQUISITION

SURVEILLANCE AND RECONNAISSANCE

3-64. *Surveillance* is the systematic observation of aerospace, surface, or subsurface areas, places, persons, or things, by visual, aural, electronic, photographic, or other means (JP 3-0). *Reconnaissance* is a mission undertaken to obtain, by visual observation or other detection methods, information about the activities and resources of an enemy or adversary, or to secure data concerning the meteorological, hydrographic, or geographic characteristics of a particular area (JP 2-0).

3-65. Without augmentation, the FIB lacks the capability to conduct either surveillance or reconnaissance activities to support its fires mission. Rather the FIB relies on information from the supported command HQ. If surveillance or reconnaissance assets are provided to and controlled by the FIB, the FIB employs those assets in accordance with doctrine found in publications such as FM 2-19.4. Surveillance and reconnaissance operations allow the FIB to produce intelligence on the enemy and environment (to include weather, terrain, and civil considerations) necessary to make decisions. The commander integrates surveillance and reconnaissance assets (if available) with TA radar assets to capitalize on their different capabilities. He synchronizes reconnaissance and surveillance capabilities with the FIB concept of operations and the fire support plan of a supported higher HQ. The commander drives the FIB intelligence warfighting function to provide critical support to all operations, including fire support and inform and influence activities. The intelligence warfighting function supports planning, decisionmaking, targeting, and protecting the force. It is a continuous process.

3-66. Surveillance and reconnaissance operations, and TA radars are the primary means of collecting information used to produce intelligence. A thorough understanding of joint surveillance and reconnaissance capabilities allows the commander to issue necessary guidance to the S-2 to prepare surveillance and reconnaissance plans. Surveillance, reconnaissance, and TA assets focus primarily on collecting information about the enemy and the environment to satisfy the priority intelligence requirements. In the end, the art of intelligence and its focus on supporting the commander are more important than any information system. This art includes an understanding of intelligence, analysis, the enemy, operations, and the commander's needs.

3-67. *Intelligence preparation of the battlefield* is a systematic process of analyzing and visualizing the portions of the mission variables of threat/adversary, terrain, weather, and civil considerations in a specific area of interest and for a specific mission. By applying intelligence preparation of the battlefield, commanders gain the information necessary to selectively apply and maximize operational effectiveness at critical points in time and space (FM 2-01.3). IPB is designed to support the staff estimate and MDMP. Most intelligence requirements are generated by the IPB process and its interrelation with the decisionmaking process. The FIB commander drives IPB; his entire staff participates with the intelligence staff in continuous updates. Staff officers develop, validate, and maintain IPB components that relate to their area of expertise. For more on IPB, see FM 2-01.3.

TARGET ACQUISITION

3-68. *Target acquisition* is the detection, identification, and location of a target in sufficient detail to permit the effective employment of weapons (JP 3-60). The goal of the FIB TA effort is to provide timely and accurate information to enhance the attack of specified targets. TA systems and equipment perform the key tasks of target detection, location, tracking, identification, classification, and battlefield damage assessment for fire support operations. Due to the lack of organic surveillance and reconnaissance assets, the FIB typically relies on external agencies for battlefield damage assessment.

3-69. Sound tactical planning is required to effectively cover the FIB AO with TA assets. FIB TA planning is an integral part of the MDMP process. This ensures TA assets are fully integrated into FIB support of combined arms operations.

3-70. The S-2 and main CP fires cell figure prominently in this surveillance, reconnaissance and TA architecture as principal conduits for the long-range capability to acquire and attack targets throughout the FIB and/or supported HQ AO. The S-2, with the aid of the intelligence cell and the fires cell elements in the main CP assesses intelligence reports and information that the FIB intelligence cell has fused to develop the common operational picture and feed the targeting process. The FIB uses this enemy artillery focused intelligence in the development and execution of the counterfire program.

3-71. For more on field artillery TA see FM 3-09.12.

TARGET ACQUISITION RADARS

Overview

3-72. The TA platoon of the TAB contains both AN/TPQ-37 and AN/TPQ-48-50-series radars. The TA platoon provides the supported unit with target intelligence and information based on acquisitions from threat mortar, artillery, and rocket systems to facilitate protection measures and enable counterfire mission processing. This platoon can also support adjust fire and register mortars and artillery. This organization is capable of supporting FIB TA requirements. The TA platoon or individual radar sections may be augmented with additional assets to create a tailored force package based on the tactical situation. In a deployed status, the FIB normally will control the employment of the TA platoon and any additional supporting counterfire radars and systems supporting the FIB mission.

3-73. The primary mission of the AN/TPQ-37 radar is to detect and locate enemy mortars, artillery, and rockets quickly and accurately enough to permit immediate engagement. The Q-37 is optimized to locate longer-range, low-angle, higher velocity weapons such as long-range artillery and rockets. However, it will also locate short-range, high-angle, lower velocity weapons as well. The Q-37 has a minimum range of three km and a maximum range of 50 km. For artillery, the higher probability of detection extends out to approximately 30 km.

3-74. The primary mission of the AN/TPQ-48-50-series radar is to detect, locate, and report enemy indirect mortar fires to enable protection. The systems must provide an accurate location to the origin of the fires. As a follow on to this mission, an impact prediction is required to facilitate situational awareness of enemy fires and will be included in the target report. The system provides 360-degree detection and location of firing weapons at ranges from 500 meters to 10 km.

3-75. For more on field artillery TA radars and their employment see FM 3-09.12.

Radar Employment

3-76. When the FIB is part of division, corps, JTF or other supported unit—

- The FIB TA assets must be integrated into the fires planning process and the MDMP if TA assets are to be effectively employed. TA planning starts when the mission is received and continues throughout the entire D3A process. The targeting officer must be focused on the requirements for TA systems throughout this process.
- The supported command's FSO, fires cell/element planners, and the FIB commander recommend an organization for combat for the supported command's radar assets to meet the supported commander's requirements and the FIB's mission.

3-77. Mission command methodologies in such circumstances include but are not limited to centralized control, decentralized control and a combination of centralized and decentralized control.

Centralized control at the FIB

3-78. TA assets may be held under the centralized control of the FIB specifically with the brigade commander. Centralized control (the FIB plans the entire radar coverage plan for the division or other supported command) optimizes coverage to support the commander's intent. When the FIB has control of all TA assets for the supported command, the organic BCT fires battalion should provide the target processing element from their TAB with its associated equipment to the BCT fires cells. BCT fires cells do not have sufficient quick reaction organic target processing elements and thus do not have target processing capability without augmentation. The fire direction center of the fires battalion has this capability. Regardless of which HQ exercises control, FIB subordinate or BCT organic fires battalions may be tasked to provide logistical, survey, and security support because of the dispersal of radars across the BCT AO. Under FIB centralized control, the FIB S-2, S-3 and operations and counterfire, target processing and fire control elements in the FIB main CP work with the FIB subordinate and BCT organic fires battalion S-2s and targeting officers and fires battalion operations center personnel to—

- Designate a general position area, sector of search, and zones for each of the radars.
- Establish cueing guidance.
- Designate cueing agents.
- Control radar movement.
- Designates who receives radar targets.

Decentralized Control

3-79. Decentralized control can be accomplished by attaching radars to a FIB subordinate battalion or possibly fires battalion batteries and leaving the BCT organic fires battalion radars within those battalions.

Under decentralized control, TA assets are provided to subordinate units for their direct control and employment. When attached, the radar is considered an integral part of the support package to the battalion. Fires battalion S-2s, in conjunction with targeting officers, control the radar executing the same responsibilities as the FIB S-2, S-3, and target processing and fire control elements. The FIB S-3 and S-2 coordinate mission requirements and priorities with the fires battalion S-2 based on the FIB, division or other higher HQ commander's guidance and intent.

A Combination of Centralized and Decentralized Control

3-80. Any combination of centralized and decentralized OPCON of radars may be used according to the situation. For example, one of the FIB's Q-37 radars may be placed under the control of a reinforcing Multiple Launch Rocket System battalion or other fire unit from the division or corps based on mission requirements and the tactical situation, while the remaining Q-37 radars are kept under control of the FIB.

3-81. Although the FIB has organic radars, the division or other higher HQ may task a BCT to cover division and corps target areas of interest within the BCT AO with BCT surveillance, reconnaissance and TA assets, including the BCT's organic fires battalion's radars.

3-82. Reinforcing units from a FIB may or may not require both TA assets and additional processing capability to perform counterfire effectively. The BCT fires battalion must ensure the reinforcing FIB unit has adequate personnel and materiel resources to accomplish any counterfire mission assigned. The FIB TAB target processing section should go with the radar assets to the FIB reinforcing unit assigned a counterfire mission for control and employment expertise. Closely linked to BCT maneuver through the fires cell, the FSO, and organic fires battalion S-3 must provide and coordinate the following for the reinforcing FIB unit—

- Commander's guidance for counterfire, to include required search zones and cueing guidance.
- Intelligence support from division and corps or other supported HQ controlled assets. Counterfire targets from military intelligence battalion assets, FIB artillery target intelligence files, and those of higher HQ must be expeditiously forwarded to the BCT fires cells and organic fires battalions.
- Terrain management to include position areas for BCT field artillery and acquisition assets forward in the division, corps, or other supported command's AO.
- Traffic and movement priorities for units and ammunition.
- Ammunition forecasts and other sustainment requirements.
- Survey and meteorological support for BCT field artillery units.

3-83. An automated (digital) capability must be provided to non-automated multinational field artillery brigades to maximize communications with Firefinder radars and the BCT organic fires battalion. If available, the BCT organic fires battalion should provide adequate AFATDS devices with operators to the supporting FIB.

SECTION V – KEY CONTINUING ACTIVITIES

FIRE SUPPORT COORDINATION

3-84. *Fire support coordination* is the planning and executing of fire so that targets are adequately covered by a suitable weapon or group of weapons (JP 3-09). Fire support requires significant coordination. When conducting fire support missions in the unassigned areas of the division, corps, or other supported command's AO, most FIB activities either originate from or take place in another brigade's AO. Artillery and UAS under the FIB control may pass through the airspace of multiple brigades. FIB operations in or near a brigade AO must be coordinated with the affected brigade before the FIB moves into or through the affected brigade AO. For FIB units operating in another brigade's AO, this includes where the FIB can be positioned to accomplish its mission effectively without impeding the mission of the brigade controlling the AO. Those brigades need to know what units that are not directly under their control are operating in their AO. Those brigades also need to know which units are operating adjacent to their AO, especially in a noncontiguous environment. Area support for FIBs and their subordinate units must be coordinated before execution. This support includes, but is not limited to, Class I, III, and V resupply, maintenance, vehicle and personnel recovery, and medical evacuation. FIB units operating near a brigade AO are responsible for their own security. For those FIB units operating within another brigade's AO, security is the responsibility of that brigade, but it must be coordinated. If the FIB must fire from or be given control of a UAS from another brigade's AO, the launch and recovery site and airspace management must be coordinated. UAS may be required to pass through multiple brigades to reach their specified named areas of interest. Passage of the unmanned aircraft must be coordinated not only to deconflict aircraft controlling frequencies, but also to ensure that two aircraft do not attempt to occupy the same space at the same time. Reporting procedures used by the FIB and its subordinate units operating in or near another brigade are also critical. The FIB subordinate units must know and understand what information is critical and how to report it to both the FIB and the affected brigade.

3-85. The FIB must also coordinate with the division, corps, JTF, or other supported command and other brigades that may operate in the supported command's unassigned areas (for example, a battlefield surveillance brigade, combat aviation brigade, or special operations forces). The positioning of units, flight plans of both manned and unmanned aircraft, and targets must all be deconflicted. This helps clear fires, prevents compromise of surveillance and reconnaissance assets, and limits fratricide. In addition to United States military units, coordination should be made with other government agencies and nongovernmental agencies that may operate in unassigned areas. This serves to enhance the exchange of information and prevents a conflict between the FIB and the other agencies.

3-86. Fire support coordination ensures the synchronization of delivery assets to match the right attack means with the correct target to deliver the commander's desired effects at the precise time and location needed to support FIB and division, corps or other supported higher HQ operation. To achieve the best possible synchronization of all fire support, the following guidelines for coordination are recommended—

- Position fire delivery units effectively.
- Coordinate use of NSFS and planned and immediate CAS to support the commander's intent and concept of operations.
- Ensure that FSOs and observers know the exact locations of maneuver boundaries and other FSCMs.

- Position observers in redundancy where they can see their assigned targets and trigger points, communicate with fire support assets, and respond to maneuver commander.
- Establish field artillery final protective fires and priority targets.
- Plan field artillery illumination to facilitate direct fire during limited visibility.
- Depending upon METT-TC, provide common survey and meteorological data for units attached to or under the OPCON or TACON of the FIB or FIB supported units for which the FIB is acting as force field artillery HQ.
- Use the fire support execution matrix to execute fire support and remain flexible to branches or sequels to the current plan.
- Coordinate with the fires battalion tactical operations centers to develop the attack guidance matrix using the munitions effects database in AFATDS. Compute ammunition requirements needed for generating desired effects via the attack of expected enemy target categories with fire support. Provide this assessment to the commander so that he can formulate his attack guidance. Also, compute ammunition requirements and identify issues that require the FIB commander's attention or additional guidance, such as fire support-related essential tasks that may be unsupportable.
- Disseminate target priorities to the FIB staff and through to the lowest levels of subordinate fire support organizations and supported maneuver unit mortars.
- Develop and disseminate field artillery-delivered scatterable mine safety boxes in coordination with the FIB and supported higher HQ engineer and S-3/assistant chief of staff, operations officer (G-3).
- State the FIB and supported higher HQ commander's attack guidance by defining "how (the system(s) identified to engage the target)" "when," and with what restrictions the commander wants to attack different targets and identify the targeting priorities. The data should be entered into the AFATDS database.
- Require refinement by lower echelons to be completed by an established cut-off time.
- Verify or correct target locations and trigger points during refinement.
- Recommend the risk the FIB and the supported higher HQ commander should be willing to accept concerning delivery of indirect fires for maneuver units in close contact. Calculate risk-estimate distances.
- Consider limiting the number of targets to 10 to 15 per each FIB supported battalion, with no more than 45 to 60 for each fires battalion within the FIB.
- Use the fire support execution matrix to brief the fire support portion of the OPORD during a combined arms rehearsal.
- Rehearse the fire support portion of the OPORD directly from the fire support execution matrix.
- For units attached to or under the OPCON or TACON of the FIB or supported by the FIB, conduct rehearsals with the actual Soldiers who will execute fire support tasks.

- Ensure methods for battle tracking and clearance of indirect fires are clearly understood by fires cells and maneuver commanders.

- Verify the range of Q-36, Q-37 and Q-48-50 series radars (includes those of units attached to or under the OPCON or TACON of the FIB or FIB supported units for which the FIB is acting as force field artillery HQ), field artillery, and mortar coverage based on the effects desired and appropriate shell/fuze combinations.

- Prioritize requirements for Q-36, Q-37 and Q-48 radars (includes those of units attached to the FIB or FIB supported units for which the FIB is acting as force field artillery HQ) and allocate radar zones to reflect the developed situation template, protection priorities, and the scheme of maneuver. Insure radar zones are within the coverage and trajectory arc of the radar systems (radars will allocate zones to the main effort and, based on location, this can violate the "three on a beam rule"). For details, see FM 3-09.12.

- Explain fire support combat power in terms of the required effects to be generated for the operation. The supported maneuver commander then better understands fire support contributions to the course of action and scheme of maneuver. Useful information may also include the number and type of missions available/possible. Subordinate fires units should be able inform their supported commander of battery/battalion/mortar volleys available by the type of ammunition and the effects expected; minutes of smoke and/or illumination available and allocation; number of available family of scatterable mines by type, size, density, and safety zone; and other information depending upon METT-TC.

CLEARANCE OF FIRES

3-87. *Clearance of fires* is the process of approving or obtaining approval to attack targets with fires within and outside the boundaries of the supported unit for which the fires are provided (FM 3-09). The FIB commander is responsible for the clearance of fires within his assigned AO or as directed by the FIB supported commander. Clearance of fires ensures fires will attack enemy capabilities without resulting in casualties to friendly forces and noncombatants. Within his own AO, the FIB commander establishes all appropriate FSCMs. There are three exceptions—

- The FIB may not use munitions within its own AO without receiving appropriate clearance if the effects of those munitions extend beyond its AO. For example, if the FIB wants to use smoke, its effects cannot cross boundaries into another AO unless cleared with the affected adjacent unit.

- Higher HQ may explicitly restrict the use of certain munitions, such as long-duration scatterable mines, within an AO or parts of an AO.

- Higher HQ may impose restrictive FSCMs within an AO to protect some asset or facility such as a no-fire area around a camp that is housing dislocated civilians.

3-88. The FIB commander may not employ indirect fires across boundaries without receiving clearance from the unit into whose AO the fires will affect. He may employ direct fires across boundaries without clearance at specific point targets that are clearly and positively identified as enemy.

THREE STEPS IN THE CLEARANCE OF FIRES

3-89. Three steps in the clearance of fires include the use of maneuver control measures, proper use of FSCMs, and pre-clearance.

Step One

3-90. The first step in the clearance of fires is the use of maneuver control measures described in FM 3-90.

Step Two

3-91. The second step in the clearance of fires is the proper use of FSCMs. Within his own AO, the FIB commander establishes all appropriate FSCMs based on recommendations by the FSO. The FSO's recommendations are based on the supported higher HQ commander's and FIB commander's guidance, location of friendly forces, the concept of operation, and anticipated enemy actions. Disseminate the location of FSCMs by message and/or overlay through maneuver and fire support channels to higher, lower, adjacent, and supporting units. Typically, FSCMs are further disseminated to each level of command, to include the establishing command and all concerned fire support units and staff. Knowledge of the various FSCMs is necessary for the effective use of fire support.

3-92. All FSCMs must complement the FIB as well as the division, corps or other supported higher HQ commander's concept of operations. The size of supported command subordinate units' (such as those of BCTs, the FIB, and other support brigades) AOs are a key consideration in the placement of FSCMs, which in turn influence the allocation of TA and other fire support assets. The supported commander establishes a change to a FSCM through his fires cell at the recommendation of his S-3 and FSO. The supported command's fires cell informs the FIB fires cell of the change and the effective date-time group. Conditions that dictate the change of a FSCM should be coordinated with the fires cell's air defense airspace management/brigade aviation element. As conditions are met, the new FSCM effective time can be projected and announced. Following direction to execute the change, the operations and counterfire element should confirm with the FSO that the FIB fires cell's air defense airspace management/brigade aviation element have informed the appropriate control nodes. This action ensures that affected air support is aware of new FSCM locations and that both associated fire support coordination and airspace positive control measures are being followed.

3-93. FSCMs are either permissive or restrictive. In essence, the primary purpose of a permissive FSCM is to facilitate the attack of targets by reducing the coordination necessary for the clearance of fires.

3-94. The establishment of a restrictive measure imposes certain requirements for specific coordination before the engagement of those targets affected by the measure. Therefore, the primary purpose of a restrictive measure is to provide safeguards for friendly forces for friendly forces and noncombatants, facilities, or terrain.

3-95. Permissive FSCMs should be established far enough out to protect ground forces. Permissive FSCMs should be established to maximize the portion of the AO in which targets can be engaged with minimal clearance. Measures like the coordinated fire line should be established far enough out, but only far enough out to protect ground forces. Restrictive measures should not remain in effect for the entire operation without being checked and updated. Restrictive measures should be established with an effective date-time group and a projected cancellation date-time group. No-fire areas should be kept as small as possible to avoid creating safe havens for enemy forces. During the MDMP, specific criteria should be developed to trigger the changing of FSCMs.

3-96. FSCMs are described in FM 3-09 and JP 3-09.

3-97. Once established, FSCMs are displayed on maps, firing charts, and overlays, and are stored in computers. FSCM portrayal includes, at a minimum, the appropriate graphic, the abbreviation for the

measure, the establishing HQ, and the effective date-time group. Often, the date-time group is shown as a "from-to" time. Usually, FSCMs are labeled at each end of a line or within the graphic, space permitting.

3-98. The FIB S-3, FSO, and fires cell coordinate all fire support affecting the area of operations for the FIB, including that requested by the supported unit. The S-3 and FSO ensure that fire support will not jeopardize troop safety, will interface with other fire support means, and/or will not disrupt adjacent unit operations.

3-99. FSCMs help the FIB S-3, FSO, and fires cell in the clearance of fires. FSCMs facilitate the rapid engagement of targets and, at the same time, provide safeguards for friendly forces. Before operations start in an overseas theater, both joint force and component staff members must verify the status of FSCMs in multinational operations.

3-100. Clearance of fires may be accomplished through staff processes, through control measures (including FSCMs), by embedding them in automated control systems, and through active or passive recognition systems. During planning and execution, the FIB commander may use all of these means in various combinations to set the conditions for clearance of fires. Even with automated systems, clearance of fires remains a command responsibility at every level, and commanders must assess the risk and decide the extent of reliance on automated systems to assist in the clearance of fires.

Step Three

3-101. The third step in the clearance of fires is to make a determination as to which fires will be considered cleared in advance. In some very specific instances, fires can be cleared during the planning phase of the operations process such as—

- Fires into a planned call for fire zone resulting from a radar acquisition from that planned call for fire zone.
- Fires on a planned target, with a definable trigger, against a specific enemy, and according to the scheme of fires.

CLEARANCE OF FIRES DRILL

3-102. Clearance of fires typically occurs in the operations and counterfire cell of the main CP. A clearance of fires drill should be a part of all CP standing operating procedures. Fire support requests can come from many channels. The best method is a redundant drill where a call for clearance is transmitted over two nets: the fire support net and a maneuver net. Initiating the drill is the responsibility of the S-3. Staff members who may be required to participate in the clearance of fires drill include the FSO and key fires cell personnel. The staff cells and subordinate elements required to participate in the clearance of fire drill depend on the operational environment within which the FIB is operating and should be included in the tactical SOP. For example, clearance of fires in an urban environment is complicated; rules of engagement must be adhered to and collateral damage considered.

3-103. Positive clearance of fires is normally facilitated through prior planning, rehearsals, and careful placement of FSCMs. However, the clearance of targets of opportunity often presents challenges. Fires on targets of opportunity must be delivered on short notice without undue delay and without jeopardizing friendly force security. For positive clearance of fires, the following should be obtained—

- Best available method of target location.

- Positive identification of targets as enemy.
- Eyes on target, if at all possible.
- Clearances from appropriate external elements if target is outside unit boundaries.

AIRSPACE COMMAND AND CONTROL

3-104. FIB airspace command and control involves detailed coordination and integration to enable effective use of CAS, indirect fire, organic and augmenting air defense artillery, tactical fire and maneuver operations, and Army aviation. FIB commanders, FSOs, fires cells, air liaison officers, and forward air controllers directly involved in localized combat operations perform airspace command and control functions established by higher echelons such as the division and corps airspace command and control elements.

3-105. The S-3 and FSO have overall responsibility for coordinating, deconflicting, and managing designated airspace. The fire cell's air defense airspace management is the staff organization responsible for acquiring the common operational picture and integrating the FIB airspace for combat operations. Other staff elements needed to plan and execute airspace command and control for the FIB commander include the intelligence and targeting cell, the fires cell, and the operations and counterfire cells elements (all located in the FIB main CP).

3-106. FIB commanders exercise airspace command and control within their assigned areas through the integration of positive and procedural control. Both methods of control are fully compatible and should be used in concert to perform airspace command and control effectively. Typically, many positive and procedural control measures will be directed by division, corps, or other higher command authority.

3-107. Further information on airspace command and control can be found in FM 3-52 and FM 3-52.2.

SECTION VI – SPECIAL CONSIDERATIONS

THE FIRES BRIGADE IN EARLY ENTRY OPERATIONS

3-108. Each early-entry operation situation or contingency mission may demand different requirements depending on the specific METT-TC and the division, corps or other supported command's AO. During early-entry operations the FIB may—

- Be sequenced in the deployment to arrive as soon as possible after the initial BCT and the division, corps or other supported command early entry CP or the airhead or beachhead is secure.
- Organize its own early-entry CP to control all FIB units committed to the current operation, and conduct those critical control functions required to support the division, corps or other supported HQ in tactical operations as the FIB initially deploys into an unsecured area. The FIB early entry CP serves as the FIB's control link early in the deployment between the FIB's organic, assigned and attached forces on the ground, in the air, and at home station and the higher HQ. The early entry CP coordinates fire support for the division, corps, JTF, or other supported command and synchronizes the flow of follow-on FIB attached or supporting units into the AO and phases them into the supported HQ's fight. It also begins initial planning for the conduct of future fire support to the supported command's operations (branches and sequels).

- Provide additional radar coverage for BCTs to support the maneuver of their forces and allow movement of their radar(s) (for example, to allow repositioning of BCT assets during airhead expansion).

- In airborne/air assault operations, FIB assets may be positioned to support the airdrop/air assault force, attack targets in support of shaping operations, suppress bypassed enemy concentrations and facilitate future fire support operations. A FIB employing C-130 and CH-47 transportable fires assets such as the High Mobility Artillery Rocket System or M777-series cannon delivery assets is well suited for this purpose. A FIB may also provide reinforcing fires to BCT organic fires battalions as the BCT moves away from the landing zone/airhead or to provide fires in general support (GS) of the airborne/air assault force as a whole.

- In amphibious operations FIB subordinate units may be dispersed throughout the assault elements of the landing force and subsequently be used to provide reinforcing fires to BCT organic fires battalions or to Marine Corps field artillery battalions as they move farther inland away from the beachhead and/or to provide fires in general support to the landing force as a whole.

THE FIRES BRIGADE ROLE IN JOINT AIR ATTACK TEAM OPERATIONS

3-109. A *joint air attack team* is a combination of attack and/or scout rotary-wing aircraft and fixed-wing CAS aircraft operating together to locate and attack high-priority targets and other targets of opportunity. The JAAT normally operates as a coordinated effort supported by fire support, air defense artillery, naval surface fire support, surveillance and reconnaissance systems, electronic warfare systems, and ground maneuver forces against enemy forces. Joint terminal attack controllers may perform duties as directed by the air mission commander in support of the ground commander's scheme of maneuver (JP 3-09.3). JAAT is a method of employment, not a mission. For example—

- Army and Marine Corps attack helicopters provide fires, TA, mission coordination, and mutual defense. They are aerial maneuver units capable of rapid reaction and are not restricted by terrain. Navy, Marine Corps, and Air Force fixed-wing aircraft can achieve a synergistic effect when combined with attack helicopters.

