

**CHAPTER 9**  
**THE OFFENSIVE**  
**SECTION I**  
**GENERAL**

**THE OBJECTIVE**

■ 450. An objective sometimes may be attained by maneuver alone; ordinarily it must be gained by battle. A sound tactical maneuver has a great influence on the successful outcome of battle.

■ 451. The purpose of offensive action is the destruction of the hostile armed forces. To facilitate the accomplishment of this purpose the commander selects a *physical objective* such as a body of troops, dominating terrain, a center of lines of communication, or other vital area in the hostile rear for his attack. The attainment of this objective is the basis of his own and all subordinate plans. This objective should have the following characteristics:

a. Its capture must be possible within the time and space limits imposed by the assigned mission.

b. Its capture should assure the destruction of the enemy in his position, or the threat of its capture should compel the enemy to evacuate his position.

c. It should produce a convergence of effort.

d. It must be easily identified.

e. Its capture should facilitate contemplated future operations.

■ 452. The objective having been selected, all components are directed in coordinated effort towards its attainment. Actions which do not contribute to this purpose are avoided.

■ 453. Sound tactical maneuver in the offensive is characterized by a concentration of effort in a direction where success will insure the attainment of the objective. On the remainder of the front are used only the minimum means necessary to deceive the enemy and to hinder his maneuver to oppose the main attack.

## DISTRIBUTION OF FORCES

■ 454. In the offensive, troops are distributed into two or more principal tactical groupings: one or more *main* or *decisive attacks* in which the *greatest possible offensive power is concentrated* to bring about a decision, and one or more *secondary* or *holding attacks* whose mission is to render maximum assistance to the main attack.

Main attack groupings are designed to secure the objective and to destroy the hostile force. Secondary attack groupings are designed to *hold the enemy* in position, to *force him to commit his reserves* prematurely and to an indecisive location, and to *prevent him from reinforcing* the front of the main attack.

■ 455. In each tactical grouping, the mass of the available means of combat is concentrated in a *main effort* and is applied in a *decisive direction*.

■ 456. *Main attacks* are characterized by narrow zones of action, by strong support of artillery, tanks, and other supporting weapons, by effective support of combat aviation, and by deep echelonment of reserves.

■ 457. *Secondary attacks* are characterized by lack of depth, reduction of reserves to the minimum, maximum fire power in the attacking echelon, and by wide zones of action for the attack units. They will therefore usually be assigned limited objectives initially.

■ 458. When it is impracticable to determine initially when or where the main attack is to be made, the commander retains his freedom to act by disposing his forces in great depth, by holding out strong reserves, and by maintaining close control of his supporting weapons.

■ 459. Attacking echelons once committed to action lose their immediate availability for employment in the execution of other missions. Deployed and under fire, they can change front only at the risk of incurring heavy losses. The commander can materially influence the course of an action once begun through the employment of reserves, fire support, and combat aviation.

■ 460. In selecting the direction for the main attack, the terrain must be carefully studied. The choice of the front

on which the main attack and the main efforts of subordinate units are made often is determined by the possibilities which the terrain offers for effective employment of artillery and mechanized units.

Selection of the direction of the main attack also is influenced by the time available for movement before the attack must be launched. In many situations the most rapid and decisive results are to be expected when the main attack is composed principally of large armored units or when such units lead the main attack. Air superiority and effective support of the armored units by combat aviation are essential to the sustained drive of the armored units.

#### FORMS OF OFFENSIVE ACTION

■ 461. Attack maneuvers are classified as *envelopments* and *penetrations*.

■ 462. In an envelopment, the main attack is directed against the flank or rear of the initial disposition of the enemy's main forces and toward an objective in rear of his front lines. It seeks to surround that portion of the enemy's forces in front of the objective. It is assisted usually by a secondary attack directed against the enemy's front.

A successful envelopment depends largely on the degree of surprise attained and on the ability of the secondary attack to contain the bulk of the enemy's forces. Surprise is secured by maneuvering to avoid observation by the enemy and by deceiving him. Superior mobility increases the prospect of success.