- Indirect fire assets augment the other fires of JAAT operations. These fires support decisive, shaping and counterfire operations. Fires cells develop supporting joint suppression of enemy air defenses (J-SEAD) plans that support aircraft ingress and egress and necessary FSCMs to allow the simultaneous attack by aircraft and indirect fires.

3-110. JAAT is a method of employment, not a mission. JAAT fires are integrated, mutually supportive, and synergistic, not simply deconflicted. JAAT fires are integrated, mutually supportive, and synergistic, not simply deconflicted. The land force commander typically determines when to employ a JAAT but any commander (air, land, or maritime) may request one. JAAT can be employed anywhere on the battlefield across the spectrum of operations. CAS procedures may/may not be required depending on the proximity of friendly forces and requirement for detailed integration.

3-111. Usually a JAAT mission is planned but variations can be quickly organized based on the situation and available control means. Normally, the JAAT is employed close to friendly troops as an integrated member of the combined arms team. However, a JAAT can operate independently, away from ground units. The JAAT is most effective against moving targets in open areas. It is least effective when attacking targets that are in camouflaged, dug-in positions.

3-112. The maneuver commander has the responsibility for integrating JAAT missions into his plan. The requesting commander's staff plans for, organizes, and coordinates JAAT operations to support this plan.

Note: In this context the "maneuver commander" is any commander with overall command responsibilities within an AO.

3-113. The commanders involved with a JAAT include—

- The supported commander (requesting commander, normally a FIB supported maneuver commander) determines when to employ a JAAT, requests the assets and integrates the JAAT, other combat units, and supporting fires (for example, those provided by the FIB) into his operation. In this case, the FIB also provides fires supporting the JAAT operation. At times, the FIB commander may also be the supported commander (for example, during stability operations when the FIB is assigned an AO by its higher HQ).
- The aviation commander who coordinates the JAAT and makes the tactical plan.
- The air mission commander who executes the JAAT engagement (the aviation commander and the air mission commander may be the same person).

3-114. Designation of a mission commander occurs after coordination between the requesting commander and supporting commanders. The mission commander is responsible for the planning, coordinating, and execution of the JAAT. The mission commander has TACON of JAAT assets to support the commander's plan. See ATTP 3-09.32 for additional information on JAAT.

PLANNING CONSIDERATIONS FOR JATT OPERATIONS

3-115. The FIB staff identifies the requirement for JAAT planning through their IPB. Through this analytical approach, appropriate targets and target areas for employment by a JAAT are nominated. The identification of key intelligence triggers events signal the buildup of a likely enemy target and are essential to effective JAAT employment. JAAT mission assignment considerations include the following—

- Massed enemy armored and/or mechanized vehicles.
- Whether the enemy is on the move.
- Availability of JAAT assets.
- Whether the enemy can be flanked.
- Whether local air superiority can be seized.
- Whether enemy helicopters can be suppressed.
- Likely offensive operations include counterattacks, exploitations, and pursuits.
- Likely defensive operations include reinforcement of committed ground maneuver units and destruction of enemy penetrations.
- Strike operations to attack follow-on elements.

3-116. The brigade should be the lowest echelon at which a joint air attack is planned. Coordination with the appropriate maneuver battalion is required if the JAAT is to be employed in the battalion's sector; execution may be handed off to the battalion.

3-117. The coordination process for JAAT operations takes place in the FIB fires cell under the supervision of the S-3, FSO, ALO, and FIB aviation liaison officer (if provided).

3-118. The S-3, FSO and fires cell determine the need, availability, and positioning of artillery, commensurate with the enemy update, to support the JAAT. They coordinate with ALO and Army aviation liaison officer (if provided) to obtain radio frequencies and call signs for the JAAT, to deconflict aviation and CAS initial positions from artillery positions, and for development of airspace coordination areas to support the mission. The S-3, FSO and fires cell also—

- Determine the requirement for SEAD.
- Coordinate for marking rounds in the target area with the JAAT commander and forward air controller.
- Consider the use of Firefinder radar critical friendly zones (CFZ) to protect attack helicopters in their battle positions.
- Consider use of precision/guided/smart munitions to minimize target obscuration that might adversely affect pilot view of the target.
- Determine when and how priorities of fires shift.
- Recommend and integrate FSCMs to enhance the success of the mission. Airspace control areas are coordinated with the ALO and supporting air and missile defense personnel.
- Determine and disseminate pulse repetition frequency codes.
- Establish a quick fire channel if necessary.

PREPARATION FOR JATT OPERATIONS

3-119. The preparation phase includes briefing the plan and ensuring dissemination of the plan to subordinate units that may have an impact on the mission, reconnaissance, and rehearsal.

3-120. The aviation commander, after completing his reconnaissance, provides feedback to the ALO, FSO, and Army aviation liaison officer to the FIB (if provided). If refinements to the plan are needed, they are made and disseminated expeditiously.

3-121. Rehearsals are crucial to check communications channels, routes, and battle positions; time required to move assets forward, graphical control measures; and the fire plan. The JAAT rehearsal participants should include—

- Aviation commander (JAAT commander).
- Attack helicopter unit leader.
- FSO (may require supported maneuver unit FSO).
- ALO.

- Army aviation liaison officer to the FIB (if provided).
- Fires battalions and possibly the battery fire direction centers.
- Air observers (if available).

EXECUTION OF JATT OPERATIONS

3-122. During the execution phase, the aviation commander is the director and coordinator of the total team effort.

3-123. En route to the target or engagement area, the aviation commander contacts the ground commander for a tactical update. The aviation commander should talk directly to all fire support assets involved in the JAAT operation. The ground commander's staff monitors the appropriate nets to keep abreast of the JAAT operation and to help the aviation commander as needed.

3-124. Applying indirect fires, joint fires, and Army aviation against the same target set cannot be accomplished without a detailed plan for airspace command and control. Airspace command and control requirements to execute a JAAT are complicated and must be fully developed, distributed, and rehearsed. Air corridors, airspace control area, initial points, and battle positions must all be included in the airspace command and control plan. Rehearsing this plan is essential to a successful JAAT operation.

3-125. See FM 3-09.32 and FM 3-04.126 for additional information on JAAT planning and execution.

FIRES BRIGADE SUPPRESSION OF ENEMY AIR DEFENSES

3-126. *Suppression of enemy air defenses* is activity that neutralizes, destroys, or temporarily degrades surface-based enemy air defenses by destructive and/or disruptive means (JP 3-01). The effective employment of air assets gives the FIB commander a powerful source of fires. Army aviation and the air platforms of other services, particularly the Air Force, enable the ground commander to quickly influence operations and to add depth to the battlefield.

REQUIREMENT FOR SEAD

3-127. The availability of fires from air assets also gives the FIB commander the corresponding responsibility to protect those assets. This obligation is significant in view of the increasingly sophisticated threat that faces U.S. forces throughout the operational environment. Enemy forces have the capability to field effective integrated air defense networks. These networks, consisting of weapon systems, radars, and control nodes, present a formidable all-altitude protection umbrella.

3-128. The most effective enemy air defense systems will be on the high-intensity battlefield. Enemy air defense capabilities in mid- and low-intensity environments also pose a significant threat to U.S. air assets. Friendly air assets must be able to survive to contribute their full combat potential. SEAD is a critical function that must be accomplished quickly and efficiently.

3-129. SEAD operations must be synchronized with elements of the fire support system and with members of the joint and combined arms team to produce maximum combat power. Unity of effort is essential in this endeavor. Synchronization of fire support resources requires detailed planning and coordination and precise timing.

INITIATING THE SEAD PROCESS

3-130. The SEAD process starts with the Army or Air Force unit that requests air operations. First consideration is given to those suppression means organic to or available to the requesting unit. When SEAD requirements exceed the availability or capability of those means, the theater air control system or Army air-ground system structure is used to request or coordinate joint support.

3-131. SEAD is an integral part of air or aviation mission planning. SEAD requests are processed through the appropriate Army fires cell channels. The fires cell at each echelon is configured to plan, coordinate, and execute responsibilities inherent in SEAD operations. Requests from subordinate Army echelons are consolidated, reviewed, prioritized, and scheduled for execution by available Army assets. Targets exceeding Army capabilities are nominated and forwarded through channels to the air component commander. For example, requests to the U.S. Air Force are sent through the supporting air support operations center. Once approved, the schedule and other pertinent information are returned through the same channels to the requesting Army echelon.

3-132. The Army also responds to Air Force-generated requests for Army SEAD to support air missions in accordance with established guidelines and priorities. As with Army-initiated SEAD requests, air component requests are processed through appropriate Army channels to the supporting units. The FSO and fires cell at each echelon coordinates the mission and directs the SEAD effort. The FSO and fires cell also assess the effectiveness of Army SEAD to ensure that results are forwarded to the requesting command.

SEAD PLANNING AND EXECUTION

3-133. At the FIB the S-3 and FSO direct SEAD operations through the functioning of the FIB fires cell. SEAD operations require the coordination of all fire support means, as well as electronic warfare capabilities. The S-2, in conjunction with the FIB's intelligence cell, gives the S-3, FSO, and fires cell information on the projected enemy defense threat. This data, plus airspace use information, is integrated into the SEAD plan by the fires cell.

3-134. SEAD is supported by the coordinated use of air and ground based acquisition platforms, which include helicopter and fixed-wing assets. Disruptive efforts are planned to complement destructive efforts and include the full array joint and Army electronic warfare capabilities. Electronic warfare systems are used to degrade jammable threats and to neutralize enemy systems when destruction is not feasible. To prevent fratricide of friendly air and missile defense radars, the FIB must provide friendly emitter order of battle and location information for inclusion in the airspace control order.

3-135. The division, corps, JTF, or other FIB supported HQ plan and conduct localized suppression to protect aircraft that are required to penetrate the forward line of own troops. This entails the suppression of enemy air defense systems along the routes to (ingress) and from (egress) the attack objective as well as systems surrounding the objective when they are within range of Army attack means. A corridor may have to be established to protect helicopters participating in air assault operations.

SEAD TARGETING

3-136. The targeting process for SEAD is the same as for any other target set. The targeting of enemy air defense weapons is conducted within the framework of the D3A approach to targeting and battle management. The product of the targeting process (that is, the successful conduct of SEAD) must accomplish one or all of the following—

- Support air or aviation assets engaged in contact with the enemy air defense threat.
- Fulfill some aspect of the commander's plan.
- Be synchronized with the air operation.
- Be capable of sustaining its effort.

JOINT SUPPRESSION OF ENEMY AIR DEFENSES

3-137. *Joint suppression of enemy air defenses* is a broad term that includes all suppression of enemy air defense activities provided by one component of the joint force in support of another (JP 3-01). That portion of SEAD operations requires joint interaction to suppress enemy surface-to-air defenses having influence at the operational and tactical levels. The greatest indirect fire suppression capability of ground and naval forces is against those threats that can be engaged by observed fire.

3-138. The FIB S-3, FSO, and fires cell planners ensure that SEAD target queries are conducted for each air interdiction and planned CAS request. Attack of SEAD targets must be synchronized with the planned airstrike. The sources for development of SEAD targets in decisive operations are primarily ground observers and Army electronic, imagery, or templating techniques. SEAD targets to be suppressed for air interdiction missions are provided primarily by air support reconnaissance flight reports or other aircraft reports available from intelligence section/cell/element of the battlefield coordination detachment.

3-139. SEAD targets are attacked either as acquired or as part of a scheduled SEAD program. The FIB S-3, FSO, and fires cell planners coordinate the synchronization of SEAD programs with the ALO and the Army aviation liaison officer to the FIB (if provided).

3-140. SEAD targeting should cover aircraft ingress and egress routes. This information is available from the appropriate level ALO or may be found in the air tasking order. J-SEAD operations can be accomplished through destructive and disruptive means.

Destructive Means

3-141. Destructive means seek the destruction of the target system or operating personnel. The effects are cumulative and increase aircraft survivability, but destructive means may place large demands on the available combat power of the division, corps, JTF, or other FIB supported command.

Disruptive Means

3-142. Disruptive means temporarily deny, degrade, deceive, delay, or neutralize enemy air defense systems to increase aircraft survivability. Disruptive means are either active or passive—

- **Active** means include electronic attack; expendables (chaff, flares, and decoys); tactics such as deception, avoidance, or evasive flight profiles; and UAS.
- **Passive** means include emission control, camouflage, infrared shielding, warning receivers, and material design features.

3-143. For more information on SEAD see FM 3-01.4.

TERRAIN MANAGEMENT

3-144. Terrain management is primarily the responsibility of the unit that controls the ground in a particular area or sector. This unit is usually an Army maneuver unit, however, especially during stability operations, the controlling agency could be a host nation government or military force, or a United Nations-affiliated military force or civilian relief organization.

3-145. The S-3, FSO, and fires cell elements assist the FIB supported HQ S-3/G-3 with terrain management for fire support assets. The S-3 and FSO provide the overall supervision and coordination to ensure that all fire support related terrain management issues are properly addressed and synchronized. The fires cell works closely with subordinate and BCT organic fires battalions and the FIB supported unit fires cells in coordinating terrain management for field artillery elements.

3-146. Field artillery terrain management involves the planning and coordination of positions and movements for field artillery units, radar sections, and other field artillery elements. The fires cell and subordinate fires battalion S-3s work together during the MDMP to identify the general field artillery positioning and movement requirements necessary to support the concept of operations and the commander's intent. Early in the MDMP process, they try to identify the possible field artillery units involved, the general position areas required in the FIB and supported unit zones, the general times when these locations will be required, and the possible routes needed for movement. This information is used by the FIB fires cell and the subordinate fires battalion staffs to begin the detailed planning and information gathering necessary to identify specific issues or requirements, the feasibility of the general positioning and movement plan, and the detailed coordination requirements necessary for terrain management. As the MDMP progresses, field artillery positioning and movement plans and information become more detailed, and the fires battalion fires cell and subordinate fires battalion S-3s may use warning orders to alert supported unit fires cells and FIB and battalions of terrain management issues (positioning and movement considerations).

3-147. Subordinate fires battalion S-3s collect all the information and advice, finalize the fires battalion movement requirements and plans, and pass them to the fires cell to become part of the FIB OPORD. Because the FIB and subordinate fires battalion MDMPs are integrated processes, the fires cell will already know most of the information and have begun most of the terrain management coordination required.

3-148. The fires cell reviews the terrain management requirements and ensures that the S-3 is aware of them, and that they are properly coordinated and synchronized as part of the overall division, corps, JTF, or other FIB supported HQ terrain management plan. The fires cell is in the best position to monitor the current locations of all friendly units while simultaneously understanding field artillery requirements. During the MDMP, it facilitates the exchange of terrain management information between the FIB and subordinate fires battalion staffs and supported unit fires cells. This includes rapid resolution of any critical terrain management issues that could affect the FIB plan. This problem identification and resolution is one of the key terrain management functions of the fires cell.

3-149. The fires cell and subordinate fires battalion S-3s identify and coordinate general position areas for FIB-controlled field artillery assets. They identify and authorize the direct liaison necessary between reinforcing field artillery units and supported unit fires cells to coordinate terrain management. The battalions will then conduct direct coordination with the lowest level supported unit to obtain the specific locations or routes needed for the field artillery battalions, radars and other field artillery assets under FIB control. The BCT and FIB fires cells assist supported higher HQ fires cells (or equivalent staff section/cell/element) and FIB battalions with detailed terrain management. For major FIB movements, or during constrained AO conditions, the fires cell and the subordinate fires battalion S-3s will usually

conduct more detailed terrain management, identifying specific positions, routes, and times for positioning and movement activities.

SURVEY AND METEOROLOGY

3-150. Accurate predicted fires result from accurate location of target and firing platforms, accurate gunner computations, accurate meteorology, and accurate data for weapons and ammunition.

SURVEY

3-151. Common survey control is the location of all firing system elements (firing units, radars, met station, and observers) on a common location and azimuth system that should be extended into the target area. Establishment of common survey/map datum is a critical FIB command responsibility. In order for two locations to be considered on common survey they must be referenced to the same datum (for example, the World Geodetic System of 1984), ellipsoid (there are more than five ellipsoids used around the world), and grid system (for example, the military grid reference system), and must meet the prescribed survey accuracies or be converted to meet them. Common survey facilitates all fire support assets being oriented the same with respect to azimuth, position, and elevation to a prescribed accuracy. Common survey/map datum is essential for accurate navigation, TA, and target attack, and for the prevention of fratricide. Common survey for the FIB is provided by the FIB TAB's survey sections using the position and azimuth determining system and conventional survey means.

3-152. Survey planning begins with understanding the FIB commander's intent and guidance for fires. During planning full consideration must be given to the commander's concept of the operation, priorities, tactical situation, survey control available, desired accuracy, number of installations, and METT-TC factors. This information can be translated by the FIB S-3 and FSO into survey requirements for the TA sensors and the designated attack systems, which must be on a common grid by the time required for the operation. Aggressive survey planning that answers "who," "where," "when," "why," and "how" is essential to ensure mission success.

3-153. For more information on survey, see FM 3-34.331 and FM 6-2.

METEOROLOGY

3-154. It is the responsibility of the FIB commander (coordinating with the TAB's meteorological section leader, S-3, FSO, and fires cell) to position the TAB's meteorological sections to best measure the atmosphere for meteorological support of all firing units involved in FIB operations. Current meteorological data must be applied for accurate artillery fires, battlefield forecasts, radiological fallout predictions, and TA. This information is in the form of meteorological messages provided by the artillery meteorological sections. Control of all field artillery meteorological sections is exercised at the field artillery HQ to which the meteorological section is assigned or attached.

3-155. Planning and use of the TAB's meteorological sections begins with the FIB commander's intent, guidance for fire support, and the battlefield weather conditions. During the planning, full consideration must be given to the following—

- Commander's concept of the operation.
- Mission priorities (type of meteorological data required).
- Tactical situation and security.

- Prevailing winds (determine meteorological section location).
- Location of units supported.
- Location of other meteorological sections.
- Communications facilities.

3-156. For more information concerning meteorology, see FM 3-09.15.

Note: A possible limiting factor in achieving accurate fires for effect may be the difficulty in obtaining accurate meteorological data when FIB firing elements are not within acceptable distance from FIB or other Army meteorological facilities. In such instances, the U.S. Air Force's interactive grid analysis display system for predictive meteorology could be applied where SECRET internet protocol router network access is available, but its predictive accuracy is often distorted due to the large elevation changes in mountainous terrain.

LASER MANAGEMENT

3-157. Laser technology is involved in the use of precision-guided munitions. Synchronization is required for those laser systems designating targets for precision-guided munitions (PGM). Laser management is crucial to the successful, safe, and legal use of laser systems on the battlefield.

3-158. The S-3, FSO, fires cell, subordinate fires battalions, the supported unit battalion/squadron FSO and fires cell, COLTs, FISTs, and FOs must ensure that fire support Soldiers operating laser target designators understand the legal and safety issues involved in the use of laser equipment. Protocol IV to the Geneva Conventional Weapons Convention provides guidance on the use of lasers (it specifically prohibits the use of lasers specifically designed to cause permanent blindness). The Soldiers must be well trained in the operation of the equipment, and the procedures for safely employing laser target designators and PGMs to attack targets. Improperly employed laser target designators and PGMs can result in fratricide.

3-159. Laser designation for PGMs also involve the use of laser codes that enable various laser target designators to work in harmony with various laser-guided weapons. Some munitions and equipment are incapable of using all available codes. Additionally, certain codes (low code, high pulse repetition frequency, and/or faster pulse rate) are preferred for laser systems requiring precision guidance. Laser-guided bomb codes are set on the bombs before takeoff and cannot be changed in the air. Codes must be pre-briefed to aircrews, forward air controllers, field artillery units, and/or ground observers in situations where communications cannot be established or authorized during execution of the mission. Coordination is necessary to ensure the various fires cells are not using codes that duplicate or interfere with each other.

3-160. Laser code management is an army, joint, and multinational force issue. The division corps, JTF or other FIB supported command's FSO should ensure that laser code requirements are properly managed and coordinated across their commands fire support warfighting function. At division and corps level, the fires cell is primarily focused on ensuring that the various laser devices interoperating in an operation are compatible and that the procedures for exchanging the laser codes are clearly identified. Deconfliction of laser codes should be identified and conducted early in the planning and wargaming process and during rehearsals. Procedures should be established to quickly resolve unanticipated code conflicts during the execution of PGM operations.

3-161. Additional information can be found in JP 3-09 and JP 3-09.3.

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Chapter 4

Fires Brigade Employment: How the Fires Brigade Fights

This chapter describes fires brigade (FIB) employment. Section I of this chapter begins by describing factors that influence the FIB operational environment including combined arms and unified action. Section II describes the operational framework for the FIB as shaped by its area of operations (AO), the concept of operations, allocation of combat power, and FIB strike and counterfire operations. Section III through VI concludes this chapter by describing FIB deployment, and defensive, offensive, and stability operations.

SECTION I – OPERATIONAL ENVIRONMENT

4-1. The *operational environment* is a composite of the conditions, circumstances, and influences that affect the employment of capabilities and bear on the decisions of the commander (joint publication [JP] 3-0). Commanders consider more than the enemy's military forces and other combat capabilities. They use their experience, professional knowledge, and understanding of the situation to visualize and change the operational environment as current operations transition to future operations.

COMBINED ARMS

4-2. Combined arms is the synchronized and simultaneous application of the elements of combat power— to achieve an effect greater than if each element of combat power was used separately or sequentially. It is the full integration of different capabilities in such a way that to counteract one, the enemy must become more vulnerable to another. Combined arms employ all the warfighting functions and their supporting systems.

4-3. Combined arms multiply the effectiveness of Army forces in all operations. Units operating without support of other arms suffer higher losses and may not accomplish their mission. Combined arms depend upon synchronization of capabilities.

4-4. Synchronization is—

- The arrangement of military actions in time, space, and purpose to produce maximum relative combat power at a decisive place and time.
- In the intelligence context, application of intelligence sources and methods in concert with the operation plan to ensure intelligence requirements are answered in time to influence the decisions they support.

4-5. Through synchronization, commanders arrange warfighting functions to mass the effects of combat power at the chosen place and time to overwhelm an enemy or dominate the situation. Synchronization is a means, not an end. Commanders balance synchronization against agility and initiative; they never surrender the initiative or miss opportunity for the sake of synchronization.

4-6. Complementary capabilities combine dissimilar organizations to redress the weakness of one type of organization with the strength of another. For example, field artillery, infantry, armor, and aviation each

demonstrate distinct capabilities and vulnerabilities. Their separate capabilities taken together form a lethal building block within which, each organization's vulnerabilities are shielded by another's capabilities.

4-7. Combined arms are achieved through organizational design (standing organizations) and temporary reorganization (tailored and task-organized units). For example, a divisional force package may include combat aviation, maneuver enhancement, sustainment, fires, and battlefield surveillance brigades to complement and reinforce four or five brigade combat teams (BCT). While combined arms operations are familiar to Army units, integrating other service and special operations forces capabilities has become typical. Multinational combinations are common and interagency and intergovernmental combinations are occurring more frequently. None of these (joint, interagency, intergovernmental, or multinational) combinations occurs successfully in operations without planning and preparation. Careful training and exchange of liaison at every level are necessary for successful operations.

UNIFIED LAND OPERATIONS

4-8. *Unified land operations* describes how the Army seizes, retains, and exploits the initiative to gain and maintain a position of relative advantage in sustained land operations through simultaneous offensive, defensive, and stability operations in order to prevent or deter conflict, prevail in war, and create the conditions for favorable conflict resolution (ADP 3-0).

JOINT INTERDEPENDENCE

4-9. Joint interdependence is the purposeful reliance by one Service's forces on another Service's capabilities to maximize the complementary and reinforcing effects of both. Army forces operate as part of an interdependent joint force. Joint capabilities make Army forces more effective than they would be otherwise. Combinations of joint capabilities defeat enemy forces by shattering their ability to operate as a cohesive, effective whole. Joint suppression of enemy air defenses (J-SEAD) and joint air attack team (JAAT) operations are examples of operations where individual Army capabilities (such as those of the FIB) and Air Force capabilities applied in combination generate greater combat power than if the capabilities of only one Service were applied in isolation. For more on joint operations see JP 3-0.

IINTERAGENCY COORDINATION AND COOPERATION WITH OTHER ORGANIZATIONS

4-10. *Interagency coordination* is within the context of Department of Defense involvement, the coordination that occurs between elements of Department of Defense, and engaged U.S. Government agencies for achieving an objective (JP 3-0). Understanding other agencies' capabilities potentially enables the FIB commander to add diplomatic, informational, and economic depth to FIB operations efforts. For instance, if the FIB is assigned its own AO during a stability operation, FIB capabilities (augmented) allow other agencies to operate within unstable areas with increased security and effectiveness. Just as integrating different unit or Service capabilities results in the advantages of joint and combined arms, so synchronizing the FIBs military power with other instruments of national power produces dynamic capabilities. Some requirements are performed best by civilian agencies. Some may be so different from military capabilities that only other agencies can accomplish them. If security is poor, or contracted support is minimal (often the case early in a contingency operation), other government agencies may have difficulty accomplishing their mission. The FIB has Soldiers, leaders, equipment, and organizational depth and support that exceed capabilities of almost any other agency of the government. Examples of civilian organizations with which the FIB might work, especially during stability operations, or defense support of civil authorities includes other government agencies, intergovernmental organizations and nongovernmental organizations—

- *Other government agencies* are within the context of interagency coordination, a non-Department of Defense agency of the United States Government (JP 1).

- An *intergovernmental organization* is an organization created by a formal agreement (for example, a treaty) between two or more governments. It may be established on a global, regional, or functional basis for wide-ranging or narrowly defined purposes. Formed to protect and promote nation interests shared by member states (JP 3-08).

- A *nongovernmental organization* is a private self-governing, not-for-profit organization dedicated to alleviating human suffering, and/or promoting education, health care, economic development, environmental protection, human rights, and conflict resolution; and/or encouraging the establishment of democratic institutions and civil society (JP 3-08).

4-11. For more on interagency coordination and cooperation with other organizations see JP 3-08.

MULTINATIONAL OPERATIONS

4-12. *Multinational operations* is a collective term to describe military actions conducted by forces of two or more nations, usually undertaken within the structure of a coalition or alliance (JP 3-16)—

- An *alliance* is the relationship that results from a formal agreement (for example, a treaty) between two or more nations for broad, long-term objectives that further the common interests of the members (JP 3-0).

- A *coalition* is an ad-hoc arrangement between two or more nations for common action (JP 5-0).

4-13. Since multinational operations are not structured around standing agreements, a preliminary understanding of the requirements for operating with a specific foreign military may occur through peacetime military engagement. These developmental activities include, but are not limited to, ongoing personal contacts, pre-positioning of equipment, exercises, exchange programs, and humanitarian assistance. Every multinational operation is different. An Army force commander designated as a multinational force commander faces many complex demands. These may include dealing with cultural issues, interoperability challenges, and an immature theater mission command organization. The FIB may be part of multinational force and be either the supporting or the supported command. The FIB commander should be prepared to deal with different national procedures, the sharing of intelligence, and theater sustainment functions. The FIB commander must also be prepared to analyze his mission's peculiar requirements and be prepared to exploit the advantages and compensate for the limitations of a multinational force. The FIB commander should be prepared to establish liaison with multinational forces that are assigned, attached to or under the operational control (OPCON) or tactical control (TACON) of the FIB and with FIB supported multinational forces as soon as possible. Exchanging liaison fosters common understanding of missions and tactics, facilitates transfer of information, and enhances mutual trust and confidence. For more on multinational operations see JP 3-16.

SECTION II –THE FIRES BRIGADE FRAMEWORK

AREA OF OPERATIONS

4-14. An *area of operations* is an operational area defined by the joint force commander for land and maritime forces. AOs do not typically encompass the entire operational area of the joint force commander, but should be large enough for component commanders to accomplish their missions and protect their

forces (JP 3-0). FIBs are normally assigned, attached or OPCON to a division. However, they may be OPCON to a task force, land component command, or other Service or functional component. The FIB can also support a special operations task force with long-range precision fires not inherent to special operations forces organizations. When supporting a division, corps, JTF, joint force land component command , or other higher HQ the FIB may be required to support an AO that includes all or portions of the supported command's AO.

4-15. Normally all BCTs and a select few support brigades are assigned AOs. However, any brigade, including the FIB, may be assigned an AO, with that owning brigade responsible for terrain management, security, clearance of fires, stability operations, movement control, airspace command and control, and development and maintenance of the common operational picture within its AO. Any brigade that is not staffed to accomplish each of these functions should either be augmented or not be assigned an AO. If the FIB's supported commander assigns the FIB an area of operations (AO) the supported commander provides guidance on coordinating the FIB's actions with BCTs and other supporting brigades in the command. The FIB's supported commander also provides supporting units to the FIB as necessary. The FIB might be required to detach some of its subordinate elements to BCTs or other supporting brigades of the command. BCTs, reconnaissance and surveillance brigades, maneuver enhancement brigades, combat aviation brigades, and sustainment brigades can all support FIB operations

4-16. The division or other higher commander defines the FIB's AO. The FIB's AO should be large enough for the FIB commander to accomplish his mission and protect his forces. The FIB commander employs units and supporting systems that are assigned or attached to, or placed under the OPCON or TACON of the FIB, within his assigned AO. Within the FIB AO, subordinate commanders synchronize their operations with the FIB's plan. Other supporting brigades such as a sustainment brigade, maneuver enhancement brigade, battlefield surveillance brigade, or combat aviation brigade may occupy terrain in the FIB's AO. The supported higher HQ may also position its main command post (CP) or a tactical command post (TAC CP) in the FIB's AO.

4-17. The combat aviation brigade and the FIB may be assigned an AO instead of an engagement area or kill box, to facilitate conducting an attack (combat aviation brigade attack operations are described in FM 3-04.126) operation or a strike. This might be done to ensure unity of command and facilitate control when the operation will occur over an extended period and several units will participate.

4-18. Use boundaries to describe the AO, assist in the synchronization of the operation, and take full advantage of the supported command's capabilities. Commanders specify the necessary control measures to focus combat power, delineate responsibilities, assign geographic responsibility, and support the operation. Generally, division, corps, JTF, or other higher HQ commanders use a mix of permissive and restrictive control measures to ensure subordinate commanders, such as the FIB commander, have the maximum flexibility to accomplish the mission. The concepts of AO, area of interest, and area of influence are applicable when assigning AOs to brigades. See FM 3-90. The division, corps, or other higher HQ will either assign contiguous or noncontiguous AOs. When assigning noncontiguous AOs, the division, corps, or other higher HQ retains control of the unassigned area within its own AO.

CONTIGUOUS AREAS OF OPERATION

4-19. Contiguous AOs afford the FIB commander and FIB supported higher HQ commander a better methodology for massing the effects of combat power and providing mutual support at critical times and places. Contiguous AOs also provide additional security for maneuver units as well as control nodes, and the division, corps, or other FIB supported command's sustainment area. Conditions that might favor using contiguous AOs include—

- Limited size of the AO in relation to number of friendly forces.
- Enemy forces are concentrated.
- Reducing risk associated with being defeated in detail because of an incomplete operational picture or because the FIB supported command is significantly outnumbered.
- Decisive points in close proximity to each other.
- Limited availability of joint fires.

NONCONTIGUOUS AREAS OF OPERATION

4-20. Assigning noncontiguous AOs to subordinate units allows the division, corps, or other FIB supported command to apply the effects of combat power in widely separated areas and/or concentrate the effects of its combat power in selected areas. A higher HQ commander's decision to use noncontiguous AOs, regardless of command echelon, is derived from a careful analysis of the factors of mission, enemy, terrain and weather, troops and support available, time available, civil considerations (METT-TC)—particularly the enemy, and his ability to mass, and terrain. Overcoming this risk places a premium on the FIB supported commander's situational understanding and on the tactical mobility of his forces. In order to reduce the risk, the FIB supported commander typically does not assign noncontiguous AOs to subordinate units unless they are within supporting distance and/or supporting range of one another and the command is able to rally sufficient combat power to prevent a threat from defeating a friendly unit in detail.

4-21. During combat operations, the division, corps, JTF, or other FIB supported commander does not assign subordinate units AOs in areas where the enemy does not pose a threat to the accomplishment of the mission. The command retains these unassigned areas as its own responsibility. It is the division, corps, JTF, or other FIB supported commander's responsibility to ensure enemy forces do not operate in these unassigned areas in such a way as to become a threat in subsequent operations or threaten to defeat in detail any friendly unit. If the enemy activity increases in the unassigned areas, the division, corps, or other FIB supported command may chose to assign the area to a subordinate unit. Each noncontiguous AO must either provide for its self-defense against any enemy capability or be in supporting distance and/or supporting range of another subordinate unit such as the FIB, or otherwise be able to mass fires (both Army and joint) to prevent defeat in detail. The commander will typically establish noncontiguous AOs when—

- Comparative weakness of the enemy is known.
- Enemy forces are dispersed.
- Joint fires are available.
- The division, corps, or other FIB supported command has the ability to influence the unassigned areas.

4-22. The FIB's target acquisition (TA) systems may enable the FIB to observe outside the AO. Additionally, the capabilities of supporting units assigned, attached, or under the OPCON of the FIB often have capabilities with influence outside the AO.

FIRES BRIGADE STRIKE AND COUNTERFIRE

STRIKE OPERATIONS

4-23. *Strike* is an attack to damage or destroy an objective or a capability (JP 3-0). The FIB conducts strikes as a component of offensive and defensive operations. Long range offensive and defensive fires support strategic assurance and deterrence missions by providing a capability to strike ground targets at extended distances. These fires contribute to shaping operations and defeating or denying enemy capabilities that threaten deploying joint and multinational forces. Offensive fires strike enemy capabilities before they come in contact with or are employed against U.S. forces or populations, enabling commanders to seize, retain, and exploit the initiative. These fires present the enemy with multiple dilemmas, limit options, and destroy or degrade capabilities. Defensive fires will support a broad range of operations, extending from homeland defense to major combat operations in deployed theaters, and will often require the integration of joint, interagency, intergovernmental, and multinational partners. Defensive fires capabilities provide persistent, 360-degree protection. FIB strikes may be used as separate attacks or in with maneuver forces. For example, if the division, corps, JTF, or other FIB supported commander is seeking to dislocate the enemy, a BCT may conduct a turning movement (shaping) to expose an enemy force to FIB strikes to defeat the enemy force (decisive). In another operation, the strike may attack an enemy HQ to disrupt an enemy force (shaping) so that a BCT may close with and destroy the enemy force (decisive).

4-24. Strike is a mission order given to the FIB because of the supported higher HQ targeting process. Strike is generally focused on a specific enemy formation and is a deliberate operation with a timeline of several hours to several days—it is not a fire mission against a target of opportunity. The FIB may be the supporting or supported command and employs Army and joint scalable fires, often complemented by attack aviation, to conduct a strike. Strike may include rapid and aggressive maneuver of FIB assets well forward in the supported higher HQ AO to achieve range on the identified target. This is accomplished either by assigning a mission to a BCT to support the FIB's maneuver forward, or by task-organizing maneuver or other security assets (for example, infantry/armor, military police, air defense artillery) to the FIB to allow the FIB commander to maneuver to position his forces. Strike capitalizes on the ability of Army forces to deliver precise effects of fires to the full depth and breadth of the division, corps, JTF, or other FIB supported command's AO. Strike has three primary advantages over attack aviation operations. First, there is no risk to aircrews conducting the strike. Second, there is very little delay between acquisition of the target and delivery—usually minutes. Third, there is little the target can do to defend itself once acquired, except to move outside of the range of the lethal effects of FIB fires. For many types of targets, that is impossible. The primary disadvantage of strike is the latter—if the target can maneuver, it may be able to avoid being engaged.

COUNTERFIRE

4-25. *Counterfire* is fire intended to destroy or neutralize enemy weapons. Includes counterbattery, counterbombardment, and countermortar fire (JP 1-02). Destruction of enemy capabilities for accurate long-range fires that could disrupt and hinder maneuver is critical to ensure freedom of action and high tempo operations for friendly forces. Counterfire can neutralize or destroy all or portions of the enemy's total strike (fire support) capabilities including delivery systems, control nodes, support systems, and logistics or sustainment areas. Counterfire has two complementary components, preemptive and reactive—

- **Preemptive counterfire.** The FIB aggressively seeks to eliminate the enemy's indirect fire assets before they can affect division, corps, JTF, or other FIB supported command's operations. The FIB uses organic TA and fires capabilities, as well as allocated division, corps, or joint

assets to acquire and disable components of the enemy's strike (fire support) system. Examples of target sets include cannon, rocket, and missile delivery units, artillery ammunition storage facilities, fire direction centers, counterfire radars, forward observers, fixed- or rotary-wing airfields, and fire support communications infrastructure.

- **Reactive Counterfire.** The FIB serves as the division, corps, JTF, or other FIB supported higher HQ counterfire HQ and executes counterfire in reaction to enemy strike activity. The brigade uses a variety of counterfire acquisition assets to locate enemy strike (fire support) systems accurately. The FIB establishes the necessary sensor-to-shooter links to rapidly attack the enemy systems.

SECTION III – THE FIRES BRIGADE IN DEFENSIVE OPERATIONS

GENERAL CONSIDERATIONS FOR THE FIRES BRIGADE IN DEFENSIVE OPERATIONS

4-26. *Defensive operations* are operations conducted to defeat an enemy attack, gain time, economize forces, and develop conditions favorable for offensive or stability tasks. These operations include mobile defense, area defense, and retrograde (ADP 3-0).

4-27. As in the offense, the impact of fire support is fundamental to the success of the division, corps, or other FIB supported command. The execution and support of strike throughout the enemy's depth can assist in defeating or deterring the enemy before he can reach the main body of forces. Fires in support of shaping operations are used to silence enemy artillery, separate enemy echelons, and defeat maneuver elements as they move forward. Fires can be critical to offsetting a lack of maneuver assets for defense of large areas. The general tasks of the FIB in defensive operations are to—

- Coordinate joint fires against the enemy to separate echelons and reduce his available options.
- Execute lethal and nonlethal attacks at maximum range to disrupt enemy command and control and desynchronize his attack.
- Provide massed fires to assist BCTs in breaking the momentum of attacking enemy maneuver forces.
- Prevent enemy indirect fires from reducing the supported commander's defense—execute counterfire to interdict enemy fires systems.
- Provide redundant communications networks to ensure uninterrupted fires to the force.
- Support BCT survey sections in meeting target area survey requirements. Defensive operations do not place any unusual requirements on the FIB.
- Provide meteorological support to FIB units and those BCT units beyond the valid range of their organic meteorological stations.

MOBILE DEFENSE, AREA DEFENSE, AND RETROGRADE

4-28. The *mobile defense* is defense of an area of position in which maneuver is used with organization of fire and utilization of terrain to seize the initiative from the enemy (JP 1-02). It is the type of defense in which the defender withholds a large portion of available forces for use as a striking force in a

counterattack. A mobile defense requires defenders to have greater mobility than attackers. Defenders combine offensive, defensive, and delaying actions to lure attackers into positions where they are vulnerable to counterattack. Commanders take advantage of terrain in depth, military deception, obstacles, and mines while employing fires and maneuver to wrest the initiative from the attacker.

4-29. An *area defense* is a defensive task that concentrates on denying enemy forces access to designated terrain for a specific time rather than destroying the enemy outright. (FM 3 90). The focus of the area defense is on retaining terrain where the bulk of the defending force positions itself in mutually supporting, prepared positions. Fire support assists in shaping operations that constrain the enemy into a specific COA, control his movements, or fix him in a given location. These actions limit the enemy's options. Fires support may be used to delay or attrit enemy follow-on and reserve forces to keep them from entering the MBA. The commander covers obstacles with fires to fix, turn, block, or disrupt to limit the options available to the enemy. The decisive operation focuses on fires into EAs, possibly supplemented by a counterattack.

4-30. Retrograde involves organized movement away from the enemy. This includes delays, withdrawals, and retirements. Retrograde operations gain time, preserve forces, place the enemy in unfavorable positions, or avoid combat under undesirable conditions. See FM 3-90 for additional information on defensive operations.

Task Organization and Support Relationships

4-31. The FIB is generally organized in the defense with more centralized control of fire support. This allows the FIB commander maximum flexibility in supporting all BCTs based on enemy actions and allows massed fires to deliver support to decisive operations when that time comes. Specific FIB considerations include—

- Task-organizing some FIB cannon artillery battalions as reinforcing to organic BCT fires battalions. A general support-reinforcing support relationship may be appropriate where a higher degree of FIB centralized control is desired.
- Providing adequate support to the division covering force. In some instances, based on mission variables, a portion of the FIB may occupy the covering force AO and it is possible that the FIB will serve as the force field artillery HQ for the BCT executing the covering force mission.
- Establishing support and communications links with the sustainment brigade and sustainment areas to respond to penetrations of division sustainment areas by small attacking enemy forces.

4-32. In the retrograde, ground maneuver forces are continually in contact with the enemy and need responsive cannon delivered fires to assist in maneuver and breaking contact with the enemy. The FIB continues to centrally control fire support to support the force as a whole. Additionally, the FIB must retain the flexibility to mass fires in support of individual BCTs to facilitate disengagement and repositioning. Specific FIB considerations include—

- If the division, corps, or other FIB supported command organizes a covering force during the retrograde, providing adequate support to the supported command covering force. The FIB may serve as the force field artillery HQ for the BCT executing the covering force mission.

Positioning and Movement

Positioning

4-33. The FIB will most certainly be positioned in BCT sectors during the defense in contiguous operations. Close coordination between the FIB and the BCT operations staff officers (S-3) is vital to ensure the FIB is positioned to execute its missions but will not interfere with BCT movement or repositioning. In noncontiguous operations, the FIB may be given its own position area and some security assets to respond to localized threats. Specific FIB considerations include—

- Positioning sufficient assets forward to support a covering force if one is employed. If the FIB is the force field artillery HQ for the covering force, position some or all of the fire support assets in the covering force area.
- Planning positions well forward in BCT sectors.
- Positioning two thirds of the fires assets with the fixing force during a mobile defense and one third with the striking force.
- Positioning TA radars to augment the BCT assets in the covering force and to support the withdrawal of forces from the covering force area.
- Planning positions that allow two thirds of the fires assets to be in place to fire at any one time.
- Positioning TA radars to provide coverage while BCT radars are displacing.

Movement

4-34. Movement during defensive operations is closely tied to the movement of the ground maneuver forces. FIB movement is typically limited to withdrawal from the covering force area, lateral repositioning for survivability, and maneuver to support the striking force in a mobile defense. Specific FIB considerations include—

- Supporting the covering force BCT during withdrawal from the covering force areas.
- Moving one third of the FIB assets with the striking force during a mobile defense. Keep these assets moving for as long as possible to ensure they are in position when the decisive operation is executed.
- Supporting the cycling of BCTs from a division sustainment area. Plan sufficient stationary FIB forces to support battle handover between BCTs.
- Moving the FIB in concert with the covering force if the division, corps, or other FIB supported higher HQ employs a covering force to cover the retrograde of the command's main body. Consider establishing liaison with the covering force HQ to facilitate retrograde of the covering force and withdrawal through the supported command's main body.
- Echeloning units to keep two thirds of FIB assets in position to enable the supported higher HQ retrograde.
- Moving to positions that facilitate follow-on operations, such as establishment of a hasty defense.

Fires Brigade Target Acquisition

4-35. FIB TA assets are focused on locating of enemy indirect fire systems. Specific FIB considerations include—

- Positioning radars as far forward as possible to maximize range and acquire enemy systems capable of providing the enemy with long range preparation fires.
- Positioning lightweight countermortar radars (LCMR) to cover infantry defiles and strong points.
- Consider recommending to the division, corps, JTF, or other FIB supported commander that the FIB should coordinate the overall TA radar positioning and movement plan during the retrograde.
- Position long-range TA radars rearward early to provide extended coverage for the FIB supported command during the retrograde.

Close, Shaping, and Counterfire Operations in the Mobile Defense, Area Defense and Retrograde

Fires in Close Support to the BCTs

4-36. Close supporting fires for the BCT include—

- In mobile defense and area defense:
  - Providing massed fires to the BCT to break the momentum of an enemy attack in the main battle areas.
  - Providing counterfire support to the BCT as the enemy enters BCT engagement areas allowing the BCT's fires battalions to execute close support supporting fires for maneuver.
  - Providing scalable fires to disrupt enemy reinforcements in the BCT AO.
- In the retrograde:
  - Providing massed fires to the BCT to permit disengagement by the BCTs.
  - Providing counterfire support to the BCTs to support repositioning of BCT TA radars.
  - Linking UAS support BCTs with HIMARS/MLRS units to respond to acquired enemy fires units rapidly.
  - Providing scalable fires to disrupt enemy reinforcements within the BCT AO.

Fires in Support of Shaping Operations

4-37. Fires in support of shaping operations include—

- In mobile defense and area defense:
  - Providing FIB strike to delay, disrupt, and attrit attacking enemy forces beyond the covering force area.

- Supporting combat aviation brigade attack operations; neutralizing enemy air defense artillery systems by scalable means; providing scalable fires to support the combat aviation brigade attack.

- Employing joint fire support against enemy command and control and infrastructure (roads/bridges/tunnels) to shape the approach of attacking enemy forces.

- Executing strike in support of corps shaping operations.

- In the retrograde:

  - Providing FIB strike to delay, disrupt, and attrit attacking enemy forces to allow the supported command to conduct a retrograde operation.

  - Supporting combat aviation brigade attack operations – neutralizing enemy air defense systems by lethal and nonlethal means; providing scalable fires in coordination with the combat aviation brigade attack.

  - Requesting allocated joint air assets to strike enemy reserve forces that may reinforce units in contact.

  - Executing TA and strike fire missions in support of higher echelon shaping operations.

Counterfire Operations

4-38. Counterfire operations include—

- Aggressively seeking and attacking enemy long-range indirect fires systems prior to the enemy executing preparation fires.

- Employing allocated joint air assets against enemy indirect fires systems; continually cycle on-call close air support (CAS) against those targets.

- Providing force field artillery HQ coordination of TA radar movement and positioning throughout the retrograde operation.

4-39. Counterfire provided by a FIB to protect a FIB supported unit can occur in offensive, defensive, or stability operations.

Suppression of Enemy Air Defenses

4-40. *Suppression of enemy air defenses* (SEAD) is activity that neutralizes, destroys, or temporarily degrades surface-based enemy air defenses by destructive and/or disruptive means (JP 3-01). SEAD is critical to the survival of division, corps, JTF, and joint force commander (JFC) air assets. Accomplish it quickly and efficiently in support of air operations. It is an integral part of attack aviation planning, synchronized with, and integrated into, overall division, corps, or other supported command and combat aviation brigade (particularly air assault) operations. Fires suppress, neutralize, and destroy known and suspected threat air defense weapons, radars, and command and control elements. The division, corps, or other FIB supported command can engage SEAD targets out to the limit of the FIB's various weapon systems (such as the Army Tactical Missile System [ATACMS]). The division, corps, JTF, or other FIB supported command's fires cell is the focal point for coordinating joint and other service SEAD capabilities in support of Army aviation missions.

SECTION IV – THE FIRES BRIGADE IN OFFENSIVE OPERATIONS

GENERAL CONSIDERATIONS FOR THE FIRES BRIGADE IN OFFENSIVE OPERATIONS

4-41. *Offensive operations* are operations conducted to defeat and destroy enemy forces and seize terrain, resources, and population centers. They include movement to contact, attack, exploitation, and pursuit (ADP 3-0). Fires in support of the offense involve attacking targets throughout the AO with massed or precision indirect fires, air support, and electronic warfare assets to prevent enemy reinforcements, disengagement, or resupply. See FM 3-09 for general considerations in supporting the concept of operations during the offense.

4-42. Fires in support of offensive operations are responsive and timely to support maneuver and help the division, corps or other FIB supported command achieve and sustain the initiative. Supporting fires should never be out of range of advancing maneuver formations. The general tasks of the FIB in offensive operations include—

- Executing scalable fires in support of corps, division, JTF, or other FIB supported HQ shaping operations against uncommitted enemy forces' command and control nodes, fires and air defense networks, and enemy surveillance, reconnaissance and TA assets.
- Establishing support relationships to facilitate responsive reinforcing fires to lead supported command maneuver elements.
- Supporting BCTs (including special operations forces and organized and trained friendly indigenous forces) during the attack by providing close supporting fires to assist in isolating objective and fixing enemy forces.
- Shifting fire support to targets away from objectives to interdict enemy reinforcements and escape routes.
- Structuring communications networks to maintain continuous responsive fire support to maneuvering forces.
- Focusing available survey assets on extending control forward to support the movement of radars forward in support of the attack.
- Moving meteorological sections forward by echelon to provide continuous meteorological coverage to the force. Coordinating meteorological coverage plans with BCT fires battalions.

MOVEMENT TO CONTACT, ATTACK, EXPLOITATION, AND PURSUIT

4-43. *Movement to contact* is a form of the offense designed to develop the situation and to establish or regain contact (JP 1-02). Movement to contact creates favorable conditions for subsequent tactical actions. Forces executing this task seek to make enemy contact with the smallest friendly force feasible. On contact, the commander has five options: attack, defend, bypass, delay, or withdraw. Movements to contact include search and attack, and cordon and search operations. Movement to contact requires units to maintain sufficient mobility, agility, and combat power to gain enemy contact and to rapidly develop the situation. The FIB supports movement to contact by providing maximum fire support to the BCTs to allow the BCT commanders to focus their organic fire support on developing the situation once contact is established. The

FIB must balance this support with the requirement to quickly transition to shaping and counterfire missions as the situation develops.

4-44. An attack destroys or defeats enemy forces, seizes and secures terrain, or both. Attacks require maneuver supported by direct and indirect fires. They may be either decisive or shaping operations. Attacks may be hasty or deliberate, depending on the time available for planning and preparation. Commanders execute hasty attacks when the situation calls for immediate action with available forces and minimal preparation. They conduct deliberate attacks when there is more time to plan and prepare. Success depends on skillfully massing the effects of all the elements of combat power.

4-45. *Exploitation*, in the context of offensive operations, is an offensive operation that usually follows a successful attack and is designed to disorganize the enemy in depth. (JP 2-01.3). The objective of an exploitation is to complete the enemy's disintegration.

4-46. Pursuit is an offensive operation designed to catch or cut off a hostile force attempting to escape, with the aim of destroying it. A pursuit normally follows a successful exploitation. However, if it is apparent that enemy resistance has broken down entirely and the enemy is fleeing the battlefield, any other type or subordinate form of offensive operation can transition into a pursuit.

4-47. For more on offensive operations, see FM 3-90.

Task Organization and Support Relationships

4-48. The movement to contact is generally characterized by an undefined and uncertain situation. The FIB must maintain a higher degree of centralized control over organic and assigned assets in order to respond to a rapidly developing situation. Centralized control also gives the FIB the flexibility to provide efficient support to maneuvering BCTs—allowing the BCTs' organic fires battalions to continue movement with their BCTs in anticipation of contact with the enemy. Specific FIB considerations include—

- Assigning general support-reinforcing (GSR) missions to FIB cannon fires battalions to allow close support to the BCTs while retaining positioning authority with the FIB to facilitate follow-on reinforcing missions.
- Providing radar and meteorological support to the BCTs to allow them to continue to move their organic meteorological and radar assets during the movement to contact; coordinating handover of support to BCTs once the situation is developed.
- Establishing communications networks among the battlefield surveillance brigade, combat aviation brigade, and FIB fires cells. Identifying fire support assets to support battlefield surveillance brigades and combat aviation brigades working in the FIB supported command's AO.

4-49. During the attack, either hasty or deliberate, less centralized control of fires is used because the division, corps, JTF, or other FIB supported command will have the initiative in the attack. The main effort must be weighted by providing reinforcing or OPCON cannon battalion fires to the main effort BCT, and by positioning GS or GSR MLRS/HIMARS battalions within the zone or along the axis of the attacking BCT. The allocation of field artillery fires for the FIB supported command's main effort helps control the tempo of offensive operations. Specific FIB considerations include—

- Establishing communications channels to support battlefield surveillance brigade operations beyond the AO of the BCTs.

- Providing responsive fires in support of combat aviation brigade attack operations.
- Recommending employment options for a BCT's fires battalion when the BCT is held in reserve.