An envelopment avoids attacking on ground chosen by the enemy, and forces him to fight in two or more directions to meet the converging efforts of the attack. An envelopment which strikes the defender's flank or rear so as to avoid any part of his organized front and small-arms fire from that front is preferable. It minimizes losses, handicaps the defender's ability to meet it promptly, compels the defender to meet an attack on ground chosen by the attacker and when successful is more decisive.

■ 463. A *turning movement* is an enveloping maneuver which passes around the enemy's main forces, striking at some vital point deep in the hostile rear. The force making the maneuver usually operates so far from the secondary attack that the

principal tactical groupings are beyond mutual supporting distance (the distance by which forces may be separated and yet permit one to move to the aid of another before it can be defeated by an enemy force); hence, each grouping must be strong enough or mobile enough to avoid defeat in detail. When conditions favor such action, all combat elements of the command may be employed in the turning force, leaving only reconnaissance elements confronting the hostile dispositions. The turning movement is adapted particularly to highly mobile commands, such as cavalry, armored and motorized forces, and forces transported by aircraft. It is invariably employed by highly mobile forces in situations in which the vital objective in the hostile rear can be seized by such a maneuver before it is necessary to involve the enveloping force in a major engagement with the enemy. Deception, secrecy, and mobility are vital to successful execution of a turning movement.

■ 464. When the enemy takes up a defensive position, the commander of the attacking forces should consider the possibility of turning the enemy out of his position and forcing him to withdraw and fight on ground more favorable to the attacker.

Situations may occur, especially in the pursuit of a defeated force, in which the enemy can be forced by direct attack to take up a defensive position while a portion of the more mobile attacking forces executes a turning movement against his lines of communication.

■ 465. A *double envelopment* is executed by three principal tactical groups, two enveloping attack forces and a secondary attack force. A simultaneous envelopment of both flanks generally requires considerable superiority.

The command seeking to attack by double development must be deployed or capable of deploying on a broad front against an enemy on a much narrower front or with little capability or room for maneuver. The maneuver is executed by fighting a holding battle with the center while enveloping forces strike on both hostile flanks. When mobile forces are available in reserve, they may complete the envelopment by an attack from the rear. When conditions favor it, this form of maneuver should be used because of the decisive results it promises.

■ 466. An *envelopment of one flank* is executed by two principal tactical groups, the main or enveloping attack force and the secondary attack force. After an initial envelopment of one flank, favorable conditions for passing to a double envelopment through the use of reserves may be created when the success of our troops has placed the enemy in a disadvantageous situation.

■ 467. The enemy's preparations to meet an envelopment of his flank ordinarily cannot be organized as completely as the defense of his front, especially if the envelopment is launched from a locality deep on the hostile flank or rear.

The defender strengthens an unsupported flank by reserves echeloned in depth and in width. When threatened with envelopment he moves them to meet the maneuver. He may attempt to envelop the attacking forces, or to extend his flank beyond that of the attack up to the limit of his strength. An attempt on the part of the attacker to meet such hostile extension may lead to overextension or to a dangerous separation of the enveloping forces from those making the secondary attack. It usually is better to take advantage of the enemy's extension and consequent weakness by retaining a deep formation and to penetrate his thinly held front than to overextend in an effort further to outflank the position. When the enemy extends his position beyond the enveloping forces, particular attention must be paid to protecting the exterior flank by the use of the general reserves of the higher commander.

■ 468. In a *penetration* the main attack passes through some portion of the area occupied by the enemy's main forces and is directed on an objective in his rear. It is characterized by the complete rupture of the enemy's dispositions; the seizure of the objective by operations through the gap; and the envelopment of one or both flanks created by the breakthrough.

The essential conditions for success are surprise, sufficient fire power, especially combat aviation and artillery, to neutralize the front of penetration, favorable terrain within the hostile position for the advance of the attacking troops, and strength to carry the attack through to its objective.

■ 469. When the situation does not favor an envelopment, the main attack is directed to penetrate the hostile front.

Conditions which demand a penetration are enemy's flanks unassailable; lack of time to make an enveloping maneuver. Conditions which favor a penetration are overextension of the enemy; terrain and observation favorable for more effective cooperation of the combined arms. Such an attack often can be organized more quickly than can an envelopment.

■ 470. In the penetration of a defensive position, the main attack is launched on a front wider than that of the contemplated break-through in order to hold the enemy in place on the flanks of the penetration. The attack on the remainder of the hostile front is designed to contain the enemy and prevent him from moving his reserves.

The amount of artillery, mechanized units, and supporting combat aviation available largely determines the width of the front of penetration. The wider the front of penetration, the deeper can it be driven and the more difficult will it be for the enemy to close the gap. The deeper the penetration, the more effective will be the action of mobile reserves in seizing the objective and rolling up the hostile flanks.

The greatest distribution in depth is placed opposite the prospective front of penetration. The distribution of troops provides for three separate impulses; a break through the hostile position, a widening of the gap thus created by enveloping one or both interior hostile flanks, and the seizure of the objective and exploitation of the success.

The sequence of these impulses depends on the situation. In some situations it is practicable through the existence of weaknesses or gaps in the enemy's front for mobile troops (armored, motorized, or cavalry divisions) to break through and to proceed straight to the objective, while operations of local envelopment and exploitation are performed by less mobile troops. In other situations foot troops must break through, the more mobile troops being held initially in reserve and used later to operate through the gap created by the foot troops.

■ 471. The mission of the attacking echelon of troops is to break through the enemy's dispositions so that he will be unable to reconstitute his front on a rearward line. Until this mission has been accomplished, the attacking troops do not divert their strength to the attack of the flanks of the gap. Hostile counterattacks against the flanks of the pene-

tration are met by reserves, by the fire of the artillery, and by combat aviation.

The missions of rolling up the flanks of a gap created by penetration and of exploiting the break-through are assigned to reserves. Cavalry, armored and motorized units are especially suitable for seizing the objective and for exploitation. These units are supported by combat aviation operating against hostile reserves and artillery and other important objectives. Troops transported by air may be used to support these operations.

■ 472. In large commands, a penetration often is initiated by launching simultaneously two or more powerful attacks (a *multiple penetration*) against weak localities on the hostile front. Strong localities are contained initially by secondary attacks. When the penetrating attacks have advanced far enough to permit, the interior strong localities are reduced by maneuver, and the penetrating attacks are united into a single main attack. The pinching out of strong hostile localities often is facilitated by launching multiple penetrations in converging directions. The doctrines applicable to a single penetration govern the organization and conduct of a multiple penetration.

■ 473. Whether the maneuver adopted is an envelopment or a penetration, success will depend primarily on intelligent, energetic, and coordinated execution. This execution must be based on a sound plan which is influenced largely by the objective and direction of the main attack.

The doctrines which underlie the employment of the combined arms in the offensive are conservation of the combat power of troops in the attack echelon, provision of assistance for them to close with the enemy, and thereafter support of their attack until the enemy's power of resistance is broken.

#### FRONTAGES AND DEPTHS

■ 474. The *frontage* assigned to any unit in an attack varies with the mobility, type of armament, mission and combat power of the unit, the terrain, the amount of fire support available, and the probable hostile resistance. As a general guide, an infantry battalion at full strength in a main attack seldom is assigned a *frontage* less than 500 yards or more than 1,000 yards measured on the front of the hostile position.

■ 475. Units are distributed in *depth* to provide flexibility of maneuver, continuity in the attack, and security. For infantry units, depth of formation for combat rather than a wide extension of front is necessary in the initial deployment. The progress of battle will call for maneuvers that cannot be clearly foreseen. This condition can be met only by initial distribution in depth.

Laterally the distribution of troops in attack is governed principally by the doctrine of the main attack and main effort. It is influenced also by the relative advantages offered by different sections of the terrain. When the situation requires an unusually wide extension of the command, the increase is effected by widening the gaps between units.

#### RESERVES

■ 476. The initial strength and location of the *reserve* will vary with its contemplated missions, the type of maneuver, possible hostile reaction, and clarity of the situation. After the attack is launched the *reserve* and the fires of supporting arms are the principal means available to the commander for shaping the course of action and for enforcing favorable decision.