4-50. There is generally little time to establish and effect new task organizations or support relationships between an attack and exploitation and/or pursuit. These operations transition very quickly from one to another. Decentralized command and support relationships are the key. Specific FIB considerations include—

- Establishing a reinforcing support relationship for some or all FIB cannon artillery battalions to BCT fires battalions.
- Providing GSR MLRS/HIMARS fires to the direct-pressure force.
- Providing a communications channel to the battlefield surveillance brigade to allow rapid attack of escaping enemy forces.

Positioning and Movement

Positioning

4-51. In the movement to contact, positioning of FIB units must allow execution of lethal and nonlethal fire support to the BCTs, as well as the majority of the meteorological and radar coverage for them. In the movement to contact, it is unlikely the FIB will be given its own AO for maneuver, as the situation is too unclear. Consequently, the FIB will position units in the BCTs' AO. Specific FIB considerations include—

- Positioning general support (GS) and GSR cannon battalions to support BCTs with close supporting fires and rapidly transition to reinforcing missions as the situation develops.
- Coordinating positioning of MLRS/HIMARS fires battalions well forward to maximize range and allow transition to support for strike and counterfire.
- Deconflicting fires unit positions with airspace coordinating measures.
- Positioning counterfire and countermortar radars to maintain radar coverage for the BCTs as they continue to maneuver with their radars.
- Positioning the FIB CP forward (METT-TC dependant)—perhaps located near the division TAC CP (if deployed).

4-52. During the attack, either hasty or deliberate, less centralized control of fires is used because the division, corps, JTF, or other FIB supported command will have the initiative in the attack. The main effort must be weighted by providing reinforcing or OPCON cannon battalion fires to the main effort BCT, and by positioning GS or GSR rocket/missile battalions within the zone or along the axis of the attacking BCT. The allocation of field artillery fires for the FIB supported command's main effort helps control the tempo of offensive operations. Specific FIB considerations include—

- Establishing communications channels to support battlefield surveillance brigade operations beyond the AO of the BCTs.
- Providing responsive fires in support of combat aviation brigade attack operations.

- Recommending employment options for a BCT's fires battalion when the BCT is held in reserve.

4-53. The FIB may still be in its own zone or axis following the attack. If this is the case, the brigade will continue to maneuver through this AO for the exploitation and pursuit. If the brigade is maneuvering in BCTs AOs, across the division, corps, JTF, or other FIB supported command's AO, brigade S-3s must coordinate positioning. The positioning considerations are the same as for the movement to contact as the situation is similarly characterized by a fluid and dynamic situation. Specific FIB considerations include—

- Positioning the majority (two thirds or more) of the FIB assets with the direct pressure force. Move very mobile rocket/missile assets with the encircling force.
- Using echeloned movement to provide continuous coverage to the force.
- Positioning a small fires unit (MLRS/HIMARS battery) well forward in each BCT formation to set to support the pursuit.
- Coordinating with BCTs or the battlefield surveillance brigade for UAS launch/recovery support while the FIB section is displacing.

Movement

4-54. Timely displacements are essential for successful offensive operations. Units positioned by the FIB may be in danger of being left behind unless repositioning is frequent and synchronized to support the forward progress of BCTs. Displacements should maximize continuous delivery of fires and be completed as rapidly as possible.

4-55. In the movement to contact, the movement of FIB assets must be coordinated with the maneuver of the BCTs to provide continuous fires, radar, and meteorological coverage for the force. Given the uncertain enemy situation in a movement to contact, the assets should move as far forward as practical to allow maximum flexibility once the situation develops. Movement of the FIB assets is coordinated with the supported higher HQ, the FIB S-3, BCTs, and other support brigade S-3s. Specific FIB considerations include—

- Using echeloned movement to provide continuous coverage to the force.
- Moving a small fires unit (perhaps an MLRS/HIMARS battery) well forward with each BCT to support the battlefield surveillance brigade forward of the force.
- Coordinating with BCTs or the battlefield surveillance brigade for UAS targeting support.

4-56. Field artillery units move well forward prior to an attack, displacing by echelon and carrying maximum amounts of ammunition. In addition to those considerations identified for movement to contact, specific FIB considerations include—

- Providing radar/meteorological coverage for the BCTs to allow the uninterrupted movement of their assets forward during the attack.

4-57. Movement during exploitation and pursuit is likely to be rapid and unpredictable. It will be characterized by a series of short, sharp engagements, followed by very fast movement in pursuit of the enemy. In addition to the considerations for movement to contact and attack, specific FIB considerations include—

- Executing aggressive movement to maintain positioning to support the division, corps, JTF, or other FIB support command—massed fires are critical to the success of exploitation and pursuit.
- Moving fires units as far forward in the BCT formations as practical.

Fires Brigade Target Acquisition

4-58. In a movement to contact, FIB TA assets are focused on identifying enemy indirect fires systems to support their targeting and attack. The FIB must support the BCTs with radar coverage to allow the BCTs' organic radars to continue to maneuver with the BCT. Coverage must also be given to vulnerable division, corps, or other supported command sustainment sites. As the situation develops FIB TA assets will transition to support shaping and counterfire missions. Specific FIB considerations include—

- Positioning TA radars as far forward as possible to maximize range and provide maximum flexibility as the supported command continues offensive operations.
- Positioning LCMRs to cover critical point targets that are vulnerable to mortar fire from bypassed regular or irregular forces.
- Implementing radar coverage in support of the BCTs to allow the radars in the BCT organic fires battalions to continue to maneuver with the BCT.
- UAS, if available, are employed forward of advancing MLRS and HIMARS batteries to reconnoiter routes and position areas—particularly to identify by-passed enemy forces.

4-59. For an attack, FIB TA assets are focused on identifying enemy systems that can interdict the division, corps, JTF, or other FIB supported command as it moves forward during the attack. The FIB plays a pivotal role in ensuring the momentum of the supported command is not lost during the attack. The FIB must focus radars—linked to fire support systems—to insulate the advancing division, corps, or other supported command from interference as the maneuver forces posture for and execute close operations. In addition to the considerations identified during a movement to contact, specific FIB considerations include—

- Coordinating radar coverage across the FIB supported command's AO to ensure there are no gaps in coverage.
- Executing TA to support higher echelon shaping operations.

4-60. During an exploitation or pursuit, FIB TA assets are focused on acquiring enemy fires assets that are assisting enemy forces in breaking contact with the division, corps, JTF, or other supported command, and locating bypassed enemy artillery units and systems which can attack vulnerable FIB supported command's mission command and sustainment systems. In addition to the considerations identified for the movement to contact and attack, a specific FIB consideration is—

- Monitoring TA radar acquisitions for indications of field artillery delivered scatterable mines by the enemy.

Close and Shaping Fires, and Counterfire

Fires in Close Support of the BCTs

4-61. During movement to contact, fires in close support of the BCTs include—

- Providing responsive precision munitions (such as Excalibur) cannon fires to the BCTs to allow their organic fires battalions to continue to maneuver during the movement to contact.
- Providing radar coverage and counterfire support to the BCTs to prevent interruption of the movement of the BCTs and their organic fires battalions.
- Transitioning cannon battalions from GS or GSR to reinforcing once the situation is developed and the BCTs begin to conduct follow-on offensive or defensive operations.

4-62. Fires in close support of the BCTs' attacks include—

- Providing preparation fires to shape the close fight.
- Providing massed fires to the BCTs to support penetration of enemy positions.
- Providing radar coverage and counterfire support to the BCTs to prevent interruption of the movement of the BCTs during the approach.
- Responding to requests for support by the BCTs against uncommitted and repositioning enemy forces in the BCT AO.

4-63. Fires in close support of the BCTs during exploitation and pursuit include—

- Providing massed fires to the BCT to destroy enemy hasty defenses and allow the BCT to continue the pursuit of the enemy main body.
- Providing all counterfire for the BCT to allow their organic and reinforcing fires battalions to mass fires on fleeing maneuver forces.

Fires in Support of Shaping Operations

4-64. During a movement to contact, fires in support of shaping operations include—

- Providing TA, joint fires, and any assigned, attached, or OPCON maneuver forces to secure the unprotected flanks of vulnerable division, corps, or other FIB supported command assets during advances.
- Supporting division, corps, or other FIB supported command deception operations through destruction of enemy command and control facilities and nodes.
- Attacking bridges and other mobility corridors with FIB strike and joint fires to limit enemy mobility options and shaping the meeting engagement for the BCTs.
- Executing TA and long-range strike fire missions for FIB supported command shaping operations against enemy airfields and uncommitted maneuver forces.

4-65. Attack Fires in support of shaping operations include—

- Attacking enemy operational reserves and second echelon forces outside the BCT AO using joint fires.
- Supporting combat aviation brigade attack operations; locating and neutralizing enemy air defense systems by lethal and nonlethal means.
- Providing TA, joint fires, and any OPCON maneuver forces to secure the unprotected flanks of vulnerable division, corps, JTF, or other FIB supported command assets during the advances.
- Supporting division, corps, or other FIB supported command deception operations through destruction of enemy command and control facilities and nodes.
- Executing TA and FIB strike in support of division, corps, JTF, or other supported command shaping operations.

4-66. Fires in support of shaping operations during exploitation and pursuit include—

- Executing shaping operations by conducting FIB strike to slow and disorganize repositioning and withdrawing enemy forces.
- Supporting combat aviation brigade attack operations; locating and neutralizing enemy air defense systems by lethal and nonlethal means; providing scalable fires to support the combat aviation brigade's attack.
- Preventing the establishment of an organized defense through destruction of enemy command and control facilities and nodes.
- Executing TA and strike in support of division, corps, JTF, or other supported command's shaping operations.

Counterfire

4-67. Counterfire tasks in a movement to contact includes—

- Coordinating for UAS assets to conduct armed reconnaissance of target areas of interest developed to attack enemy fires assets.
- Requesting a joint air allocation to rapidly employ against identified enemy indirect fire assets.

4-68. Counterfire during an attack includes—

- Executing counterfire to neutralize enemy fires systems prior to the approach of the FIB supported command during the attack.
- Integrating CAS into counterfire operations—developing procedural control measures for rapid employment against acquired fires systems.
- Coordinating counterfire surveillance and reconnaissance requirements with the battlefield surveillance brigade and division, corps, JTF, or other FIB supported command assistant chief of staff, intelligence (G-2).
- Establishing communications channels between surveillance, reconnaissance and TA assets and MLRS/HIMARS fires battalions for immediate execution of counterfire missions.

4-69. Counterfire during exploitation and pursuit operations include—

- Executing counterfire in the division, corps, JTF, or other FIB supported command's AO.
- Preventing enemy fires systems from slowing the FIB supported command's pursuit and allowing time for the enemy to establish a defense.

SECTION V – THE FIRES BRIGADE IN STABILITY OPERATIONS

GENERAL CONSIDERATIONS FOR THE FIRES BRIGADE IN STABILITY OPERATIONS

4-70. *Stability operations* is an overarching term encompassing various military missions, tasks, and activities conducted outside the United States in coordination with other instruments of national power to maintain or reestablish a safe and secure environment, provide essential governmental services, emergency infrastructure reconstruction, and humanitarian relief (JP 3-0).

4-71. Stability operations may encompass activities where FIB elements may be employed in support of operations in nontraditional combatant roles. Field artillery fire support resources and units may be tasked to perform security, humanitarian, or any number of support missions. The FIB's mission command networks and system, transportation, observation, liaison, and logistics capabilities can be applied as part of the division, corps, JTF, or other supported command responsibilities. Convoy operations, local security operations, and liaison in defense support to civil authorities are potential missions of value to the force.

4-72. Rapid transition to providing scalable fires is also possible. In any case, specific rules of engagement must be developed and clearly communicated and enforced down to the lowest level. Rules of engagement that specify when fires are appropriate, justified, and authorized are essential to avoid situations detrimental to the overall success of the operation.

4-73. Performing in these essential but nontraditional roles is not without cost for the FIB. Stability operations may include commitment in a deterrent posture, but may quickly transition to combat operations. Minimum preparations include those necessary for protection and base defense for all-around security. Planning factors may include minimum force, preclusion of collateral damage, host nation coordination, and political implications. Integration of AC-130 aircraft, CAS, and AH-64 attack helicopters may be required.

4-74. Stability operations also place a high priority on TA to protect the force and assist in enforcing peace settlements.

4-75. Fires units and their elements are high-value targets for the enemy and will require protection from enemy air and ground units. The FIB elements may be positioned in the division, corps, JTF, or other supported command AO among noncontiguous BCT AOs. In some cases, the division, corps, JTF, or other FIB supported higher HQ commander will task-organize forces to provide protection. In other cases, the FIB elements will coordinate directly with other units in the area to develop defensive and mutual support plans.

4-76. Many FIB units have very limited self-protection capability. Elements that need to be secured include HQ elements, CPs and mobile command groups; isolated elements (radar, met, survey); and fires battalions (especially MLRS and HIMARS). Survivability of these units is critical to the success of the supported command and subordinate BCTs. The supported commander and BCT commanders may

consider including forces to provide security and protection for FIB elements as specified tasks in operation plans (OPLAN) and operation orders (OPORD).

4-77. For more on stability operations, see ADP 3-0, FM 3-57, FM 3-24, FM 27-10, JP 3-08, and JP 3-57.

Chapter 5

Fires Brigade Sustainment Operations

The brigade support battalion (BSB) is the core sustainment organization for the fires brigade (FIB). The BSB is organic to the FIB, and consists of functional and multifunctional companies assigned to provide support to the FIB. The BSB has forward support companies that are traditionally under the operational control of individual FIB battalions. The forward support company provides each subordinate fires battalion commander with dedicated logistics assets organized specifically to meet the battalion's requirements. The forward support company commander receives technical logistics oversight from the BSB commander.

SECTION I – FIRES BRIGADE SUSTAINMENT STAFF AND ORGANIZATION

5-1. *Sustainment* is the provision of logistics and personnel services required to maintain and prolong operations until successful mission accomplishment (joint publication [JP] 3-0). Sustaining operations enable the decisive operation or shaping operation by generating and maintaining combat power. The *sustainment warfighting function* is the related tasks and systems that provide support and services to ensure freedom of action, extend operational reach, and prolong endurance (ADP 3-0).

5-2. The sustainment and fires warfighting functions have a dynamic relationship. Fires disrupt, neutralize, or destroy enemy forces, combat functions, and facilities that threaten sustainment operations. Supply of ammunition is among the largest and most time-sensitive of logistics tasks. Field artillerymen in maneuver organizations, the FIB, and fires battalions are sustained by personnel services and health service support. Sustainment ensures the endurance of fires that support all operations. For more on the sustainment warfighting function, see ADP 4-0. For more on the fires warfighting function, see ADP 3-0 and FM 3-09.

FIRES BRIGADE SUSTAINMENT STAFF

FIRES BRIGADE SUSTAINMENT – S-4 SECTION

5-3. The FIB sustainment – S-4 section provides staff oversight for sustainment in the areas of supply, maintenance, transportation, and medical and field services. The logistics staff officer (sustainment officer) (S-4), in conjunction with the BSB support operations officer, acts as the staff integrator for the BSB, which executes sustainment operations for the FIB. The S-4 section assists the BSB support operations officer (the support operations officer is the lead sustainment planner) in developing a sustainment plan for the FIB. The S-4 section uses Standard Army Management Information System systems to provide the FIB commander logistics oversight within the FIB. See also ADP 4-0, FM 7-15, and ATTP 5-0.1.

FIRES BRIGADE SUSTAINMENT – S-1 SECTION

5-4. The FIB sustainment – S-1 section is responsible for maintaining and conducting unit strength and other human resources support. The section maintains a record of accountability of all personnel assigned and attached to the FIB. When the FIB receives attachments, the personnel staff officer (strength manager) (S-1) orients those units to processes that maintain personnel accountability and arranges for the necessary

administrative support for those units. The S-1 manages the casualty reporting system, which includes Soldiers killed in action and wounded in action. The personnel section uses automated human resources support system and coordinates financial management and medical support for the FIB. The S-1 also maintains close coordination with the human resources operations branch of the sustainment brigade and the brigade's support operations officer for situational awareness and technical guidance. Although the S-1 coordinates the staff efforts of the FIB surgeon, he generally receives guidance from the FIB deputy commander or executive officer. The FIB deputy commander or executive officer manages and coordinates specific assignments made to the FIB surgeon; such assignments would be those that would not be within the usual realm of surgeon responsibilities. The S-1 is also the staff point of contact for inspector general and morale support activities. See FM 1-0, FM 7-15, and ATTP 5-0.1 for additional information.

FIRES BRIGADE UNIT MINISTRY TEAM

5-5. Chaplains are assigned to military units to assist commanders in providing the right of free exercise of religion to all personnel. The FIB chaplain is a personal staff member who serves as a confidential advisor to the commander on the spiritual fitness, ethical, and moral health of the command. The FIB chaplain plans, synchronizes, and coordinates religious support within the FIB area of responsibility. He is responsible for the professional oversight of the battalion unit ministry teams. See FM 1-05, FM 7-15, and ATTP 5-0.1 for additional information.

FIRES BRIGADE SURGEON

5-6. The FIB surgeon is a special staff officer who is responsible for Army Health System operations in the FIB. The FIB surgeon exercises technical control as permitted by the FIB commander over medical activities in the FIB. He provides staff oversight and supervision for Army Health System operations in the FIB and coordinates with the BSB support operations officer in developing the FIB's medical concept of support. The FIB surgeon keeps the commander informed of the health of the command. The FIB brigade surgeon section ensures timely planning, integration, and synchronization of Army Health System operations with the FIB operations plan. The brigade surgeon section of the FIB coordinates with the surgeon and medical units of any FIB supported headquarters (HQ) and its subordinate units, the FIB medical platoon and sections, the BSB medical operations section, and other staff elements to ensure that Soldiers receive complete and comprehensive medical support. See FM 1-0, ATTP 4-02, and ATTP 5-0.1 for additional information.

FIRES BRIGADE STAFF JUDGE ADVOCATE TEAM

5-7. The FIB staff judge advocate is the special staff officer responsible for operational and administrative law support to the FIB. He is the FIB commander's personal legal advisor. The FIB staff judge advocate team provides support to the FIB commander and staff in five major areas: criminal law, operational and international law, administrative and civil law, legal assistance, and general administration. The staff judge advocate team members provide the FIB staff with immediate access to the legal expertise they need to prevail in an increasingly complex and legally intensive operational environment. See AR 27-10 and FM 1-04 for additional information.

BRIGADE SUPPORT BATTALION

5-8. The BSB is the FIB's organic sustainment unit. The BSB commander is the FIB commander's primary sustainment operator.

5-9. The BSB provides a materiel carrying capability that enables the FIB to conduct sustained operations for a finite period. FIBs are organized with the self-sustainment capability for up to 72 hours of combat. Beyond 72 hours, sustainment organizations are required to conduct replenishment of FIB combat loads. That is a function of the sustainment brigade.

5-10. The BSB plans, coordinates, synchronizes, and executes logistics operations in support of FIB operations. The BSB typically plans and executes replenishment operations in support of FIB battles and engagements—they are deliberate, time sensitive operations conducted to replenish forward support companies. The intent is the rapid replenishment of essential supplies, such as Class III (B) and Class V, to sustain the force. When required, a supporting sustainment brigade may augment FIB BSB capabilities during BSB planned and executed replenishment operations.

BSB COMMANDER

5-11. FIB sustainment operations are generally of sufficient scope and complexity that command oversight is needed. The BSB commander performs this function for the FIB commander with duties and responsibilities including—

- Directing tactical logistical support and personnel support for the FIB.
- Recommending priorities for logistical support.
- Synchronizing the maneuver enhancement and sustainment portions of plans and orders.
- Maintaining status of logistical support to the FIB.
- Coordinating location of BSB components with the main command post (CP), tactical command post (TAC CP), and BSB commander.
- Directing FIB sustainment cell staff coordination with higher, subordinate, supported, supporting, and adjacent units.
- Providing the FIB commander and HQ periodic updates on logistics status.
- Assessing logistical and personnel readiness of subordinate units after mission completion.
- Supervising mission staging operations and stability operations.
- Organizing and leading the advanced party for the FIB during deployment operations.

BSB SUPPORT OPERATIONS OFFICER

5-12. The BSB support operations officer (assisted by the FIB S-1, S-4 and the FIB surgeon) is the lead planner for sustainment in the FIB. He is the principal staff officer for coordinating support for all units assigned to the brigade. The support operations officer provides planning, preparation, and mission command of the execution of all BSB sustainment operations in the FIB's area of operations (AO). The support operations officer also provides technical supervision of all sustainment operations conducted by the BSB and is therefore the key interface between supported units and the sustainment brigade. He is responsible for communicating BSB sustainment requirements to the sustainment brigade, as these requirements become known. Requirements are determined in coordination with the FIB S-1, FIB S-4, BSB intelligence staff officer (S-2), and BSB operations staff officer (S-3). The support operations officer performs logistics preparation of the battlefield and advises the commander on the relationship of support

requirements to support assets available. The support operations officer plans and monitors support operations and makes necessary adjustments to ensure support requirements are met, and provides the status of support operations tracked systems and materiel as required to update the BSB logistics report.. BSB support operations officer duties and responsibilities include—

- Developing logistics plans to support FIB operations.
- Coordinating with supporting sustainment brigades on current and future support requirements and capabilities.
- Conducting logistic preparation of the battlefield.
- Assisting the FIB S-4 in maintaining the sustainment common operational picture.
- Coordinating for all classes of supply.
- Monitoring, analyzing, and evaluating maintenance trends and failures and recommending solutions for maintenance issues.
- Monitoring, evaluating, and anticipating supply requirements.
- Planning transportation support for special requirements such as casualty evacuation or heavy equipment transport support.
- Coordinating for food preparation, water purification, mortuary affairs, ice delivery, shower, laundry, and clothing repair.
- Recommending sustainment priorities to the commander.
- Coordinating contract support.
- Coordinating with Army Materiel Command/Defense Logistics Agency for field service representative support.
- Assisting with development of input to the sustainment portion of FIB plans and orders. The BSB support operations officer is responsible for assisting the FIB S-4 in developing and coordinating Paragraph 4, Sustainment and its supporting annexes including ANNEX F (Sustainment) (with the FIB S-1, staff judge advocate, surgeon, and chaplain) and Annex P (Host-Nation Support) to FIB plans and orders.

BSB ORGANIZATION

5-13. The FIB BSB includes a headquarters and headquarters company (HHC), a distribution company, a field maintenance company, and for each of the fires battalions, a forward support company.

BSB Distribution Company

5-14. The distribution company provides the planning, direction, and supervision of supply distribution and transportation support to the brigade combat team, daily receipt, temporary storage, and issue of Supply Classes I, II, III, IV, V, and IX to the FIB. This unit also provides for the transportation of cargo and the water purification and distribution for the FIB.

BSB Field Maintenance Company

5-15. The mission of the field maintenance company is to provide field level maintenance support for the FIB. This unit is employed in the brigade support area and operates as part of the BSB. This unit provides field maintenance support to units in the brigade support area, technical inspection services, shop stock, and bench stock, maintenance management and production control functions. The field maintenance company provides lift capabilities for the repair shops, recovery of organic equipment, recovery to supported units, and support of maintenance evacuation.

BSB Forward Support Companies

5-16. There is one forward support company for each fires battalion in the FIB. These forward support companies may be attached or placed OPCON to the fires battalions, with technical oversight provided by the BSB. The forward support company commander is responsible for executing the sustainment plan for the FIB's fires battalions in accordance with the supported fires battalion commander's guidance.

5-17. The forward support companies have a HQ section, field feeding section, distribution platoon, and a maintenance platoon. The distribution platoon consists of a platoon HQ, Class III section, general supply section, and a Class V section. The maintenance platoon consists of a platoon HQ, maintenance control section, maintenance section, service and recovery section, and the field maintenance teams.

5-18. A representative from the BSB distribution operations section, together with representatives from other agencies and sections form a sustainment planning cell, generally at the FIB main CP, to ensure sustainment plans are fully integrated and synchronized into all FIB operation plans. Standing operating procedures (SOP) should be the basis for sustainment operations, with planning conducted to determine specific requirements, and to prepare for contingencies. FIB and subordinate unit orders should address only specific support matters for operations and any key deviations from SOPs.

5-19. To provide effective support, sustainment planners and operators must understand the FIB mission statement, commander's intent, and concept of the operation. The FIB S-4, assisted by the BSB support operations officer, is responsible for producing Paragraph 4, Sustainment; Annex F (Sustainment) and Annex P (Host-Nation Support) These annexes should include the following—

- Commander's priorities.
- Class III/Class V resupply during the mission, if necessary.
- Movement criteria.
- Type and quantities of support required.
- Priority of support, by type and unit.
- Sustainment overlay.
- Supply routes.
- Logistic release points.
- Casualty evacuation points.
- Maintenance collection points.

5-20. For more on the BSB see FM 4-90.1.

SUSTAINMENT FOR ATTACHMENTS

5-21. Attachments to the FIB should arrive with their appropriate sustainment augmentation. When a unit is attached to the FIB, the FIB S-4 integrates their sustainment augmentation pieces into the FIB support system. The FIB S-4 must clearly state who will provide medical, maintenance, recovery services, and provide support for Class III, V, and IX supplies. When receiving attachments, sustainment planners require some basic information from the sending unit's S-4 to anticipate how to develop a synchronized concept of support. Some considerations are—

- Number and type of vehicles, personnel by specialty, and weapons systems.
- Current status and/or strength.
- When the attachment is effective and for how long.
- The support assets are coming with the attached unit(s).
- When and where linkup will occur, and who is responsible for linkup.

SECTION II – FIRES BRIGADE SUSTAINMENT FUNCTIONS

SUPPLY AND TRANSPORTATION

5-22. The concept of sustainment for the FIB and subordinate units calls for the BSB to provide sustainment for the FIB and sustainment oversight of the fires battalion forward support companies. The BSB provides sustainment for FIB organic elements (less the rocket/missile battalion), units assigned and attached to the FIB and, on an area basis, support for units that do not have such support. Generally, all classes of supply (less Class VIII) will be throughput from the division, corps, joint task force (JTF), or other FIB supported command's sustainment brigade directly to the forward support.

SUPPLY

Class I and Water

5-23. FIB units deploy with three days of operational rations (meal, ready to eat as its unit basic load). The BSB draws its operational supplies once it is in the joint operations area. Theater food service officers provide guidance on when to introduce unitized group rations and other ration supplements. Depending on the commander's guidance after deployment, fresh food (A-rations) may be available through regional commercial contractors.