The primary mission of the reserve is to enter the action *offensively* at the proper place and moment to clinch the victory. Hence its initial strength and location are controlled largely by the maneuver to be executed.

■ 477. In a penetration the reserve must be large enough to exploit the break-through by enveloping one or both of the flanks created and by operating deep in the hostile rear.

To facilitate its rapid movement through the gap the reserve is located generally in rear of the main attack.

■ 478. In an envelopment the reserve must be large enough to extend the envelopment or to exploit a successful enveloping action by operating against the hostile rear. To favor the envelopment the reserve is disposed toward the flank enveloped.

■ 479. When open flanks exist or when there is danger of a hostile threat some reserves are disposed to meet dangerous contingencies.

■ 480. When the situation is relatively clear and enemy capabilities are limited the reserve may consist of a small fraction

of the command disposed to favor the maneuver. When the situation is obscure the reserve may consist initially of the bulk of the command, centrally located and prepared to move to any point on the front or flanks.

■ 481. The location of the reserve should combine a maximum of protection for itself against hostile observation and air and mechanized attack with a road net which facilitates rapid movement to any point of possible employment. Motor vehicles should be held available for the movement of reserves lacking organic means of rapid movement.

■ 482. Choosing the proper time at which the reserve should be used is often the commander's most difficult and most important decision.

Nevertheless, at the decisive moment of action every man that can be used to advantage must participate in the battle and the reserve must be launched without hesitation. As far as practicable the reserve is sent in by complete units. Reinforcement by dribblets is avoided. Commanders endeavor to reconstitute reserves from troops which the course of the action has made available.

#### COORDINATION

■ 483. The commander is responsible for coordination of the action of all elements of his command.

■ 484. In all cases the highest degree of coordination permitted by the situation and time element is sought. The considerations discussed below are applicable in general to situations in which thorough coordination can be prescribed. In other situations they are applied to the degree practicable.

■ 485. Against a strong enemy a decision to develop and deploy for attack directly from march columns risks loss of control and sacrifices some of the capabilities of artillery, tanks, and other supporting weapons. Ordinarily an attack in a moving situation may be organized and *coordinated* in *assembly positions*.

■ 486. From a march formation the commander develops the main body for a coordinated attack by assigning march objectives to the larger units, usually the assembly positions they are to occupy, and routes or zones of advance thereto. The development order announces the missions of units

already engaged, the missions of the artillery, the dispositions of the main body, the security measures to be taken, and instructions for further reconnaissance. It provides for essential administrative details so that the necessary preparations can be made. Instructions given in the development order are as complete as possible so that the attack order may be brief. For movement to assembly positions and security during development, see paragraphs 364-369, and 436-438.

■ 487. The location of assembly positions is dependent on several factors. Darkness, cover from observed hostile artillery fire, a thorough knowledge of the situation, and a plan of attack already decided, favor advanced positions located in conformity with the plan of maneuver. Conditions the reverse of these indicate the selection of assembly positions well back.

Units of high mobility such as tanks, cavalry, and armored forces may complete their development and preparations for battle at greater distances from the hostile front.

If the plan of attack involves an enveloping maneuver, the assembly position of the enveloping force is set off at a sufficient interval from the troops in the secondary attack to preclude interference between units when deployed for attack.

■ 488. Subordinate commanders assigned assembly positions may in turn assign more advanced assembly positions to the component units of their commands as knowledge of the situation and of plans becomes available. The final assembly position of an infantry battalion in the attack echelon usually is in the most forward concealed position available in rear of the line of departure. It should afford cover from hostile small-arms fire.

■ 489. While units are moving into and during the occupation of their assembly positions the commander prepares his orders and completes arrangements for the execution of his plan of maneuver.

Commanders of troops in the attack echelon and the commanders of units designated to support them coordinate the action of their units. Reconnaissance is initiated by all commanders prior to arrival in their final assembly positions.

■ 490. As each unit arrives in its assembly position, measures are taken immediately for security and for clearing the roads.

Signal communication is established without delay between the superior command post and the major subordinate units. Equipment not essential to combat is disposed of, extra ammunition is issued to troops, reconnaissances are completed, coordination of the plans of maneuver and plans of fire of subordinate units is completed, and attack orders are issued promptly.

■ 491. Development of the command terminates with the troops distributed in accordance with the plan for their employment, and in an approach march formation favoring rapid deployment.

■ 492. Should the commander decide that rapidity of action is essential to retain a tactical advantage, he may dispense with assembly positions, decentralize operations to combat teams or task forces, and issue orders to those units to develop and attack.

■ 493. Subordinate units to be deployed for attack ordinarily are assigned a *zone of action* and a *direction of attack* or an *objective*. Zones of action regulate the limits for battle reconnaissance and combat of the unit. It is not necessary that troop formations extend across the entire zone of action of a unit as part of the zone of action can often be covered by fire, by small patrols, or by both. A preponderance of force on any particular part of the front is obtained by varying the zones of action of subordinate units.

Zones of action are defined by designating their lateral *boundaries* or by the assignment of a front of deployment and the designation of the lateral limits of the objective. An open flank ordinarily is not bounded. In some situations, the designation of the objective is sufficient to indicate the zone of action. In large units the designation of objectives and boundaries may be made from the map; in small units these designations are made on the ground. *Points designated should be identified easily on the ground.*

Zones of action should extend through the depth of the hostile position at least as far as the location of the hostile artillery. Important localities and terrain corridors commensurate with the size of a tactical unit should lie wholly within the zone of action of that unit. If it is desired that an adjacent unit render special assistance to another in the

attack, this assistance should be clearly stated. During the progress of combat and especially when reserves are committed to action appropriate changes in zones of action are made.

To take advantage of favorable routes of approach units may move temporarily into adjacent zones. Such movement must not interfere with the action of adjacent units or result in a dangerous massing of troops. The emplacement and movement of artillery and other supporting weapons in zones of action adjacent to the zone of the units they support are permissible, but must be carefully coordinated. (See par. 538.)

The battalion is ordinarily the smallest unit which is assigned a zone of action. Smaller units are usually assigned directions and objectives.

When lateral boundaries are not clearly defined they are supplemented by assigning compass directions of attack. This is particularly important in small units.

When tactical groupings are separated initially by wide intervals and the direction of their subsequent maneuvers cannot be foreseen, designation of a boundary between them may be withheld until a later phase of the action. In such situations it frequently will be necessary to establish a limiting line between them for coordination and control of their supporting fires.

■ 494. A *line of departure* usually is designated from which the attacking troops are launched at the prescribed hour or separate lines of departure and hours are assigned to the several attacking units. The purpose of the line of departure is to coordinate the advance of the attack echelon so that its elements will strike the enemy in the order and at the time desired. This line should be recognized easily on the ground and should be approximately perpendicular to the direction of attack.

■ 495. The *time of attack* is the hour at which the attack is to be launched. If a line of departure is prescribed, it is the hour at which the line is to be crossed by the leading elements of the attack. It is determined by the time required for commanders to make the necessary reconnaissance, prepare plans, and issue orders; for the cooperating arms to coordinate their plans; and for the attack echelon to organize its attack and move to position.

The secondary attack may precede the main attack to force the enemy to commit the greatest possible portion of his forces against that attack, or the main and secondary attacks may be launched simultaneously.

*Unity of effort* is promoted by assigning subordinate units objectives which insure mutual support and by prescribing where and in what direction subordinate units are to make their main effort. The combat action and direction of attack taken by subordinate commanders must be such as to build up the main effort of the tactical grouping in accordance with the intentions of the superior commander.

The commander must endeavor constantly to prevent the attack from breaking up into a series of uncoordinated combats.

■ 496. The *degree of surprise* attained is dependent in a large measure on the coordination and timing of the measures taken to deceive the enemy. Ruses, demonstrations, feints, and other measures for deception executed at the wrong time and place will be obvious to an alert enemy and will warn him of the impending attack. Superior mobility and speed of execution may be determining factors in achieving surprise.