5-24. The FIB provides water to Soldiers in two forms: bulk, and bottled (or packaged). The water comes through an organic water purification and distribution capability, when feasible. Individual Soldiers use water as needed. The FIB provides bottled water on a limited basis, usually during the deployment phase of operations. The primary source for bottled water is regionally available contract sources. Non-potable water should be used only for cleaning and decontaminating vehicles and other equipment.

5-25. Bottled water containers are issued based upon the same unit daily strength reports used for rations and field feeding. Bottled water and rations are broken down into daily battalion lots at the BSB

distribution point, and pushed when possible by the appropriate supply section (forward support or non-maneuver companies).

5-26. The BSB receives, stores, and distributes water. The BSB might not have adequate equipment to satisfy the FIB's requirements for water purification, and thus requires augmentation. Each battery has water trailers and five-gallon containers for distributing potable water. Battery supply sergeants maintain water trailers in their battery area, and refill from the FIB sustainment area. Refilling of five-gallon containers occurs during logistics package operations. Usually, a one-for-one exchange is conducted with the containers (one empty for one full); the supply sergeant refills the containers.

Class II & III (Packaged)

5-27. Usually, the FIB deploys with 30 days of common consumable supplies. Battery supply sergeants maintain the appropriate level of chemical, biological, radiological, and nuclear (CBRN) protective equipment (one to three sets). The BSB provides these supplies, which the FIB maintains as part of its authorized stockage list. Vehicles also carry a small amount of commonly used packaged petroleum products for immediate use. These loads are established by the unit SOP.

5-28. Battery or company supply sergeants use standard Army maintenance system-enhanced (SAMS-E) from the BSB to order and replenish supplies. Supplies are provided at the FIB distribution point (usually within the FIB sustainment area) to the supporting supply unit (forward support or non-maneuver companies) for the appropriate battery or company. They are carried forward with the next logistics package, or immediately, if needed.

Religious Supplies

5-29. The unit ministry team of the FIB orders consumable chaplain supplies as necessary. These supplies are considered Class II.

Maps

5-30. Maps are considered a Class II supply. The battery/company supply sergeant uses SAMS-E to order maps. Unit SOPs should detail the specific procedures for digital maps.

Class III (Bulk)

5-31. The FIB usually deploys with half-full vehicle fuel tanks, purged fuel tankers, and empty fuel cans. Fuel is issued upon the FIB's arrival in the joint operations area. A dedicated fuel asset within the FIB issues gasoline for unmanned aircraft.

5-32. Battalion S-4s forecast their units' requirements based on the current or upcoming mission. The FIB S-4 considers battalion forecasts and reports, and then estimates his own resupply requirements. The FIB S-4 submits his forecast to the BSB support operations officer. The forecast depends on the unit SOP, but usually is for the 72-hour period beyond the next day, or out to 96 hours. The BSB fuel and water support platoon transports fuel to the forward support companies for maneuver battalions or the non-maneuver companies. Forward support companies use heavy expanded mobility tactical truck load handling system fuel pods to conduct forward distribution to the batteries/companies, CPs, and attachments.

Class IV

5-33. FIB units deploy with a limited amount of Class IV barrier materiel, primarily for protection of unit perimeters and key positions. This materiel is considered the unit's basic load, and usually is carried on tactical vehicles.

5-34. Battery supply sergeants use SAMS-E to order and replenish Class IV supplies from the BSB. Supplies are provided from the FIB distribution point (usually within the FIB sustainment area) to FIB units. They are carried forward with the next logistics package, or immediately, if needed. Barrier materiel may also be requested as expeditionary support packages.

Class V

5-35. A basic combat load is the unit commander's designated quantity of munitions and items authorized to be carried by unit personnel and combat vehicles (turret-load). Troop-carried munitions to accompany troops are those issued before departure from the aerial port of embarkation. Turret-load/combat load munitions are those authorized for transportation in thick-skinned vehicles for deployment purposes.

5-36. Battalion S-4s determine the ammunition resupply requirements based on information provided in the batteries/companies' logistics situation report, and guidance received from their commander and S-3. The FIB S-4 considers battalion forecasts and reports, consults with FIB operational planners, and then makes his own forecast for resupply. The forecast is submitted to the BSB support operations officer.

5-37. To sustain tactical operations, operation planners determine their munitions requirements and develop a required supply rate. S-3s compute required supply rates as rounds per weapon per day. Logistics planners consider the required supply rate, available stocks, and due in stocks, and develop a controlled supply rate. The controlled supply rate limits the issue of munitions that are in short supply. If the required supply rate exceeds the controlled supply rate, the commander determines who receives the ammunition.

5-38. Until the Property Book Unit Supply Enhanced automates the ammunition issue process, the battalion S-4s prepare a Department of the Army (DA) Form 581 for their forward support companies to deliver to the BSB. Supplies are provided from the FIB ammunition transfer and holding point (usually within the FIB sustainment area) to the forward support company. They are carried forward with the next logistics package or immediately, as required. Ammunition and explosives are accounted for and provided proper physical security at all times.

Class VI

5-39. FIB Soldiers usually carry 30 days' worth of personal comfort items with them when deploying. Soldiers replenish their own supplies through the Army and Air Force Exchange System or local purchase.

5-40. Health and comfort packs provide forward area troops everyday necessities required when the Army and Air Force Exchange System is not available. Delivery of health and comfort packs is based on headcounts provided for field feeding. There are three types of health and comfort packs available—

- The Type I health and comfort pack contains articles used by both males and females. It supplies 10 individuals for approximately 30 days. Each shipping container contains 10 prepackaged polyethylene bags with a drawstring closure containing a designated quantity of 17 items for issue to 10 individuals. Each shipping container also contains other items intended as general supply for replacement or issue as needed.
- The Type II health and comfort pack is for females only, and contains articles for feminine hygiene. It can supply 10 females for approximately 30 days.
- The Type III health and comfort pack consists of a personal body wipe packet, bulk packed with 40 packets per box. Each packet contains 10 washcloth-size body wipes. Contents of each box are intended for 10 individuals.

Class VII

5-41. Units should deploy with all of their required equipment based on their modified table of organization and equipment (TOE). There might be additional equipment issued in the joint operations area. For example, units such as the FIB's target acquisition battery (TAB) and the FIB's signal network support company could receive non-standard equipment while in the joint operations area. Battery/company commanders must ensure their supply sergeants establish accountability on new equipment by creating hand receipts from packing lists or inventory. New equipment must be reported through the battalion S-4 and FIB S-4 to the appropriate property book officer.

5-42. Class VII replacement is based on losses reported through command channels to the FIB S-3 and S-4 per unit SOP. This enables the commander to remain apprised of the operational status of subordinate commands, and to direct the distribution of items to those units having the most critical need. Replacement Class VII equipment is delivered to the FIB in the FIB sustainment area. The FIB S-4 and BSB support operations officer should confirm whether replacement weapons systems (for example, M109A6 Paladins) will be delivered with basic issue items, additional authorized list, munitions, and crew.

5-43. Low density, specialized equipment in the FIB CPs, TAB, and signal network support company might require additional evaluation by DA civilians or contractors before classifying it as a loss. Care should be taken before returning this damaged equipment to the supply system.

Class VIII

5-44. Usually medical units deploy with a three to five day supply of consumable medical supplies, and all batteries/companies deploy with complete combat lifesaver bags. Initially, sustainment supplies are pushed to the medical company providing area support to the FIB and each fires battalion medical platoon based on theater casualty estimates. Individual Soldiers should deploy with a 180-day supply of their prescribed medications. As they deploy, Soldiers must advise their supporting medical unit of their specific needs so the medical logistics system can sustain these prescriptions.

5-45. Resupply of medical supplies is through medical channels. The fires battalion medical platoon personnel are responsible for maintaining their medical equipment sets. Combat lifesavers and battery or platoon medics receive replenishment for their aid bags from their unit medical platoons. To prevent unnecessary depletion of blankets, litters, splints, and other medical equipment, the receiving medical facility (such as the area support medical company) exchanges similar properties with the battalion medical platoon when it accompanies the patient. Class VIII resupply can also be accomplished via unmanned aircraft system (UAS) and the precision aerial delivery system.

5-46. Each battery or company in the FIB stocks and deploys with combat spares for repair parts (such as weapons and radio maintenance). Combat spares are a combination of prescribed load list, shop stock, and bench stock. These stocks are based on demand history and usually prescribed to be a 30 days' supply. The battery or company's combat spares are not consolidated at the battalion level, but kept at battery or company level. The forward support companies supporting fires battalions also have combat spares or shop stock to support maintenance of vehicles, generators, and other equipment.

5-47. The battery/company supply sergeant and maintenance personnel replenish their combat spares, and order other parts as needed through the BSB. Class IX repair part requisitions are prioritized based on the commander's priority of maintenance and need.

Class X

5-48. Materiel for stability operations usually is provided by the host nation, nongovernmental organizations (such as the Red Cross), or the Department of State. Once the FIB is tasked to conduct stability operations, the FIB S-4 coordinates with the BSB support operations officer and civil affairs officer (if provided) to establish procedures to quantify the amount of supplies ordered (purchased) or donated for humanitarian assistance The FIB can use military vehicles to transport materiel for non-military use.

Expeditionary Support Packaging

5-49. To facilitate the ordering and distribution of supplies, the Army uses expeditionary support packages to package commonly requested supplies. Expeditionary support packages are used for training exercises, deployments, war reserves, pre-positioned stocks, and predictable demands to meet the unit commanders' requirements.

5-50. To expedite the delivery of supplies from war reserves and pre-positioned stocks, expeditionary support packages allow a minimum of handling from the storage point through the transportation system and into the FIB subordinate units. These loads are equipped with radio frequency tags or other automated methods. The radio frequency tags and automation enable logisticians to track supplies and redirect the expeditionary support packages; this accommodates changes in missions and/or priorities.

5-51. Expeditionary support packages are appropriate for all classes of supply, except some class VII major end items. Expeditionary support packages have been designed to include the following supplies—

- Class I (rations) and water.
- Class V (munitions).

5-52. The FIB uses standard expeditionary support packages in conjunction with a "pure palleting" method that provides responsive support for meeting actual requirements during the sustainment phase of operations. This enables commanders to order only what is necessary and minimize returns of unnecessary material.

Pure Palleting

5-53. Pure palleting is a process that collects all supply requisitions for a given unit using the FIB's Department of Defense activity address code (DODAAC); configures standard expeditionary support packages and other supply items into loads; then throughputs them to their destination. Time limit for the collection process is usually three days. Packages not filling a whole pallet are then combined with other packages to produce consolidated loads; those destined for multiple DODAACs in a FIB are shipped to the FIB distribution company. Pure palleting is used for the following supplies—

- Class II (CBRN clothing and religious supplies).
- Class III (P) (packaged petroleum oil and lubricants).
- Class IV (construction and barrier materials).
- Class VIII (medical).
- Class IX (batteries and repair parts).

TRANSPORTATION

5-54. The BSB is 100% mobile for organic equipment, and is designed to be 100% mobile with three combat loads for FIB units. The BSB commander, in coordination with the FIB commander, may choose to sacrifice 100% mobility for extra supply stocks. If the BSB's limited assets are committed, and extra transportation is required, the BSB support operations officer requests transportation assets from higher HQ.

Aerial Delivery

5-55. Integrated logistics aerial re-supply, which includes Army helicopters and fixed-wing aircraft plus the use of joint precision airdrop system and other enablers, supports the FIB's requirement for the use of aerial delivery as a routine method of re-supply. It becomes the only feasible mode of transport, however, in the cases of forcible entry, when supply routes become severely disrupted, or when units are not in supporting distance of the BSB or of a sustainment brigade. When employing aerial delivery, the FIB should consider the following—

- The use of aerial delivery requires the coordination of the FIB S-3, S-4, and the fires cell's air defense airspace management element. Special focus must be placed on the enemy air defense capability.
- The BSB must be prepared to both receive and package bulk supplies by sling-load operations or joint precision airdrop system. To conduct these operations, sling load trained personnel are required in the BSB's distribution company and the forward support company's distribution platoon.
- All fires battalions must know how to select landing zones/drop zones to receive aerial resupply. Transport the delivered supplies immediately away from the landing zone/drop zone. See FM 90-4.

5-56. Air Force transportation of supplies, personnel, and equipment can be expected for an airborne operation. Using the container delivery system or a heavy drop, reduces transportation requirements, speeds delivery, and reduces the exposure of ground transportation assets to enemy action. Air Force airlift missions are categorized as preplanned or immediate.

Deployment

5-57. FIBs are designed to deploy rapidly to conduct combat operations worldwide. Once warning or alert notification occurs, pre-deployment activities accelerate. These activities include training validation, task organization, and equipment maintenance. The mobility warrant officer ensures that transportation requirements for the FIB are established prior to any alert or warning order. Movement officers at FIB level receive automated support using Transportation Coordinator Automated Command and Control Information System II. Each unit in the FIB should have an appropriate number of personnel trained to perform special deployment duties. These duties include pallet construction teams, unit loading teams, hazardous cargo certifying officials, and air load planners.

MAINTENANCE

5-58. Field maintenance repairs and returns equipment to the user and is generally characterized by on (or near) system maintenance. Line replaceable unit and component replacement, battle damage assessment, repair, and recovery are examples of field maintenance.

5-59. Sustainment maintenance, which is provided at echelons above brigade, focuses on repairing components, assemblies, modules, and end items in support of the distribution system.

FIELD MAINTENANCE

5-60. Field maintenance is on-system maintenance, and mainly involves preventive maintenance and replacement of defective parts. The goal of field maintenance is to repair and return equipment to the Soldier. It covers tasks previously assigned to operator/crew, organization/unit, and direct support maintenance levels. It includes some off-system maintenance critical to mission readiness.

5-61. Battery/company commanders ensure that vehicle crews and equipment operators perform preventive maintenance checks and services. To provide quick turnaround of maintenance problems, each battery/company has a field maintenance team from their supporting forward support company dedicated to support them. These field maintenance teams have contact maintenance trucks and mechanics trained in the company's equipment.

5-62. Each fires battalion has a forward support company to perform field and sustainment-level maintenance. The forward support company has a maintenance platoon that repairs automotive, armament, ground support, electronic, and missile equipment. The forward support company focuses on line replacement unit replacement, using combat spares from prescribed load list and shop stock. It has a service and recovery section and performs battle damage assessment and repair. The forward support company's maintenance control section uses SAMS-E to order repair parts and to manage combat spares. The forward support company commander establishes unit maintenance collection points in coordination with the fires battalion S-4.

5-63. Units without a forward support company receive their maintenance support from the BSB's field maintenance company. Located in the FIB sustainment area, the field maintenance company provides very limited backup support to forward support companies, since it exists primarily to provide support to non-maneuver units (for example, the FIB HQ, TAB, or BSB). It also serves as the maintenance point for low density equipment. If resourced, the BSB dispatches field maintenance teams to perform on-site diagnoses, make minor adjustments, and conduct repairs.

5-64. Maintenance of low density, specialized equipment (as found in FIB CP and the signal network support company) usually requires maintenance by DA civilians or contractors. Although the BSB support operations officer does not supervise all contractors, he ensures that specific management procedures are developed for contractor maintenance.

Battle Damage Assessment and Repair

5-65. Battle damage assessment and repair (BDAR) is the rapid return of disabled equipment to the force through field-expedient repair of components. BDAR restores minimum essential combat capabilities to support the mission or to enable self-recovery. BDAR is accomplished by bypassing components or safety devices, cannibalizing parts from like or lower priority equipment, fabricating repair parts, taking shortcuts to standard maintenance, and using substitute fluids, materials, or components. Depending on the repairs required and the amount of time available, repairs may or may not return the vehicle to a fully mission capable status. For more information, see FM 4-30.31.

Recovery and Evacuation

5-66. Forward support companies are responsible for recovering damaged equipment of their own units and their supported units. If the vehicle is repairable, the battery/company recovers it and transports it to the

unit maintenance collection point or to the nearest main supply route, depending on what is specified in the FIB or unit standing operating procedures or the operation order (OPORD). The use of Force XXI battle command–brigade and below (FBCB2) enables recovery vehicles to identify the exact location of the inoperable piece of equipment. When the decision is made to repair the equipment at the FIB sustainment area, recovery or evacuation, is used. If forward support company recovery assets are overextended, recovery support can be coordinated with the FIB sustainment area to prevent excessive repair delays. Equipment that cannot be repaired at the FIB sustainment area usually is evacuated to sustainment brigade units.

Controlled Exchange

5-67. Controlled exchange is the removal of serviceable components from unserviceable but economically reparable equipment for immediate reuse in restoring another like item of equipment to combat serviceable condition. The unserviceable component must be used to replace the serviceable component or retained with the end item that provided the serviceable component. Commanders at brigade level will set guidelines for controlled exchange. Controlled exchange is managed by the BSB commander in accordance with the set priorities and is maintained within the maintenance control section of the BSB.

Communications Security Maintenance

5-68. Communications security equipment is evacuated through normal maintenance channels to the BSB or the signal network support company, if appropriate.

Contracted Maintenance Support

5-69. The FIB often uses systems contractors and DA civilians for maintenance support. The FIB S-4 usually plans for the protection and supervision of contractors and DA civilians. System contractors' support deployed forces under pre-arranged contracts to provide specific support to selected systems throughout the equipment's life cycle, during both garrison and contingency operations. These systems include, but are not limited to, vehicles, weapons systems, UASs, and control equipment. Systems contractor's personnel are managed by their contract company supervisors. Contract management is accomplished in accordance with the terms of their contracts through contracting management channels. Since most contractor supervisors and systems support contacting officers are not physically located in the FIB AO, the FIB maintains day-to-day control of these systems support contractors via their designated contracting officer's representative. The U.S. Army Material Command's brigade logistics support team, part of the new Army field support brigade, assists the FIB to manage systems contractors in such areas as accountability and deployment preparation.

5-70. The FIB is often supported by external support contracts such as the logistics civilian augmentation program and/or theater support contracts, in addition to its habitually related systems support contractors. In most operations, the Army field support brigade, along with the Army component command's principle assistant responsible for contracting, plans and coordinates the contracted field support capabilities through the theater sustainment command and higher HQ assistant chief of staff, logistics (G-4) office. The BSB support operations officer will coordinate contracting using assigned contracting officers.

5-71. The theater army has a principle assistant responsible for contracting that provides contingency contracting officers to support units. The FIB usually receives a contingency contracting team in direct support.

SUSTAINMENT MAINTENANCE

5-72. Sustainment maintenance is provided at echelons above brigade focuses on repairing components, assemblies, modules, and end items in support of the distribution system. The intent of this level of maintenance is to perform off-system repairs on all supported items to a standard that provides a consistent and measurable level of reliability. The component is retrograded to a sustainment maintenance repair activity through the distribution system. Once the repair is completed, the component is returned to the distribution system as a serviceable asset.

Retrograde of Unserviceable Components

5-73. A "repairable" is an item that can be repaired cost-effectively. When a repairable such as a diesel engine or a turbine fuel control malfunctions, it can be replaced by a repaired or rebuilt component; it usually does not need to be replaced by a new item. Although the mechanics in the FIB cannot repair unserviceable repair parts, the component repair companies in the sustainment brigade need those unserviceable items to create serviceable repair parts.

5-74. Each time mechanics in the forward support and field maintenance company order recoverable parts, they must return the unserviceable parts to the supply support activity of the supply and distribution company. These unserviceable parts are then returned to a supply support activity in the sustainment brigade for repair by a component repair company. Once repaired, the serviceable parts are placed back into the supply system, and are available to the FIB mechanics again.

FIELD SERVICES

5-75. Field services include field feeding, clothing, and providing other services to Soldiers (clothing exchange, laundry and shower support, textile repair, mortuary affairs, preparation for aerial delivery, food services, billeting, and sanitation) and force provider activity. Usually, laundry and clothing, and light textile repair are not available outside theater staging bases.

FIELD FEEDING

5-76. Class I is provided by the food service section. This section provides food service and food preparation for the battalion and organic personnel. It distributes prepackaged and/or prepared food. The food service section has the ability to prepare one heat-and-serve meal and one cook-prepared meal per day. The field feeding sections reside in the HQ platoon of the forward support company. The section has the capability to prepare, serve, and distribute the full range of operational rations. They are currently equipped in the same manner as the field feeding section of the BSB, with the containerized kitchen as the primary field kitchen and one food sanitation center per primary field kitchen.

SHOWERS

5-77. Small unit showers are authorized in accordance with Common Table of Allowances 50-909. One shower unit consists of one heater, one shelter, and two water bags. Sustainment brigade units usually provide showers to the FIB during mission staging operations.

MORTUARY AFFAIRS

5-78. The recovery and identification of deceased personnel is the responsibility of each battery/company. Battery/company first sergeants supervise the preparation of incident statements and Department of

Defense (DOD) Form 565, Statements of Recognition of Deceased. These documents accompany the remains during transport to a battalion remains collection point. Usually, these remains collection points are near the combat trains, but not near medical support. Once the necessary reports are complete, the remains are evacuated to the FIB unit remains collection point, usually in the FIB sustainment area. From there, remains are evacuated to a mortuary collection point established by the theater sustainment command.

5-79. If remains have been contaminated by chemical agents or toxic industrial hazards, the FIB S-4, in coordination with the FIB chemical officer, should provide guidance to units before they handle or evacuate the remains.

HOST NATION SUPPORT

5-80. Host nation support is a common method of providing services to the deployed U.S. Army. This support can include assistance in almost every aspect required to sustain military operations within a theater. Planners must consider that host nation support meets local standards, and not necessarily United States standards. Host nation support can be a significant resource, provided it is available, and appropriate agreements are in place.

EXPLOSIVE ORDNANCE DISPOSAL

5-81. The FIB usually requires explosive ordnance disposal support for destruction of ammunition, and rendering safe improvised explosive devices and unexploded ordnance. Explosive ordnance disposal capabilities are not organic to the FIB. Higher HQ (division, corps, JTF, or other FIB supported command) provides explosive ordnance disposal augmentation to support FIB operations. Usually, one explosive ordnance disposal company is attached to each deployed FIB. The FIB usually attaches them to the FIB headquarters and headquarters battery (HHB).

5-82. Explosive hazard spot reports are processed through S-3 channels to the FIB assured mobility section, who then forwards the request to the supporting explosive ordnance disposal HQ. Once an improvised explosive device or unexploded ordnance is located and reported, the explosive ordnance disposal HQ determines what explosive ordnance disposal assets will respond.

DETAINEE OPERATIONS

5-83. *Detainee* is a term used to refer to any person captured or otherwise detained by an armed force (JP 3-63). All persons captured, detained, or otherwise held in U.S. custody must receive humane care and treatment.

5-84. The FIB S-1 has the responsibility for the processing of detainees within the FIB. He coordinates the planning efforts of the FIB staff to ensure detainees are properly guarded, protected, and account for. The FIB S-1 leads the FIB staff in planning operations for the detainee collection point. The FIB S-3 must assign a unit the responsibility for detainee operations (processing, restraining/controlling, establishing and maintaining accountability, reporting/investigating detainee abuse, providing first aid, conducting initial screening, and evacuating detainees). Since there is no organic military police support in the FIB, a FIB unit could be detailed to operate the detainee collection point until the FIB supported higher HQ assumes responsibility for them. The FIB S-4 ensures the FIB and subordinate units have appropriate sustainment plans for detainee operations. The FIB S-4 also assists commanders in locating and obtaining sufficient equipment to shelter detainees; including tents, rations, water, and concertina wire. The BSB allocates space in the FIB sustainment area for the detainee collection point. The FIB surgeon and chaplain ensure

that detainees receive appropriate medical care and religious support. The FIB S-2 may question detainees to obtain tactical military intelligence.

5-85. Soldiers who capture documents and enemy prisoners of war usually work with their first sergeant to turn the items and prisoners over to battery/company control. The battery/company moves the enemy prisoners of war to their battery/company combat trains, and turns the prisoners over to the battalion S-1, who plans and coordinates enemy prisoner of war operations, collecting points, and evacuation procedures. As rapidly as possible, enemy prisoners of war are evacuated from battalion AOs to the FIB detainee collection point. The FIB may be required to operate a detention facility, but this site is more likely to be run by a unit from outside the FIB. For more on detainee operations, see FM 3-39.40.

FINANCIAL MANAGEMENT

5-86. Financial management support is comprised of two mutually supporting core functions—

- **Finance Support.** Finance support includes developing policy and guidance; providing advice to commanders; disbursing support to the procurement process; banking and currency; accounting; and limited pay support.

- **Resource Management.** Resource management includes providing advice to commanders; maintaining accounting records; establishing a management control process; developing resource requirements; identifying, acquiring, distributing, and controlling funds; and tracking, analyzing, and reporting budget execution.

5-87. FIBs have no organic financial management assets. Financial management detachments are deployed to provide area support to a brigade sized unit and resource management support is obtained from the FIB supported higher HQ assistant chief of staff, resource management (G-8) Section. The financial management detachment's mission is to provide area financial management support to a FIB, brigade combat team, or equivalent sized unit, or as directed by the financial management company commander. Financial management support teams may be deployed to support split-based finance operations at the battery/company level. Financial management detachments are equipped with a financial management tactical platform, which enables effective operations using real time data and online capability. Financial management detachment support may include providing—

- **Procurement Support.** Procurement support includes the required support to the logistics system by contracting to pay vendors for goods and services and to support the FIB commander through theater specific programs.

- **Pay Support.** Pay support includes providing travel support to Soldiers and civilians in permanent change of station and temporary duty status, Noncombatant evacuation operations travel advances, and non-us pay support (for example, enemy prisoners of war, host nation employees, day laborers).

- **Disbursing Support.** Disbursing support includes training and funding paying agents in support of local procurement, rewards programs, and condolence and solatium payments. Individual support is provided to Soldiers and civilians through check cashing, foreign currency conversion and the issuance of the stored value card. Disbursing is also responsible for receiving and processing all captured currency and precious metals captured during combat operations.

- **Accounting Support.** Accounting support includes ensuring proper financial resources are available to the FIB commander by supporting the fiscal triad (contracting, resource

management, and finance) in reconciling brigade level expenditures providing the most accurate and timely financial data.

5-88. The sustainment brigade financial management support operations team monitors and tracks financial management operations throughout the AO of its FIB supported HQ. The team integrates all financial management operations; plans the employment of financial management units; coordinates financial management requirements; synchronizes the financial management network and manages the financial management systems. It also coordinates for additional operational and strategic financial management support when needed. All functions of the financial management support operations officer are closely coordinated with the financial management company commander and the FIB supported HQ G-8.

HUMAN RESOURCES SUPPORT

5-89. The FIB S-1 is the coordinating staff officer for all matters concerning human resources support (military and civilian). Organization, duties, and responsibilities of the FIB S-1 were described earlier in Chapter 1.

5-90. When the S-1 section separates, the human resources services team normally will move to the BSB CP with either the human resources technician or the senior human resources noncommissioned officer leading the section. It is critical that the section maintains tactical voice, non-secure internet protocol router, and secure internet protocol router data connectivity when elements operate from different locations. Refer to FM 1-0*t* and FM 1-01 for detailed information on human resources operations.

CASUALTY OPERATIONS

5-91. Brigade and battalion S-1 sections are critical elements in the theater casualty operations network. The single most important S-1 function in casualty operations is ensuring the timely and accurate reporting of all casualties in the required format to ensure the accurate and expeditious notification of next-of-kin and management of changes in Soldier status.

5-92. Casualty reporting starts at the point of injury with the preparation of the DA Form 1156 Casualty Feeder Card. Data found on this form is transmitted to the unit first sergeant and subsequently to the battalion S-1 section by the most expedient method available. The battalion S-1 receives the data, verifies the data, and executes required field grade officer verification before passing the casualty data to the brigade S-1 section. The battalion S-1 prepares the initial Defense Casualty Information Processing System-Forward casualty report and forwards the report to the FIB S-1 for verification and dispatch to the assistant chief of staff, personnel (G-1) of the FIB supported higher HQ. Ultimately, all casualty reports are processed at the theater Casualty Assistance Center and are forwarded to the Casualty and Memorial Affairs Operations Center at Human Resources Command. The Defense Casualty Information Processing System-Forward reports prepared by the FIB sustainment cell's S-1 HQ element will be reviewed by several levels of command, but they are the basis for the report submitted to the Army leadership. Accuracy and timeliness are critical. The FIB sustainment cell's S-1 HQ element may place an ad hoc casualty liaison team in the medical support company in the FIB sustainment area to ensure proper reporting of casualties received at that location. This team is normally taken from the human resources services team of the FIB sustainment cell's S-1 HQ element and can be augmented by members of battalion S-1 sections, as required. Casualty liaison teams from supporting human resources companies will be located at all combat support hospitals and division or other FIB supported higher HQ G-1.

5-93. The FIB S-1 will prepare letters of condolence for the commander and will ensure that award of purple hearts; any other posthumous award and any posthumous promotions are properly prepared and executed. It is the intent of Army leadership that all possible posthumous awards are presented by the senior Army official present not later than the funeral services for the deceased Soldier. S-1s may be required to appoint summary court officers for personal effects and line of duty investigating officers.

PERSONNEL READINESS MANAGEMENT

5-94. Personnel readiness management is the process of distributing Soldiers based on documented requirements, authorizations, and predictive analysis to support the commanders' priorities. Strength management, strength distribution, replacement operations, and personnel readiness reporting, are all elements of personnel readiness management. The FIB S-1 is responsible for making the allocation decisions within the brigade to fill documented shortages based on the priority of fill determined by the commander. Personnel readiness management is a continuous process, which is the end state of the personnel estimate, prepared by the FIB S-1.

PERSONNEL ACCOUNTING AND STRENGTH REPORTING

5-95. Personnel accounting and strength reporting is the deliberate personnel accounting and reporting for Soldiers and DA civilians assigned to the FIB. Personnel accounting and strength reporting is the mechanism used to provide information critical to commanders and the personnel readiness management system. The accuracy of personnel accounting and strength reporting data directly affects all elements of the sustainment warfighting function. Battery/company first sergeants and battalion S-1 sections are critical participants in this process. S-1s must be very sensitive to the accuracy and timeliness of all personnel accounting reports, and must pay special attention to Soldiers who have changed status in the force health protection process. While deployed, FBCB2 and Tactical Personnel System/Deployed Theater Accountability System are the best tools to report the data and process it into the required personal status, joint personnel status, or casualty reporting forms reported to higher HQ. Deployed strength data is rolled up from the battery/company to the theater level daily; therefore, battery/company-level accuracy is the key to an accurate theater strength report.

5-96. Contractor accountability is a very challenging mission that is not a traditional S-1 responsibility. Based on interim Army policy and doctrinal guidance, the Army field support brigade in coordination with the contract companies, is responsible to maintain accountability of all contractors who deploy with, and/or have a habitual relation with, the FIB.

PERSONNEL INFORMATION MANAGEMENT

5-97. Personnel information management is collecting, processing, storing, displaying, and disseminating critical Soldier information. Personnel information management is both a manual and digital process, which moves Soldier data. The maintenance of the military personnel file for each Soldier is the responsibility of the FIB S-1. Complete accountability of the military personnel file is critical to executing effective casualty notification.

POSTAL OPERATIONS

5-98. The FIB S-1 is responsible to the FIB commander for developing and coordinating the postal operations plan and coordinating required support from human resources company postal platoons for postal finance and outgoing mail support. Normally, Soldier mail will arrive at the FIB sustainment area

already sorted by unit. Four-digit zip code extensions or unit number designations make unit sorting easier, but may not always be available. S-1s will establish unit mailrooms as required and ensure that adequate unit mail clerks are trained and on orders. Battalion S-1s will ensure that the FIB S-1 and FIB supported higher HQ G-1 receive daily updates for mail delivery points for subordinate units and that all changes to task organization are provided to supporting Army post offices. Battalion S-1s will coordinate with the FIB signal staff officer (S-6) for the processing of official mail.

ESSENTIAL PERSONNEL SERVICES

5-99. The FIB and battalion S-1 sections perform essential personnel services to provide timely and accurate personnel services that efficiently update Soldier status, readiness, and quality of life, and allow Army leadership to effectively manage the force. Essential personnel services includes processing awards and decorations, evaluations, transfers, leaves and passes, managing promotions (to include semi-centralized noncommissioned officer promotions), military pay, and personnel actions (requests for special training or reclassification), creating identification cards and tags, and processing line of duty investigations and military occupational specialty/medical retention board actions for the Soldiers assigned or attached to the FIB. The FIB S-1 section is equipped with deployable Defense Enrollment Eligibility Reporting System-Rapid technology to produce common access cards.

MORALE, WELFARE, AND RECREATION OPERATIONS

5-100. The FIB and battalion S-1s plan, coordinate, and integrate morale, welfare, and recreation operations activities for their units. Morale, welfare, and recreation operations activities include athletics and recreation programs, Army and Air Force exchange services, Army imprest fund activities (which provide mobile Army and Air Force exchange facilities for Soldiers), local rest and recuperation facilities, coordination for morale, welfare, and recreation athletic kits, book kits, and health and comfort packs through the S-4.

RECEPTION, REPLACEMENT, RETURN-TO-DUTY, REST AND RECUPERATION, AND REDEPLOYMENT OPERATIONS

5-101. Reception, replacement, return-to-duty, rest and recuperation, and redeployment (R5) operations include planning, preparing, assessing, and executing the movement and tracking of Soldiers from designated points of origin to final destinations, and to coordinate life support as required during the movement process. Within the FIB, R5 operations consist of monitoring the flow of Soldiers into and out of the FIB AO. Personnel readiness management will establish replacement requirements based on shortages of assigned personnel against authorizations, and Human Resources Command will place corresponding Soldiers of the correct military occupational specialty and grade on orders to the FIB and subordinate battalions. R5 will track them as they flow into the brigade area, normally at the FIB sustainment area. The most critical R5 task is the constant updating of the Deployed Theater Accountability System database as Soldiers move through the R5 process.

HUMAN RESOURCES PLANNING AND OPERATIONS

5-102. Human resources planning and operations is the means by which the FIB S-1 envisions a desired human resources end state in support of the FIB commander's mission requirements. The FIB S-1 continuously evaluates the process of tracking current and near-term (future) execution of the planned human resources support to ensure effective support to the FIB commander.

5-103. The FIB S-1 must closely monitor the common operational picture to better plan for and react to operational requirements requiring human resources inputs or affects human resources core competencies. Key human resources planning information includes—

- FIB task organization.
- Projected changes to task organization during conduct of the operation by phase.
- Updated unit strength data.
- Projected unit strength data during the operation.
- Updated loss projections (casualty estimates).
- Key military occupational specialty shortages and loss predictions.
- Replacement policies and flow.
- Theater evacuation policy.
- Manning priorities (priority of fill).
- Crew/key leader reconstitution planning.
- Casualty reporting scheme.
- Location of medical facilities and evacuation assets.
- Location of casualty liaison teams.
- Postal flow rates and the location of supporting postal units.
- Rest and recuperation policy and projections during the operation.
- Personnel accounting and strength reporting means during the operation and timings.
- Wartime Theater awards policy (as impacted by task organization).
- Location of supporting human resources organizations.
- Location of subordinate S-1 sections.

RELIGIOUS SUPPORT

5-104. The FIB unit ministry team is responsible for organizing the efforts of unit ministry teams that work for subordinate commanders. The FIB unit ministry team must ensure there is religious support to all Soldiers in the FIB AO. Often, batteries, companies, or detachments are attached to the FIB without unit ministry team support. Members of other services and authorized civilians may require area support. The FIB unit ministry team prepares a religious support plan, often as an appendix to an order, to ensure coordinated religious support for FIB Soldiers. The religious support plan should consider—

- Area support.
- Denominational coverage.

- Use of lay ministers.
- Potential for mass casualties.
- Coordination with the Red Cross for family problems.
- Stress management after combat.
- Pastoral care and counseling to key leaders.

5-105. Chaplains advise their commanders on the moral and ethical nature of command policies, programs, and actions, as well as their impact on Soldiers. They are sometimes referred to as the "conscience of the command."

5-106. Unit ministry teams have a staff role as well as a religious role. As staff officers, chaplains can research and interpret cultural and religious factors pertinent to a given operational area. They may work with civil affairs personnel in analyzing local religious organizations, customs and practices, doctrines, symbols, and the significance of shrines and holy places. Chaplains may conduct liaison with, and support humanitarian efforts by working with humanitarian relief agencies, civil affairs, and public affairs where appropriate.

LEGAL SUPPORT

5-107. The FIB staff judge advocate provides legal support in operational law and the core legal disciplines, which are—

- Military justice.
- International law.
- Administrative law.
- Civil law (contract, fiscal, and environmental law).
- Claims.
- Legal assistance.

5-108. The FIB staff judge advocate usually locates his personnel in the FIB main CP fires cell to provide legal advice to the commander. This advice includes providing international law and operational law assistance, including advice and assistance on implementing the DOD law of war program.

5-109. The FIB operational law team also provides support in other legal disciplines to other members of the FIB staff and to subordinate battalions. See AR 27-1, FM 1-04, and ATTP 5-0.1 for additional information.

ARMY HEALTH SYSTEM SUPPORT

THE ARMY HEALTH SYSTEM

5-110. The Army Health System is a component of the Military Health System that is responsible for operational management of the Army's health service support and force health protection missions,

including training and predeployment, deployment, and postdeployment operations. It is responsible for all mission support services performed, provided, or arranged by the Army Medical Department for the Army and, as directed, for joint, intergovernmental, coalition, and multinational forces and agencies.

5-111. For more information on the Army Health System, see ATTP 4-02 and FM 4-02.4.

SECTION III – THE FIRES BRIGADE SUSTAINMENT AREA

5-112. A sustainment area is a designated area in which sustainment elements, some staff elements, and other elements locate to support a unit. Types of sustainment areas include—

- Battery/company trains.
- Battalion trains.
- FIB sustainment area.
- Trains are a unit grouping of personnel, vehicles, and equipment to provide sustainment. It is the basic sustainment tactical organization. Fires battalions use trains to array their subordinate sustainment elements, including their forward support company. Battalion trains usually are under the control of the battalion S-4, assisted by the battalion S-1. The movements control officer advises them in selecting movement routes. The composition and location of battalion trains varies depending on the number of units attached to, or augmenting, the fires battalion.

FIRES BRIGADE SUSTAINMENT AREA

5-113. The FIB sustainment area is the logistical, personnel, and administrative hub of the FIB. It consists of the BSB, but could also include a FIB alternate CP (if formed), battalion field trains, non-maneuver companies, air and missile defense assets, signal assets, and other sustainment units from higher HQ (division, corps, JTF, or other FIB supported command). The FIB S-3, with the FIB S-4 and the BSB commander and support operations officer, determines the location of the FIB sustainment area. The FIB sustainment area should be located so that support to the FIB can be maintained, but does not interfere with the tactical movement of FIB units, or with units that must pass through the FIB area. The size of the FIB sustainment area varies with terrain; however, an area four to seven kilometers in diameter is a planning guide. Usually the FIB sustainment area is on a main supply route in the division, corps, JTF, or other FIB supported command's sustainment area, and ideally is out of the range of the enemy's medium artillery. The FIB sustainment area should be positioned away from the enemy's likely avenues of approach and entry points into the FIB's sustainment area.

5-114. Usually the S-4 coordinates the FIB's main CP sustainment cell, which contains the FIB S-4, FIB S-1, FIB surgeon section, and the FIB unit ministry team. The FIB commander can create an alternate CP for sustainment should the administrative and logistics presence in the FIB main CP become too large. The BSB CP may be able to host the FIB sustainment cell if communications links are adequate.

LOCATIONS FOR SUSTAINMENT AREAS

5-115. The trains should not be considered a permanent or stationary sustainment area. The trains must be mobile to sustain the unit when it is moving, and should change locations frequently, depending on available time and terrain. The trains changes locations for the following reasons—

- Change of mission.

- Change of unit AOs.
- To avoid detection caused by heavy use or traffic in the area.
- When the area becomes worn by heavy use (for example, wet and muddy conditions).
- Security becomes lax or complacent due to familiarity.

5-116. All sustainment areas have many similarities, including—

- Cover and concealment (natural terrain or man-made structures).
- Room for dispersion.
- Level, firm ground to support vehicle traffic and sustainment operations.
- Suitable helicopter landing site (remember to mark the landing site).
- Good road or trail networks. These include good routes in and out of the area (preferably separate routes going in and going out); access to lateral routes; routes positioned along or good access to the main supply route; and routes positioned away from likely enemy avenues of approach.

SECURITY OF SUSTAINMENT AREAS

5-117. Sustainment elements must organize and prepare to defend themselves against ground or air attacks. Often, they occupy areas that have been secured by maneuver units. The security of the trains at each echelon is the responsibility of the individual in charge of the trains. The best defense is to avoid detection. The following activities help to ensure trains security—

- Select good trains' sites that use available cover, concealment, and camouflage.
- Use movement and positioning discipline, as well as noise and light discipline to prevent detection.
- Establish a perimeter defense.
- Establish observation posts and patrols.
- Position weapons (small arms, machine guns, and antitank weapons) for self-defense.
- Plan mutually supporting positions to dominate likely avenues of approach.
- Prepare a fire plan and make sector sketches.
- Identify sectors of fires.
- Emplace target reference points to control fires, and for use of indirect fires.
- Integrate available combat vehicles within the trains (such as vehicles awaiting maintenance or personnel) into the plan, and adjust the plan when vehicles depart.
- Conduct rehearsals.

- Establish rest plans.
- Identify an alarm or warning system that would enable rapid execution of the defense plan without further guidance; the alarm, warning system, and defense plan are usually included in the unit standing operating procedures.
- Designate a reaction force. Ensure the force is equipped to perform its mission. The ready reaction force must be rehearsed or briefed on unit assembly, friendly and threat forces recognition, and actions of contact.

SUPPLY ROUTES

5-118. The FIB S-4, with the BSB support operations officer and FIB S-3, select supply routes between sustainment areas. Main supply routes are routes designated within the FIB AO upon which the bulk of sustainment traffic flows in support of operations. A main supply route is selected based on the terrain, friendly disposition, enemy situation, and scheme of maneuver. Alternate supply routes are planned in the event that a main supply route is interdicted by the enemy, or becomes too congested. In the event of CBRN contamination, either the primary or alternate main supply route can be designated as the "dirty main supply route" to handle contaminated traffic. Alternate supply routes should meet the same criteria as the main supply route. Military police (if provided) or other designated FIB Soldiers may assist with regulating traffic; and engineer units, if available, could maintain routes. Security of supply routes in a noncontiguous environment might require the FIB commander to commit non-sustainment resources. Route considerations include—

- Location and planned scheme of maneuver for subordinate units.
- Location and planned movements of other units moving through the FIB AO.
- Route characteristics such as route classification, width, obstructions, steep slopes, sharp curves, and type of roadway surface.
- Two-way, all-weather trafficability.
- Classification of bridges and culverts.
- Requirements for traffic control such as at choke points, congested areas, confusing intersections, or along built-up areas.
- Number and locations of crossover routes from the main supply route to alternate supply routes.
- Requirements for repair, upgrade, or maintenance of the route, fording sites, and bridges.
- Route vulnerabilities that must be protected. This can include bridges, fords, built-up areas, and choke points.
- Enemy threats such as air attack, conventional and unconventional tactics, mines, ambushes, and chemical strikes.
- Known or likely locations of enemy penetrations, attacks, chemical strikes, or obstacles.
- Known or potential dislocated civilian movements that must be controlled or monitored.

Appendix A

Fires Brigade Operations Order

This appendix provides an example of a formal fires brigade (FIB) operations order (OPORD) (written in the five-paragraph field order format).

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Copy ## of ## copies
Headquarters (HQ), 77 Fires Brigade
Tactical Assembly Area (TAA) DIAMOND (38TNK456987)
REPUBLIC OF WHITELAND
031200D APRIL 20XX
Memorandum for Record S31599

OPERATIONS ORDER XX-19 (OPERATION URGENT RESPONSE)

(U) **References:**

a. (U) Maps: 1:250,000: Digital: 5NINM3538, 5NINM3942. Paper: National Imagery and Mapping Agency, Series 1501A, Joint Operations Graphic—Air (JOG-A), 1:250,000 Scale. Sheets: NK3706, NK3804, NK3805, NK3806, NK3904, NK3808, NK3809, NK3907, NK3811, NK3812, NK3910, NK3911, NJ3802, NJ3803, NJ3804, NJ3901, NJ3806, NJ3807, NJ3808, NJ3905, NJ3810, NJ3811, NJ3812, NJ3909, NJ3910, NJ3814, NJ3815, NJ3816, NJ3913, NJ3914.

b. (U) Combined/Joint Force Land Component (C/JFLC) OPORD XX-06 (OPERATION URGENT GUARD).

c. (U) 1 Division OPORD XX-45 (OPERATION URGENT RESPONSE).

d. (U) 77 FIB OPORD XX-17 (OPERATION DIAMOND DEPLOY).

(U) **Time Zone Used Throughout the OPORD:** Delta.

(U) **Task Organization**: See Annex A (Task Organization).

1. (U) **Situation**.

a. (U) Area of Interest. (Omitted in example).

b. (U) Area of Operations. (Omitted in example).

(1) U) Terrain. (Omitted in example).

(2) (U) Weather. (Omitted in example).

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OPERATIONS ORDER XX-19 (OPERATION URGENT RESPONSE) 77 FIRES BRIGADE

c. (U) Enemy Forces. REDLAND initiated a conventional ground invasion of WHITELAND before the United States (U.S.) 1 Division could deploy. The objective of REDLAND forces was to defeat multinational forces in theater, secure those portions of WHITELAND predominately inhabited by Atropians, and seize positions controlling the mountain passes west of THEB'SOL. These passes provide access to the ALBA RIVER VALLEY and to those areas of WHITELAND now under REDLAND control. Their possession by REDLAND will greatly facilitate the conduct of a successful defense until the United Nations Security Council imposes a ceasefire.

REDLAND forces attacked on 28 March 20XX with Operational Strategic Command (OSC) NORTH and OSC SOUTH abreast to defeat coalition forces and seize the mountain passes in the vicinity of THEB'SOL. OSC EAST attacked to seize and retain the ALBA RIVER VALLEY and major urban centers in the eastern portion of the occupied territory. The 54th and 90th Division Tactical Groups remained in REDLAND as a reserve force. REDLAND Air Force and attack helicopters supported the ground campaign.

REDLAND forces initially successfully overwhelmed the outnumbered and scattered WHITELAND forces. They occupied those WHITELAND areas predominately inhabited by Atropians and pushed on towards their goal of securing the mountain passes in the vicinity of THEB'SOL. REDLAND ground maneuver was relatively rapid as lead divisions enjoyed reasonable success during the first 72 hours of the offensive. Allied fixed wing attack aircraft were successful in attriting T-72, BMP (Soviet infantry fighting vehicle), BRDM (Soviet armored reconnaissance vehicle) and BTR (Soviet armored personnel carrier) formations as they moved to the northeast and northwest against coalition forces. The REDLAND Air Force lost 10 aircraft in air-to-air combat with Combined/Joint Force Air Component (C/JFACC) aircraft and retired to Southeast REDLAND. The Redland fixed-wing aircraft have since remained on the ground. Attack helicopters continued to support the ground maneuver but only during daylight hours. They have not operated during the hours of darkness as their pilots lack adequate nighttime training. The REDLAND offensive was halted after 96 hours short of their final objective, but is firmly in control of most of the Atropian region.

In 1 Infantry Division area of operations (AO), lead REDLAND units are generally deployed between Phase Line (PL) MAMMEL and PL KEELER. Joint intelligence determined that the REDLAND assault force, the 26th Mechanized Infantry Division Tactical Group, was attrited to less than 50-percent effectiveness and is defending between PL KEELER and PL HARRIS. However, the actions of the 26th Mechanized Infantry Division Tactical Group have created favorable conditions for the continued attack by the REDLAND exploitation force, the 10th Tank Division Tactical Group, in an attempt to secure the mountain pass southwest of the city of THEB'SOL, as well as the vital road node formed by that city; while the 20th Tank Division Tactical Group secures the pass to the city's northwest. Coalition Joint fires continue to attrite REDLAND ground forces as they prepare for continued offensive operations. In reaction, REDLAND forces have dispersed into platoon and company size groups that can more easily conceal themselves. This is especially effective for those REDLAND motorized infantry forces operating in the more mountainous parts of the theater.

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d. (U) Friendly Forces.

(1) (U) Joint Force Land Component**.** Joint force land component HQ (3 Army) has deployed into the WHITELAND AO and has contained the REDLAND attack. Air superiority has been established, control systems are in place, and lines of communications are generally secure. C/JFLCC's intent is to restore the international border and defeat REDLAND forces in the Atropian region. Subsequently we will begin conducting stability operations and eventually turn them over to WHITELAND. At this point forces will be released to national control and redeployment operations will begin. C/JFLCC's concept of operations is to organize rapidly in its AO, establishing an effective defense against conventional and unconventional attacks from REDLAND forces. Close cooperation with the air and special operations components and with Federation armed forces and government authorities is essential to the defense. The Combined/Joint Force Land Component Commander (C/JFLCC) will defeat REDLAND forces with defenses in depth in the major subordinate command AOs supported by concentrated joint fires, inform and influence activities and inform and influence activities.

(a). (U) The C/JFLCC's defense will continue to attrite maneuver systems as Combined/Joint Task Force (C/JTF) units arrive, conduct RSOI and prepare for offensive operations, seize the initiative, and defeat REDLAND forces with powerful counterattacks. The key to success is the destruction of defending first echelon REDLAND forces, stability operations, the hand-off of territory and operational responsibility to WHITELAND authorities and/or forces, and defeat of second echelon REDLAND forces in the ALBA RIVER VALLEY. At the conclusion of the operation, all REDLAND forces will have been defeated and the C/JFLCC's forces will be in positions that support stability operations.

(1) (U) 2 Division: Attacks to destroy REDLAND forces in zone and seize OBJECTIVE MELISSA. On-order (O/O) continues the attack in zone to clear enemy forces to the international border.

(2) (U) 5 Marine Expeditionary Brigade: Secures capital city of THEB'SOL to protect vital infrastructure, assist local authorities in maintaining law and order, minimize insurgent impact on WHITELAND civilians, and allow coalition freedom of action in the city.

(3) (U) 108 MEB (maneuver enhancement brigade): Secures lines of communication from the sea port of debarkation to 1 Division rear boundary.

(4) (U) 67 Division (Whiteland [WL]): Attacks to destroy remnants of 20th Tank Division Tactical Group and clear enemy forces in zone to the BROWNLAND border.

(5) (U) 62 Division (WL): Attacks in zone to destroy REDLAND forces and seize OBJECTIVE V'DORKA. O/O continues the attack in zone to clear enemy forces to the international border.

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(6) (U) 38 Division (WL): Attacks in zone to destroy REDLAND forces and seize OBJECTIVE KS'ART. O/O continues the attack in zone to clear enemy forces to the international border.

(b) (U) O/O 1 Division attacks from PL MAMMEL to seize OBJECTIVE DIANA, as part of a C/JFLC offensive operation designed to restore the territorial integrity of WHITELAND. 1 Division commanding general's intent is to restore the international border and facilitate reestablishment of regional military stability. The decisive operation is the attack to restore the international border. We will accomplish this by attacking in zone to neutralize committed REDLAND forces deployed in Atropian territory and/or those reinforcing his defense. The tempo of the attack must be rapid enough to penetrate his defenses while preventing his ability to conduct coherent operations by uncommitted forces positioned in or near the 1 Division AO. I anticipate a 10-14 day attack with a three to five day transition to a defense securing the border. Critical shaping operations will be the rapid penetration of the enemy defense, isolation of uncommitted forces, and the preservation of our lines of communication as they are extended. At the conclusion of this operation, 1 Division will have: (1) destroyed or forced the withdrawal of REDLAND forces in AO; (2) restored the international border; (3) positioned forces along the international border, deterred further REDLAND offensive action; and (4) prepared to pursue enemy forces into REDLAND, or transition to Phase V (stability operations) of the C/JFLC OPORD. 1 Division commanding general's concept of the operation is for 1 Division to attack 100200D APR 20XX with the 5 HBCT (heavy brigade combat team) in the north to destroy the 101st Tank Brigade Tactical Group (BTG) and secure OBJECTIVES JOHN and BEM to serve as the bridgehead and enable the forward passage of the 2 HBCT to secure OBJECTIVE DIANA and destroy the 261st Mechanized BTG. The axis of advance is HIGHWAY 1. PL HARRIS is the initial division limit of advance for this attack O/O the line of attack shifts to the international border. The 10 HBCT is the division reserve and follows the 5 HBCT and the 2 HBCT along Highway 1 to an assembly area centered on the intersection of Highway 1 and PL FAHRNI after completing its mission staging operations. The 87 IBCT (infantry brigade combat team) attacks to fix the 51st Motorized Infantry Division Tactical Group in their current locations. The 77 Fires Brigade (FIB) and 11 Combat Aviation Brigade (CAB) provide shaping fires to facilitate the unimpeded attack of the brigade combat teams (BCT) and assist the BCTs in the accomplishment of their tasks. The disposition of enemy forces and the separation of key terrain compel the division to conduct operations that occasionally involve the use of noncontiguous AOs.

(2) (U) Missions of Adjacent Units.

(a). (U) 5 HBCT: (initial division main effort) attacks along HWY 1 to destroy enemy forces to PL KEELER and seizes OBJECTIVES JOHN and BEM. O/O passes 2 HBCT forward and secures division main supply route and screens the northern division boundary between PL FAHRNI and PL KEELER.

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(b). (U) 2 HBCT: follows 5 HBCT and becomes division main effort at PL KEELER: attacks to destroy 261 Mechanized BTG and seize OBJECTIVE DIANA. O/O, attacks to destroy 262 Mechanized BTG or force its withdrawal west of PL HARRIS.

(c). (U) 87 IBCT: attacks to fix 512th Motorized BTG. O/O, attacks to seize the electric facilities at LUSK RESERVOIR.

(d). (U) 10 HBCT: (division reserve) follows 2 HBCT and is prepared to assume division main effort and attack to seize OBJECTIVE DIANA. 10 HBCT is also prepared to attack to secure LUSK RESERVOIR. O/O, attacks to destroy 262d Mechanized BTG or force its withdrawal west of PL HARRIS.

(e). (U) 11 CAB: Conducts aviation attack to destroy 513th Motorized BTG at LUSK RESERVOIR to support 87 IBCT's seizure of critical electric facilities. 11 CAB provides operational control (OPCON) 1 ARB (armed reconnaissance battalion) to support 5 HBCT attack to destroy the 101st Armored BTG. 11 CAB provides assault helicopter support for 87 IBCT's attack to fix the 512th Motorized BTG as well as provides CH-47 support to 27 Sustainment Brigade. The 11 CAB provides to 77 FIB eight Warrior unmanned aircraft systems (UAS) missions/24 hours beginning 050001D APR 20XX until line of departure. After line of departure, 11 CAB provides six Warrior UAS missions/24 hours until OBJECTIVE HARRIS is secure. O/O, 11 CAB provides 77 FIB eight Warrior UAS missions/24 hours once the 1 Division is ordered to continue the attack beyond PL HARRIS. 11 CAB provides air ambulance assets in general support of the division.

(f). (U) 27 Sustainment Brigade and 44 Medical Brigade: Initially provide sustainment and force health protection support from their locations in the division sustainment area. 27 Sustainment Brigade and 44 Medical Brigade begin mission staging operations to support 2 HBCT after 5 HBCT completes its forward passage of lines. The brigades continue to support the 5 HBCT and 2 HBCT using a combination of hasty and deliberate replenishment operations and mission staging operations as they continue the attack and cycle battalions and companies out-of-combat to replenish supplies. 27 Sustainment Brigade supports 87 IBCT and all other divisional units using a mix of supply-point and distribution-based support. It uses its available assets to provide this support, to include the use of United States Air Force (USAF) fixed-wing aircraft and helicopters to deliver supplies and personnel when needed.

(g). (U) 34 Maneuver Enhancement Brigade (MEB): Engineer elements clear, maintain, and secure the movement routes to ensure freedom of movement for sustainment elements and follow on maneuver forces. Engineer forces, in conjunction with CBRNE (chemical, biological, radiological, nuclear, and high-yield explosives) elements, conduct initial damage assessments, and repair critical civil infrastructure within their capability. Military police forces, in conjunction with WHITELAND 3 Battalion, 99 Motorized Infantry Brigade, provide local security to population centers to create a

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stable and secure environment. 34 MEB engineer elements will construct the division detainee holding area operated by the 591 Military Police Company of 59 Military Police Battalion. 34 MEB also prepares for the operation of dislocated civilian facilities before they return to their own homes. The brigade coordinates its dislocated civilian activities with WHITELAND civil authorities using the division civil-military operations center (CMOC) established by 418 Civil Affairs Detachment. 325 CBRNE Defense Battalion conducts chemical reconnaissance and decontamination as required to ensure that division operations along ground main supply routes are not degraded by REDLAND employment of CBRNE weapons or the release of toxic industrial chemicals and materials.

(h). (U) 56 Battlefield Surveillance Brigade (BFSB): Conducts reconnaissance and surveillance operations designed to satisfy the division's information requirements. The brigade focuses its collection efforts on the division's multiple intermediate objectives as well as the final objective. 56 BFSB assists the 1 Division's main effort by providing task organized counterintelligence/human intelligence teams OPCON to 5 HBCT and 2 HBCT to conduct tactical questioning and document exploitation. The brigade provides additional task organized counter intelligence/human intelligence teams OPCON to the 2 HBCT and 87 IBCT as they begin to transition to area security and protection operations within their assigned AOs. Supporting the attack, 513 Military Intelligence Battalion's collection and exploitation company supports interrogation and document exploitation at the 1 Division detention center.

e. (U) Interagency, Intergovernmental, and Nongovernmental Organizations. Identify and state the objective or goals and primary tasks of those non-Department of Defense organizations that have a significant role within the AO. Refer to Annex V (Interagency Coordination) as required.

f. (U) Civil Considerations. (Omitted in example).

g. (U) Attachments and Detachments. (Omitted in example).

h. (U) Assumptions. (Omitted in example).

2. (U) Mission.

Not later than 100200D APRIL 20XX 77 FIB provides strike, counterfire, and close supporting fires to support 1 Division attack to defeat enemy forces to PL HARRIS, secure electric facilities at LUSK RESERVOIR, and seize OBJECTIVE DIANA. O/O continues to support the attack to quickly restore the international border and serve as a deterrent to any additional REDLAND incursion into WHITELAND. Be prepared to attack REDLAND forces across the international border or defeat REDLAND forces bypassed in the West or Northwest in the 1 Division AO.

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3. (U) Execution.

a. (U) Commander's Intent**.** The purpose of this operation is to support 1 Division's rapid attack from PL MAMMEL to PL HARRIS, then O/O to the international border. Critical to 1 Division's success are the brigade's shaping fires that must prevent the enemy from breaking the momentum of the attacking BCTs. This shaping effort has three components: 1) Neutralizing defending enemy forces at the 5 HBCT/2 HBCT battle handover line[OBJECTIVE BEM] and on all objectives, 2) Destroying enemy long range artillery and surface-to-surface missile (SSM) brigades before the handover of the main effort from 5 HBCT to 2 HBCT and 3) Insulating brigade combat teams (BCTs) from counterattacking enemy forces until they are joined in the close fight at LUSK RESERVOIR (87 IBCT), OBJECTIVES JOHN and BEM (5 HBCT), and OBJECTIVE DIANA (2 HBCT). Once that happens, the main effort BCT must have immediate access to overwhelming close supporting artillery. We also must support the 34 MEB with protection, fire support assets, and additional fires if needed. The brigade must be joined very closely with the 11 CAB to support their aviation attacks against enemy armor along PL FAHRNI and the defending enemy at LUSK RESERVOIR. In addition, the brigade must position and move firing units within BCT formations. It is critical we move aggressively because, if we are to continue the attack to the international border, I anticipate only a very short tactical pause at PL HARRIS. At the conclusion of the operation the brigade will either be arrayed with the 1 Division along PL HARRIS or the international border, conducting stability operations and prepared to continue to support the attack across the international border or to the Northwest to destroy bypassed and insurgent REDLAND forces.

b. (U) Concept of Operations. 77 FIB supports the 1 Division attack with aggressive strike, counterfire, and close supporting fires throughout the division AO. All three rocket battalions will be positioned well forward in zone along PL MAMMEL in order to support the 72 hour shaping efforts. The A/251 target acquisition battery (TAB) Field Artillery's (FA) radars will also be positioned to provide target acquisition to PL FAHRNI. The Brigade's allocation of close air support (CAS) will provide fires against armor targets in the 101st Tank brigade tactical group (BTG). The brigade will coordinate with 56 BFSB. BFSB (battlefield surveillance brigade) for target handover of high-payoff targets. Upon line of departure, the brigade's shaping operations shift to preventing enemy interruption of 5 HBCT's attack along HIGHWAY 1. The three rocket battalions will be integrated into 5 HBCT, 2 HBCT, and 87 IBCT's formations while 1-5 Field Artillery and 6-14 Field Artillery (-) will both reinforce 3-16 Field Artillery (5 HBCT) and A/3-77 Field Artillery is general support-reinforcing (GSR) to 1-92 Field Artillery (87 IBCT). C/6-14 Field Artillery (+) is attached to 34 MEB. Upon battle handover between 5 HBCT and 2 HBCT after OBJECTIVE BEM, the brigade will begin shaping the follow-on fight by neutralizing enemy forces in OBJECTIVE DIANA and at LUSK RESERVOIR and by aggressive counterfire. While 67 FIB (2 Division) has responsibility for supporting the C/JFLC shaping operations and fires against C/JTF time sensitive targets, 77 FIB will

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execute 25 preplanned C/JFLC Army Tactical Missile System (ATACMS) missions prior to line of departure and will have a multiple launch rocket system (MLRS) platoon able to respond within 5 minutes to a C/JFLC ATACMS request.

c. (U) Scheme of Movement and Maneuver. Prior to Line of Departure. 1-5 Field Artillery and 6-14 Field Artillery (-) reinforcing (R) 3-16 Field Artillery and C/6-14 Field Artillery attached 34 MEB effective 040600D APR 20XX. Coordinate for movement and positioning directly with the supported unit upon effective date-time group of this OPORD. 1-77 Field Artillery will move along ROUTE MELON beginning 041600D APR 20 XX from tactical assembly area (TAA) DIAMOND to occupy position areas for artillery (PAAs) 2A, 2B, 2C, 2D, and 2E along PL MAMMEL. 2-77 Field Artillery will move along ROUTES PEACH and PEAR beginning 041000D APR 20XX from TAA DIAMOND to occupy PAAs 3A, 3B, 3C, 3D, 3E, and 3F along PL MAMMEL. 3-77 Field Artillery will move along ROUTES APPLE and TANGERINE beginning 041200D APR 20XX from TAA DIAMOND to occupy PAAs 5A, 5B, 5C, 6A, and 6B. C/3-77 Field Artillery will only be positioned in PAAs 6A/6B. A-251 Field Artillery (TAB) integrates movement of two Q-37s with 1-77 Field Artillery, one Q-37 with 2-77 Field Artillery, and one Q-37 with 3-77 Field Artillery to occupy positions in accordance with the radar deployment order. One lightweight countermortar radar (LCMR) will move with the brigade command post (CP) and one will move with the 77 brigade support battalion (BSB).After Line of Departure**.** 1-77 Field Artillery, along with two Q-37 radars will maneuver in the northern and central portion of 5 HBCT's zone to PL HARRIS through the 7, 9, 10, and 11 series PAAs. 77 FIB will direct the movement and 1-77 Field Artillery will coordinate with either 1-14 Cavalry or 2-22 Infantry for integration into their scheme of maneuver. 2-77 Field Artillery along with one Q-37 radar; will maneuver in the southern portion of 5 HBCT's zone to PL HARRIS through the 8, 12, and 14 series PAAs. 77 FIB will direct the movement and 2-77 Field Artillery will coordinate with either 1-14 Cavalry or 1-68 Armor for integration into their scheme of maneuver. 3-77 Field Artillery along with one Q-37 radar; will maneuver in the 5 HBCT and 87 IBCT zone to PL HARRIS in the 11, 12, 13, 15, and 16 series PAAs. 77 FIB will direct the movements and 3-77 Field Artillery will coordinate with the 2-14 Cavalry, 1-87 Infantry, or 1-68 Armor for integration into their scheme of maneuver. During the attack, 77 FIB supports 1 Division civil affairs concept by providing the minimal humanitarian assistance required by international law. Detachment 4, D/418 Civil Affairs Battalion will coordinate the assistance and work with the respective BCT civil-military operations center to expedite the transfer of responsibility for the civilians to WHITELAND civil authorities and appropriate international organizations. For detail, see Annex Q, (Civil Affairs Operations).

(1) (U) Scheme of Mobility/Countermobility. 77 FIB has no allocated engineer assets. Subordinate units will request engineer support as needed. Priority of requests will be to survivability tasks for A/251 FA (TAB) and 77 BSB. See Annex G (Engineer) as required.

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(2) (U) Scheme of Battlefield Obscuration. See Appendix 9 (Battlefield Obscuration) to Annex C (Operations).

(3) (U) Scheme of Surveillance and Reconnaissance**.** NLT 070001D APR 20XX the brigade will begin its target acquisition effort to locate and destroy the 101st Tank BTG and the 14th SSM Brigade. The brigade is allocated eight Warrior UAS missions/day. UAS will be used for target development in support of strike operations against stationary armor, air defense, and command and control elements of the 101st Tank BTG and launchers and command and control elements of the 14th SSM Brigade. Q-37 radars from A/252 Field Artillery (TAB) will be positioned well forward along PL MAMMEL to acquire enemy long range rocket/missile fires directed against division forces as they make preparations for the attack. LCMRs will cover critical point targets in 34 MEB AO, as well as the FIB and division CPs that are vulnerable to mortar fire from irregular forces. 56 BFSB will hand-off high-payoff targets forward of PL KEELER to the division fires cell for target development. High-payoff targets that they acquire west of PL KEELER will be passed to the 77 FIB for attack. At line of departure, the brigade target acquisition priorities shift to location and attack of elements of the 51st Motorized Division Tactical Group and the 102d or 103d Tank BTG, which are moving to interdict 5 HBCT, and enemy artillery interdicting 5 HBCT. Warrior and Shadow UAS are linked to joint fires systems to defeat repositioning or committing enemy reserve forces and protect 5 HBCT. During the attack, FIB HQ and HQ Battery (HHB) and rocket batteries will employ Raven UAS to reconnoiter routes and areas forward of their positions. Counterfire radars will move with rocket battalions and will continue to be pushed far forward. The 77 FIB will coordinate all radar coverage across 1 Division AO to ensure there are no gaps in coverage. The brigade HQ will recommend to BCTs their Q-36 coverage parameters (azimuth, zones, and limits) and direct the coverage parameters for BCT Q-37 radars. BCTs will continue to move and position their own radars. For detail see, Annex L (Surveillance and Reconnaissance).

d. (U) Scheme of Intelligence. During the initial shaping operation, the brigade intelligence system will fuse information from organic brigade sensors, division and higher sensors, and the 56 BFSB into a picture that allows the brigade to target and destroy armor and command and control elements of the 101st Tank BTG and launchers and command and control from the 14th SSM brigade. Priority of effort is on targeting followed by battle damage assessment. After the division line of departure, the intelligence system in coordination with 1 Division assistant chief of staff, intelligence (G-2) and 56 BFSB, will identify threats to 5 HBCT as it attacks to OBJECTIVE BEM. Priority of effort will be to situational development then targeting. After battle handover at OBJECTIVE BEM, the focus will be on targeting enemy forces on OBJECTIVE DIANA and situational development forward of PL HARRIS. The intelligence system will also support battalion situational awareness by identifying and tracking bypassed and irregular forces that can impact brigade units. For detail, see Annex B: (Intelligence).

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e. (U) Scheme of Fires**.** 72 hours prior to the 1 Division attack, beginning 070001D APR 20XX, the brigade will focus intelligence, surveillance and reconnaissance, armed Warrior UAS, indirect and joint fire support to find and destroy the 101st Tank BTG between PL MAMMEL and PL FAHRNI, and the 14 SSM Brigade along PL FAHRNI. Upon line of departure, the brigade's shaping operations shift to preventing enemy interruption of 5 HBCT's attack along HIGHWAY 1. Shaping 5 HBCT's attack is a three part task: 1) Support 87 IBCT's efforts to fix the 51st Motorized Division Tactical Group; 2) Be prepared to delay either the 102d or 103d Tanks' BTG for seven hours if either attacks from the north, and; 3) Execute counterfire to prevent enemy artillery from breaking the momentum of 5 HBCT. The brigade will also provide additional fires to support committed BCTs and support brigades. Upon battle handover between 5 HBCT and 2 HBCT after OBJECTIVE BEM, the brigade focus will shift to neutralization of the 261st Mechanized BTG in OBJECTIVE DIANA, support of the 11 CAB attack against the 513th Motorized BTG at LUSK RESERVOIR, destruction of enemy artillery systems that can affect committed BCTs, and close support of the BCTs.

(1) (U) Air Support**.** 77 FIB is allocated 32 CAS sorties/day and eight Warrior missions/day prior to line of departure, and 18 CAS sorties/day and eight Warrior missions/day after line of departure. The priority for CAS and armed Warrior UAS is against armored targets in 101st Tank BTG.

(2) (U) Field Artillery Support.

a. (U) Organization for combat.

A/251 FA (TAB) (-) GS 1 ID

1-77 FA (MLRS) general support (GS) 1 ID

2-77 FA (MLRS) GS 1 ID

3-77 FA high mobility artillery rocket system (HIMARS) GS 1ID

A/3-77 FA, general support-reinforcing (GSR1-92) FA (87 IBCT)

1-5 FA 155, self-propelled (SP) reinforcing (R) 3-16 FA (5 HBCT), O/O R 1-16 FA (2 HBCT)

6-14 FA (155, SP) (-) R 3-16 FA (5 HBCT), O/O R 1-16 FA (2 HBCT)

C/6-14 FA, Attached 34 MEB

5th Section, A/251 FA (TAB) (LCMR), Attached

6th Section, A/251 FA (TAB) (LCMR), Attached

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b. (U). Priority of fire. 1 Division priority of fires is initially to the Division HQ for shaping operations. Upon line of departure, the Division priority of fires is 5 HBCT, 87 IBCT, 2 HBCT, and 34 MEB in order.

(3) (U) Air and Missile Defense. 77 FIB receives area air and missile defense coverage from the 4-44 Air Defense Artillery Battalion (34 MEB). MLRS/HIMARS units, and counterfire radars are designated division high-value assets. For detail, see Appendix 1 (air and missile defense) to Annex E Protection.

Note: The air and missile defense appendix will move from Annex E Protection to Annex D Fires upon revision of ADP 6-0.

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a. (U) Organization for combat.

4-44 Air Defense Artillery (Patriot) GS.

b. (U) Priority of fire. MLRS/HIMARS units, and counterfire radars in order are designated division high-value assets.

(4) (U) Electronic Warfare Operations.

Electronic attack nominations will target the enemy forces' command and control network as they maneuver to interdict 5 HBCT during the attack and against the fire control network of long range SSM units during launch preparations. Electronic attack will be combined with scalable fires to prevent a coordinated enemy maneuver or fire support effort. Priority for electronic attack nominations are enemy SSM fire control nets and battalion and above maneuver nets. For detail, see Annex E (Protection).

(5) (U) Naval Fire Support.

(a) General.

1. TF 36.10 supports 1 ID with 2 ships.

2. Priority of fire initially to Division HQ, then 5 HBCT.

(b) Allocation

1. DD-78 (5"/62): GS.

2. DD-56 (5"/54): DS 5 HBCT.

(c) Miscellaneous.

1. Naval gunfire liaison officer reports to Div fires cell NLT 030001D APR 20XX.

2. Report ammo status daily at update briefings.

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(f) (U) Scheme of Protection.

(1) (U) Air and Missile Defense. 77 FIB receives area air and missile defense coverage from the 4-44 Air Defense Artillery Battalion (34 MEB). MLRS/HIMARS units, UAS launch/recovery sites, and counterfire radars are designated division high-value assets. For detail, see Appendix 1 (air and missile defense) to Annex E Protection.

(2) (U) Chemical, Biological, Radiological, and Nuclear**.** 77 FIB conducts chemical, biological, radiological, and nuclear (CBRN) operations in accordance with the principles of contamination avoidance, protection, and decontamination in that order. Brigade units receive decontamination support from C-325 CBRN Company. For detail, see Appendix 6 (Chemical, Biological, Radiological, and Nuclear Defense) to Annex E (Protection).

(3) (U) Military Police. 1st Platoon, 591 Military Police Company will provide protection, area security, and enemy prisoner of war handling in that priority. Priority for protection and area security is to sustainment operations conducted by the 77 BSB (brigade support battalion) and resupply convoys between 77 BSB and other 77 FIB units. For detail, see Appendix 4 (Operational Area Security) to Annex E (Protection).

(4) (U) Civil-Affairs Operations**.** During the attack 77 FIB supports 1 DIV civil affairs concept by providing minimal humanitarian assistance required by international law. Detachment 4, D/418 Civil Affairs Battalion will coordinate the assistance and work with the respective BCT Civil-Military Operations Center (CMOC) to expedite the transfer of responsibility for the civilians to WHITELAND civil authorities and appropriate international organizations.

g. (U) Stability Operations. (Omitted in example).

h. (U) Assessment. (Omitted in example).

i. (U) Tasks To Subordinate Units.

(1) (U) A/251 FA (TAB). See Attachment 1 (Radar Deployment Order); to Tab A (Target Acquisition); to Appendix 4 (Field Artillery Support) to Annex D (Fires).

(2) (U) 17 UAS Company. See Annex L (Reconnaissance and Surveillance).

(3) (U) 449 Signal Company. See Annex H (Signal).

(4) (U) 77 BSB (-). See annex F (Sustainment).

a. (U) Establish the 77 FIB sustainment area in TAA DIAMOND to support the brigade's attack to PL FAHRNI. O/O, move the FIB sustainment area to vicinity 38TNK9564. O/O, move the FIB sustainment area to vicinity 38TPK7151.

b. (U) Provide temporary enemy prisoner of war holding and transfer support to brigade units.

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(5) (U) 1-77 Field Artillery. See Appendix 4 (Field Artillery Support) to Annex D (Fires).

a. (U) Move along ROUTE MELON beginning 041600D APR 20XX from TAA DIAMOND to occupy PAAs 2A, 2B, 2C, 2D, and 2E along PL MAMMEL to support division shaping operations. Coordinate the movement off of ROUTE MELON into the PAAs with 1-14 Cavalry (5 HBCT).

b. (U) Maneuver, along with two Q-37 radars, in the northern and central portion of 5 HBCT's zone to PL HARRIS through the 7, 9, 10, and 11 series PAAs. Coordinate with either 1-14 Cavalry or 2-22 Infantry for integration into their scheme of maneuver.

c. (U) Provide security and positions within assigned PAAs for radars.

d. (U) Keep 1 platoon able to respond within 5 minutes to C/JFLC ATACMS fire mission requests.

e. (U) Be prepared to provide one battery in direct support (DS) to 11 CAB to support attacks to destroy either the 102d or 103d Tank BTG.

(6) 2-77 Field Artillery. See Appendix 4 (Field Artillery Support) to Annex D (Fires).

a. Move along ROUTES PEACH and PEAR beginning 041000D APR 20XX from TAA DIAMOND to occupy PAAs 3A, 3B, 3C, 3D, 3E, and 3F along PL MAMMEL. Coordinate the movement off of Routes PEACH and PEAR into the PAAs with 1-14 Cavalry (5 HBCT).

b. Maneuver along with one Q-37 radar in the southern portion of 5 HBCT's zone to PL HARRIS through the 8, 12, and 14 series PAAs. Coordinate with either 1-14 Cavalry or 1-68 Armor for integration into their scheme of maneuver.

c. Provide security and positions within assigned PAAs for radars.

d. Keep one platoon able to respond within 15 minutes to a division ATACMS fire mission request.

e. Be prepared to provide one battery reinforcing to 2-16 Field Artillery (10 HBCT) if 10 IBCT is committed to destroy the 102d or 103d Tank BTG.

(7) 3-77 Field Artillery. See Appendix 4 (Field Artillery Support) to Annex D (Fires).

a. (U) Move along ROUTES APPLE and TANGERINE beginning 041200D APR 20XX from TAA DIAMOND to occupy PAAs 5A, 5B, 5C, 6A, and 6B. C/3-77 Field Artillery will only be positioned in PAAs 6A/6B. Coordinate any movement off of Routes APPLE and TANGERINE into the PAAs with 2-14 Cavalry (87 HBCT).

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b. (U) Maneuver along with one Q-37 radar, in the 5 HBCT and 87 IBCT zone to PL HARRIS in the 11, 12, 13, 15, and 16 series PAAs. Coordinate with 2-14 Cavalry, 1-87 Infantry, or 1-68 Armor for integration into their scheme of maneuver.

c. (U) Provide security and positions within assigned PAAs for radars.

d. (U) Be prepared to provide one battery DS to 11 CAB in support of attacks against enemy forces vicinity LUSK RESERVOIR.

j. (U) Coordinating Instructions.

(1) (U) Time or condition when plan or order becomes effective**.** The 77 FIB OPORD XX-19 is effective upon receipt.

(2) (U) Commander's Critical Information Requirements.

a. (U) Location of air defense positions, command and control nodes and T-72 tank hide positions for 1st Battalion, 101st Tank BTG [latest time information of value]: H-4).

b. (U) Location of launchers and command and control nodes for 14th SSM Brigade (latest time information of value: OBJECTIVE BEM secure).

c. (U) When the lead elements of 512th Motorized BTG begin to move towards HIGHWAY 1.

d. (U) When the lead elements of either 102d or 103d Tank BTG begin entering mountain passes and crossing sites/bridges along the ALBA RIVER.

e. (U) Location of artillery within range of OBJECTIVE DIANA (Latest time information of value: OBJECTIVE DIANA SECURE).

(3) (U) Essential Elements of Friendly Information.

a. (U) Loss of any counterfire radar in the division.

b. (U) Weather changes that negatively affect UAS operations.

c. (U) Inability to meet C/JFLC's 5 minute ATACMS mission window.

d. (U) Inability to range 20 km beyond the lead BCT with 66-percent of the brigade's rocket assets.

e. (U) Loss of contact with the division CP longer than 10 minutes.

f. (U) Loss of a Shadow or Warrior UAS.

g. (U) 77 BSB falling more than 6 hours travel time behind the lead fires battalion.

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(4) (U) Fire support coordination measures (FSCM).

1. (U) Coordinated Fire Line is PL MAMMEL effective 031800D APR 20XX.

2. (U) Fire Support Coordination Line is PL HARRIS effective 032100D APR 20XX.

3. (U) See Annex D (Fires) for additional FSCMs.

(5) (U) Airspace Coordinating Measures. (Omitted in example).

(6) (U) Rules of Engagement. Operations outside of 1 Division AO require approval of the commanding general. See Appendix 12 (Rules of Engagement) to Annex C (Operations).

(7) (U) Risk Reduction Control Measures. Mission Oriented Protective Posture (MOPP) "0" initially in effect. Batteries/companies may upgrade based on the situation and their assessment. Notify the brigade CP of any upgrade.

(8) (U) Personnel Recovery Coordination Measures. (Omitted in example).

(9) (U) Environmental Considerations. Operations outside of 1 Division AO require approval of the commanding general. See Appendix 6 (Environmental Considerations) to Annex F (Engineer).

(10) (U) Information Themes and Messages. (Omitted in example).

(11) (U) Other Coordinating Instructions.

a. (U) Survivability moves within PAAs will be made in accordance with the 77 FIB tactical standing operating procedures and do not have to be coordinated with a ground maneuver HQ. Movement outside or between PAAs must be coordinated with the owning ground maneuver HQ.

b. (U) Unit commanders will conduct risk assessments that consider operational and environmental factors.

c. (U) Operations outside of 1 Division AO requires approval of the commanding general.

4. (U) Sustainment. 27 Sustainment Brigade rapidly establishes the division's battlefield distribution system. 77 BSB supports battalion forward support companies and FIB troops through a mix of supply point and distribution based sustainment. Initial priority of support is to the Brigade CP, 17 UAS Company, A-251 Field Artillery (TAB), 3-77 Field Artillery, 1-77 Field Artillery, 1-5 Field

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Artillery, 6-14 Field Artillery, and 2-77 Field Artillery in that order. The FIB sustainment area will initially be located in TAA DIAMOND and will be displaced before one-way travel time reaches three hours. The first scheduled deliberate replenishment operation for 1-77 Field Artillery, 1-5 Field Artillery, 6-14 Field Artillery, and A/3-77 Field Artillery occurs after OBJECTIVE JOHN is secured by 5 HBCT. The first scheduled deliberate replenishment operation for 2-77 Field Artillery and the remainder of 3-77 Field Artillery occurs along the axis of advance near PL FAHRNI before 2 HBCT conducts the passage of lines with 5 HBCT. The second deliberate replenishment operation for the entire brigade is scheduled to occur after OBJECTIVE DIANA is secure. The brigade troops will not conduct deliberate replenishment but will coordinate with 77 BSB for replenishment as the situation permits. Command-regulated items include classes V, VII and some class IX. Controlled substitution authorized at battalion level. Cannibalization authorized at 77 BSB level. 34 MEB is responsible for maintaining secure lines of communication between the 1 Division rear boundary and the BCT rear boundaries. Class VII replacement operations not expected until consolidation on PL HARRIS. 34 MEB controls main supply routes Red, Orange, and Brown. Priority of forward movement is to combat units moving to TAAs, classes V and III (B), personnel replacements and supply vehicles. Priority for rearward movement is ground medical evacuation, units for decontamination, transportation of combat systems for repair, enemy prisoners of war, and human remains.

a. (U) Logistics. See Appendix 1 (Logistics) to Annex F (Sustainment).

b. (U) Personnel. See Appendix 2 (Personnel Services Support) to Annex F (Sustainment).

(1) (U) Units submit operational immediate requests when battalion-sized units or larger fall below 80-percent of authorized strength.

(2) (U) Postal, casualty operations, morale, welfare and recreation, personnel accounting, and strength reporting, essential personnel services, financial management and administrative services provided on an area basis.

c. (U) Health System Support.

(1) (U) The 1 Combat Support Hospital is located in TAA DANGER (vicinity THEB'SOL).

(2) (U) The 9 Medical Battalion [44 Medical Brigade] provides area support to 77 FIB's units. Support is provided by—

77 FIB CP, 2-77 FA and brigade troops: 22 Medical Company.

1-77 FA, 1-5 FA, 6-14 FA: 15 Medical Company.

3-77 FA, 77 BSB: 34 Medical Company.

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(3) (U) The evacuation policy is 48 hours at medical companies providing area support to supporting brigade size units.

5. (U) Command and Signal.

a. (U) Command.

(1) (U) Location of Commander. Commander's location can be confirmed by contacting the main CP.

(2) (U) Succession of Command**.** Succession of Command is per 77 FIB tactical standing operating procedures.

(3) (U) Liaison Requirements. (Omitted in example.)

b. (U) Control.

(1) Command Posts. 77 FIB main CP initially located in TAA DIAMOND. O/O will travel with and collocate in vicinity 2 HBCT main CP. O/O will travel with and collocate with 10 HBCT at PL KEELER.

(2) (U) Reports. (Omitted in example.)

c. (U) Signal.

(1) (U) Current signal operating instructions are in effect.

(2) (U) All nets are installed frequency hopping, secure, and using global positioning system (GPS) DELTA time.

(3) (U) All Army Battle Command System (ABCS) systems must remain on at all times to enhance situational awareness and command and control. Communications status reports due 0900 and 2100 hrs daily.

(4) (U) Frequency modulation key changeover will occur every 30 days at 1600 local and challenge/reply and single channel frequency changeover will occur daily at 1600 local.

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(5) (U) Medical evacuation frequencies are single channel 35.25 and 32.50. Combat Net Radio Interface is frequency hopping 790.

(6) (U) There are no frequency modulation hopset changeovers.

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ANNEXES:

A – Task Organization

B – Intelligence

C – Operations

D – Fires

E – Protection

F – Sustainment

G – Engineer

H – Signal

I – not used

J – Inform and Influence Activities

K – Civil Affairs Operations

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L – Reconnaissance and Surveillance

M – Assessment

N – Space Operations

O – Not used

P – Host-Nation Support

Q – Spare

R – Reports

S – Special Technical Operations

T – Spare

U – Inspector General

V – Interagency Coordination

W – Spare

X – Spare

Y – Spare

Z – Distribution

DISTRIBUTION: (Omitted in example)

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ANNEX A (TASK ORGANIZATION) TO OPERATIONS ORDER XX-19 (OPERATION URGENT RESPONSE) 77 FIRES BRIGADE

(U) References:

a. (U) Maps: 1:250,000: Digital: 5NINM3538, 5NINM3942. Paper: National Imagery and Mapping Agency, Series 1501A, Joint Operations Graphic—Air (JOG-A), 1:250,000 Scale. Sheets: NK3706, NK3804, NK3805, NK3806, NK3904, NK3808, NK3809, NK3907, NK3811, NK3812, NK3910, NK3911, NJ3802, NJ3803, NJ3804, NJ3901, NJ3806, NJ3807, NJ3808, NJ3905, NJ3810, NJ3811, NJ3812, NJ3909, NJ3910, NJ3814, NJ3815, NJ3816, NJ3913, NJ3914.

b. (U) Combined/Joint Force Land Component (C/JFLC) OPORD XX-06 (OPERATION URGENT GUARD).

c. (U) 1 Division OPORD XX-45 (OPERATION URGENT RESPONSE).

(U) Time Zone Used Throughout the OPLAN/OPORD: Delta.

(U) Task Organization:

HQ, 77 FIB (Brigade Troops)

HHB, 77 FIB

A-251 Field Artillery (TAB) (-)

17 UAS Company (Shadow), Attached

449 Signal Company

Detachment 4, D/418 Civil Affairs Battalion, Attached

TACP, 19 Air Support Operations Squadron (USAF)

77 BSB (-)

HQ and HQ Company (HHC) 77 BSB

1009 Distribution Co

222 Maintenance Company

1 Platoon, 591 Military Police Company, 59 Military Police Battalion

1-77 Field Artillery (MLRS) GS

HHB/1-77 Field Artillery

A/1-77 Field Artillery

B/1-77 Field Artillery

C/1-77 Field Artillery

1-77 Forward Support Company, Attached

2-77 Field Artillery (MLRS) GS

HHB/2-77 Field Artillery

A/2-77 Field Artillery

B/2-77 Field Artillery

C/2-77 Field Artillery

2-77 Forward Support Company, Attached

2d Section, A/421 Expeditionary Signal Battalion (Command Post Node), Attached

3-77 Field Artillery (HIMARS) GS

HHB/3-77 Field Artillery

A/3-77 Field Artillery, GSR1-92 Field Artillery (87 IBCT)

B/3-77 Field Artillery

C/3-77 Field Artillery

3-77 Forward Support Company, Attached

3d Section, A/421 Expeditionary Signal Battalion (Command Post Node), Attached

1-5 Field Artillery (155, SP) R 3-16 Field Artillery (5 HBCT), O/O R 1-16 Field Artillery (2 HBCT)

HHB/1-5 Field Artillery

A/1-5 Field Artillery

B/1-5 Field Artillery

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[CLASSIFICATION]

Annex A (Task Organization) to Operations Order XX-19 (Operation Urgent Response) 77 Fires Brigade.

C/1-5 Field Artillery

1-5 Forward Support Company, Attached

4th Section, A/421 Expeditionary Signal Battalion (Command Post Node), Attached

6-14 Field Artillery (155, SP) (-) R 3-16 Field Artillery (5 HBCT), O/O R 1-16 Field Artillery (2 HBCT)

HHB/6-14 Field Artillery

A/6-14 Field Artillery

B/6-14 Field Artillery

C/6-14 Field Artillery, Attached 34 MEB

5th Section, A/251 Field Artillery (TAB) (LCMR), Attached

6th Section, A/251 Field Artillery (TAB) (LCMR), Attached

1-14 Forward Support Company, Attached

5th Section, A/421 Expeditionary Signal Battalion (Command Post Node), Attached

Appendix B

Fires Brigade Training

Commanders determine how to train their units, and the manner chosen becomes the fires brigade (FIB) commander's training strategy. Field manual (FM) 7-15, training circular (TC) 3-09.8, and the Combined Arms Training Strategies for units collectively provide tasks and events that FIB commanders may use to help develop their training strategy for the FIB.

B-1. Training and Readiness Authority (TRA). TRA derives from CG, FORSCOM command authority (mission) for selected Title 10 functions (train, equip, administer) and is delegated to FORSCOM Corps, Division, MSC, and brigade/group commanders. Once delegated by CG, FORSCOM, TRA cannot be usurped by another commander. TRA is the authority for matters affecting the training and readiness of specified units. This authority is inherent in command authority and may be delegated in whole or in part to subordinate commanders. TRA is the execution of those functions of command involving the training, manning, and equipping of units. Unless specified otherwise by the Senior Commander (SC), it includes authority to give direction to an assigned or attached unit concerning unit readiness and organizational training.

B-2. The FIB Commander can assist his TRA Commander in executing those functions involving the training of all 13 series MOS within the BCT with the following actions.

- In conjunction with the BCT Commanders provide training guidance and approve training plans/programs.
- Provide guidance and oversight for training standardization and certification.
- In conjunction with the BCT Commanders provide Mission Essential Task List (METL) guidance and approve unit METL.
- In conjunction with the BCT Commanders assist in the development of the Mission Training Brief.
- Assess state of training and provide training direction for 13 Series MOS.
- Assess manpower, equipment, and training resource requirements; coordinate the obtaining of needed resources.
- In conjunction with the BCT Commanders review Unit Readiness Reports (USR).
- Provide advice on the management and leader development of CMF 13 personnel and Field Artillery/Fire Support equipment; including the cross-leveling between attached units on the same installation (cross-leveling between installations will be directed by FORSCOM).
- Assist the Division Commander in planning, preparing and executing Fires Battalion external evaluations and major Fires Battalion training exercises.

B-3. TC 3-09.8 provides tables for the various unit sections and unit collective training with which to structure a progressive and sequential fire support training strategy for the brigade combat team (BCT)

including dry-fire certification before live-fire qualification. The tables are not a strategy for training all tasks and areas required for the BCT and its subordinate units to obtain a rating of "trained" on an external evaluation as described in the unit CATS.

B-4. The tables do outline a plan for fire support training for the BCT. After completion of individual and section qualifications the FIB must train sections, teams, and leaders to operate together as a platoon, then battery or company, then battalion, or squadron, then as a FIB to provide timely and accurate fire support.

Glossary

SECTION I – ACRONYMS AND ABBREVIATIONS

ABCS	Army Battle Command System
AFATDS	Advanced Field Artillery Tactical Data System
ALO	air liaison officer
AMDWS	air and missile defense workstation
AO	area of operations
ASAS	all source analysis system
ATACMS	Army Tactical Missile System
BCT	brigade combat team
BDAR	battle damage assessment and repair
BSB	brigade support battalion
CAS	close air support
CFZ	critical friendly zone
COA	course of action
C/JFLCC	combined/joint force land component commander
COLT	combat observation and lasing team
CP	command post
D3A	decide, detect, deliver, and assess
DODAAC	Department of Defense activity address code
DTSS	digital topographic support system
EPLRS	enhanced position location reporting system
FBCB2	Force XXI battle command – brigade and below
FIB	fires brigade
FIST	fire support team
FM	field manual
FO	forward observer
FSCM	fire support coordination measure
FSO	fire support officer
G-2	assistant chief of staff, intelligence
G-3	assistant chief of staff, operations
G-4	assistant chief of staff, logistics
G-6	assistant chief of staff, signal
GCCS-A	global command and control system - Army
GS	general support

GSR	general support-reinforcing
HHB	headquarters and headquarters battery
HIMARS	high mobility artillery rocket system
HQ	headquarters
IPB	intelligence preparation of the battlefield
JAAT	joint air attack team
J-6	communications system directorate of a joint staff
JFC	joint force commander
JNN	joint network node
JP	joint publication
J-SEAD	joint suppression of enemy air defenses
JTF	joint task force
km	kilometer
LCMR	lightweight countermortar radar
MCS	maneuver control system
MDMP	military decisionmaking process
METT-TC	mission, enemy, terrain and weather, troops and support available, time available, civil considerations
MHz	megahertz
MLRS	multiple launch rocket system
MSE	mobile subscriber equipment
NGLO	naval gunfire liaison officer
NSFS	naval surface fire support
OPCON	operational control
OPLAN	operation plan
OPORD	operation order
R5	reception, replacement, return-to-duty, rest and recuperation, and redeployment
S-1	personnel staff officer
S-2	intelligence staff officer
S-3	operations staff officer
S-4	logistics (sustainment) staff officer
S-5	plans staff officer
S-6	signal staff officer
S-7	inform and influence activities staff officer
S-9	civil affairs operations staff officer
SAMS-E	standard Army maintenance system-enhanced
SEAD	suppression of enemy air defense

SOP	standing operating procedure
TA	target acquisition
TAA	tactical assembly area
TAB	target acquisition battery
TAC CP	tactical command post
TACON	tactical control
TACP	tactical air control party
TOE	table of organization and equipment
UAS	unmanned aircraft system
USAF	United States Air Force

SECTION II – TERMS

airspace coordination area

(joint) A three-dimensional block of airspace in a target area, established by the appropriate ground commander, in which friendly aircraft are reasonably safe from friendly surface fires. The airspace coordination area may be formal or informal. (JP 3-09.3)

area of operations

(joint) An operational area defined by the joint force commander for land and maritime forces. Areas of operations do not typically encompass the entire operational area of the joint force commander, but should be large enough for component commanders to accomplish their missions and protect their forces. (JP 3-0)

civil affairs operations

(joint) Those military operations conducted by civil affairs forces that (1) enhance the relationship between military forces and civil authorities in localities where military forces are present; (2) require coordination with other interagency organizations, intergovernmental organizations, nongovernmental organizations, indigenous populations and institutions, and the private sector; and (3) involve application of functional specialty skills that normally are the responsibility of civil government to enhance the conduct of civil-military operations. (JP 3-57)

clearance of fires

The process of approving or obtaining approval to attack targets with fires within and outside the boundaries of the supported unit for which the fires are provided. (FM 3-09)

close air support

(joint) Air action by fixed- and rotary-wing aircraft against hostile targets that are in close proximity to friendly forces and that require detailed integration of each air mission with the fire and movement of those forces. (JP 3-0)

commander's critical information requirement

(joint) An information requirement identified by the commander as being critical to facilitating timely decision-making. The two key elements are friendly force information requirements and priority intelligence requirements. (JP 3-0)

counterfire

(joint) Fire intentded to destroy or neutralize enemy weapons. Includes counterbattery, counterbombardment, and countermortar fire. (JP 3-09)

effect

(joint) 1. The physical or behavioral state of a system that results from an action, a set of actions, or another effect. 2. The result, outcome, or consequence of an action. 3. A change to a condition, behavior, or degree of freedom. (JP 3-0)

***fire plan**

A tactical plan for using the weapons of a unit or formation so that their fires will be coordinated.

fires

(joint) The use of weapon systems to create specific lethal or nonlethal effects on a target. (JP 3-0)

fire support

(joint) Fires that directly support land, maritime, amphibious, and special operations forces to engage enemy forces, combat formations, and facilities in pursuit of tactical and operational objectives. (JP 3-09.3) (NATO) The application of fire, coordinated with the maneuver of forces, to destroy, neutralize or suppress the enemy. (AAP-6)

fire support coordination

(joint) The planning and executing of fire so that targets are adequately covered by a suitable weapon or group of weapons. (JP 3-09)

fire support coordination measure

(joint) A measure employed by commanders to facilitate the rapid engagement of targets and simultaneously provide safeguards for friendly forces. (JP 3-0)

fire support officer

(Army) A field artillery officer from company to theater Army level responsible for either advising the commander or assisting the chief of fires/brigade fire support officer to advise the maneuver commander on fire support matters. (FM 3-09)

fire support planning

Fire support planning integrates and synchronizes scalable Army indirect fires, joint fires, and multinational fires with the other warfighting functions into the commander's concept of operations. (FM 3-09)

fires warfighting function

The related tasks and systems that provide collective and coordinated use of Army indirect fires, air and missile defense and joint fires through the targeting process. (ADP 3-0)

force field artillery headquarters

If one is designated by the supported commander, a force field artillery headquarters is normally the senior field artillery headquarters organic, assigned, attached, or placed under the operational control of that command. The supported commander specifies the commensurate responsibilities of the force field artillery headquarters and, if necessary, the duration of those responsibilities. (FM 3-09)

high-payoff target

(joint) A target whose loss to the enemy will significantly contribute to the success of the friendly course of action. High-payoff targets are those high-value targets that must be acquired and successfully attacked for the success of the friendly commander's mission. (JP 3-60)

high-payoff target list

(joint) A prioritized list of high-payoff targets by phase of the joint operation. (JP 3-60)

high-value target

(joint) A target the enemy commander requires for the successful completion of the mission. The loss of high-value targets would be expected to seriously degrade important enemy functions throughout the friendly commander's area of interest. (JP 3-60)

measure of effectiveness

(joint) A criterion used to assess changes in system behavior, capability, or operational environment that is tied to measuring the attainment of an end state, achievement of an objective, or creation of an effect. (JP 3-0)

measure of performance

(joint) A criterion to assess friendly actions that is tied to measuring task accomplishment. (JP 3-0)

operational area

(joint) An overarching term encompassing more descriptive terms (such as area of responsibility and joint operations area) for geographic areas in which military operations are conducted. (JP 3-0)

running estimate

The continuous assessment of the current situation used to determine if the current operation is proceeding according to the commander's intent and if planned future operations are supportable. (ADP 5-0)

situational awareness

(Army) Immediate knowledge of the conditions of the operation, constrained geographically and in time. (ADP 3-0) (Marine Corps) Knowledge and understanding of the current situation which promotes timely, relevant, and accurate assessment of friendly, enemy, and other operations within the battlespace in order to facilitate decisionmaking. An informational perspective and skill that fosters an ability to determine quickly the context and relevance of events that are unfolding. (ADRP 1-02)

situational understanding

(Army) The product of applying analysis and judgment to relevant information to determine the relationship among the mission variables to facilitate decisionmaking. (ADP 6-0) See also relevant information. (Marine Corps) The product of applying analysis and synthesis to relevant information to determine the relationship among the mission, enemy, terrain and weather, troops and support available—time available variables to facilitate decisionmaking. (ADRP 1-02)

working group

(Army) A temporary grouping of predetermined staff representatives who meet to coordinate and provide recommendations for a particular purpose or function. (ATTP 5-0.1)

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References

Reference military publications are listed by title. When a field manual has been published under a new number for the first time, the old number is provided in parenthesis after the new number.

REQUIRED PUBLICATIONS

These documents must be available to intended users of this publication.

ARMY PUBLICATIONS

ADP 3-0, *Unified Land Operations,* 10 October 2011.

ADP 4-0, *Sustainment*, 31 July 2012.

ADP 5-0, *The Operations Process,* 17 May 2012.

ADP 6-0, *Mission Command*, 17 May 2012.

ATTP 3-04.15, *Multiservice Tactics, Techniques, and Procedures for Unmanned Aircraft Systems,* 20 September 2011.

ATTP 4-02, *Army Health System*, 7 October 2011.

ATTP 5-0.1, *Commander and Staff Officer Guide,* 14 September 2011.

FM 1-0, *Human Resources Support*, 6 April 2010.

FM 1-01, *Generating Force Support for Operations*, 2 April 2008.

FM 1-02, *Operational Terms and Graphics*, 21 September 2004.

FM 1-05, *Religious Support*, 5 October 2012.

FM 2-01.3, *Intelligence Preparation of the Battlefield/Battlespace*, 15 October 2009.

FM 3-01.4, *Multiservice Tactics, Techniques, and Procedures (MTTP) for Joint Suppression of Enemy Air Defenses*, 28 May 2004.

FM 3-04.126, *Attack Reconnaissance Helicopter Operations*, 16 February 2007.

FM 3-09 (FM 6-20), *Fire Support*, 3 November, 2011.

FM 3-09.12, *Tactics, Techniques and Procedures for Field Artillery Target Acquisition*, 21 June 2002.

FM 3-09.15, *Tactics, Techniques, and Procedures for Field Artillery Meteorology*, 25 October 2007.

FM 3-09.32, *JFIRE Multi-Service Procedures for the Joint Application of Firepower*, 20 December 2007.

FM 3-34.331, *Topographic Surveying*, 16 January 2001.

FM 3-39.40, *Internment and Resettlement Operations*, 12 February 2010.

FM 3-52, *Army Airspace Command and Control in a Combat Zone*, 25 September 2012.

FM 3-52.2, *TAGS Multi-Service Tactics, Techniques, and Procedures for the Theater Air-Ground System*, 10 April 2007.

FM 3-55.6, *Multi-Service Tactics, Techniques and Procedures for Joint Surveillance Target Attack Radar System*, 16 November 2006.

FM 3-57, *Civil Affairs Operations*, 31 October 2011.

FM 3-60, *The Targeting Process,* 26 November 2010.

FM 3-61.1, *Public Affairs Tactics, Techniques, and Procedures*, 1 October 2000.

FM 3-90, *Tactics*, 4 July 2001.

FM 3-90.6, *Brigade Combat Team*, 14 September 2010.

FM 4-02.2, *Medical Evacuation*, 8 May 2007.

FM 4-02.4, *Medical Platoon Leaders' Handbook, Tactics, Techniques, and Procedures*, 24 August 2001.

FM 4-02.17, *Preventive Medicine Services*, 28 August 2000.

FM 4-02.21, *Division and Brigade Surgeons' Handbook (Digitized) Tactics, Techniques, and Procedures*, 15 November 2000.

FM 4-02.51, *Combat and Operational Stress Control*, 6 July 2006.

FM 4-30.31, *Recovery and Battle Damage Assessment and Repair*, 19 September 2006.

FM 4-90, *Brigade Support Battalion*, 31 August 2010.

FM 5-19, *Composite Risk Management*, 21 August 2006.

FM 6-02.43, *Signal Soldier's Guide*, 17 March 2009.

FM 6-2, *Tactics, Techniques, and Procedures for Field Artillery Survey*, 23 September 1993.

FM 7-15, *The Army Universal Task List,* 27 February 2009.

FM 8-55, *Planning for Health Service Support*, 9 September 1994.

FM 27-10, *The Law of Land Warfare*, 18 July 1956.

ARMY REGULATIONS

AR 27-10, *Military Justice*, 3 October 2011.

AR 40-5, *Preventive Medicine*, 25 May 2007.

DEPARTMENT OF THE ARMY FORMS

DA Form 581, *Request For Issue and Turn-In of Ammunition*.

DA Form 1156, *Casualty Feeder Card*.

DA Form 2028, *Recommended Changes to Publications and Blank Forms*.

DEPARTMENT OF DEFENSE FORMS

DD Form 565, *Statement of Recognition of Deceased*.

RELATED PUBLICATIONS

EXECUTIVE ORDERS

Executive Order 13139, *Improving Health Protection of Military Personnel Participating in Particular Military Operations*, Office of the President of the United States, 30 September 1999.

JOINT PUBLICATIONS

JP 1, *Doctrine for the Armed Forces of the Unites States*, 14 May 2007.

JP 1-02, *Department of Defense Dictionary of Military and Associated Terms*, 8 November 2010.

JP 2-0, *Joint Intelligence*, 22 June 2007.

JP 3-0, *Joint Operations*, 11 August 2011.

JP 3-01, *Countering Air and Missile Threats*, 23 March 2012.

JP 3-03, *Joint Interdiction*, 14 October 2011.

JP 3-08, *Interorganizational Coordination during Joint Operations*, 24 June 2011.

JP 3-09, *Joint Fire Support*, 30 June 2010.

JP 3-09.3, *Close Air Support*, 8 July 2009.

JP 3-13, *Information Operations*, 13 February 2006.

JP 3-16, *Multinational Operations*, 7 March 2007.

JP 3-52, *Joint Airspace Control*, 20 May 2010.

JP 3-57, *Civil-Military Operations*, 8 July 2008.

JP 3-60, *Joint Targeting*, 13 April 2007.

JP 3-63, Detainee Operations, 30 May 2008.

JP 5-0, *Joint Operation Planning*, 11 August 2011.

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ATP 3-09.24
21 November 2012

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