■ 497. The best guarantee for success in the attack is effective cooperation between the troops in the attack echelon, the supporting artillery, and any supporting combat aviation. The superior commander coordinates the fire support of his artillery with the plan of maneuver of the attacking troops. Acting through the commander of supporting combat aviation he coordinates the fire support of the combat aviation with the fire of his artillery, his plan of maneuver, and his plan of employment of mechanized units.

■ 498. To assure close cooperation with the attacking troops, *artillery units* assigned to direct support of designated units maintain constant connection with supported units through common command posts or by liaison agents. Ordinarily an artillery battalion is placed in direct support of an infantry regiment or a cavalry brigade. Cooperation is facilitated by habitually associating the same units on the march and in combat.

■ 499. The command post of the division artillery is at the division command post. The same rule applies in the case

of the senior artillery commander of a smaller force of combined arms.

Subordinate artillery commanders establish their command posts where they can exercise tactical command and fire direction most effectively. If an artillery commander locates his command post at a place other than the command post of the supported unit, he establishes liaison and maintains signal communication with the commander of the supported unit.

■ 500. The commander of the supported unit informs the supporting artillery commander of the situation, his plan of attack, and the artillery support desired. The supporting artillery commander informs the commander of the unit of the number and general location of his batteries, the present location of the artillery observation posts and those that must be seized during the advance, the terrain which the artillery commands with observation and fire, and the means by which the artillery can most effectively support the attack. (See par. 528.)

Based on this exchange of information, the associated commanders arrange the plan of fire support to be given by the artillery during the attack.

The artillery commander must comply with the requests of the supported unit commander to the limit of his capabilities, subject only to orders received from higher authority. If he receives a fire mission which conflicts with the needs of the supported troops, he reports the situation to the commander ordering the mission and then complies with the resulting decision. If the urgency of the situation precludes this report, the artillery commander acts on his own initiative in accordance with his knowledge of the situation, reporting his action to his superior at the first opportunity.

As a rule a liaison section is assigned to each infantry battalion or cavalry regiment. A mutual obligation rests upon the commanders of supported and supporting units that liaison once established is maintained. It is essential that the supporting artillery know at all times the location of the leading elements of the attack echelon and be kept informed of the plans of the supported unit.

■ 501. The fire of other supporting weapons is coordinated with that of the artillery. The fire of these weapons supple-

ments the artillery fire of direct support chiefly by engaging targets in the immediate foreground whose neutralization by artillery might endanger the attack echelon, and targets within range on which artillery fire cannot be placed.

■ 502. The action of *combat aviation* in support of ground troops is closely coordinated with the plan of attack. Its first objectives are those hostile elements, the destruction or neutralization of which will contribute most toward a successful attack. During battle, combat aviation is especially useful as a means, immediately available to a commander, to exploit a success, to correct an adverse situation, to attack reserves or reinforcements or to support ground troops in overcoming unexpected resistance. *Its employment to complement the fire of artillery in a crisis or in fast moving situations is habitual, especially in attacks by tanks and armored forces.*

■ 503. To assure effective cooperation, supporting combat aviation should operate from landing fields within short flying time of the zone of action and must be included in the air-ground radio net and wire net of supported units. To facilitate coordination of its effort with that of the ground troops, a liaison officer from supporting combat aviation should be with the supported unit. Supported ground troops must keep supporting combat aviation informed of the location of leading elements and of plans of maneuver and fire. It is especially important that adequate means of identification of friendly ground troops be carefully arranged and coordinated.

■ 504. An integration of the attack into a unified whole requires complete coordination and cooperation, prior to and during the operation, between supporting tanks, artillery, and combat aviation. (See chs. 2 and 16.)

■ 505. Because of the difficulty of establishing and maintaining effective chemical concentrations in mobile operations, use by the attacker of *chemical agents* other than smoke is limited. Smoke must be carefully employed in respect to both time and space and must be closely coordinated with other supporting fires and with the action of tanks and supporting aviation. Under favorable conditions of wind and weather, smoke is used to blind hostile observation posts, anti-tank guns and infantry supporting weapons, to conceal the

approach of the attack echelon, and to protect the flanks of the attack. It is especially useful during short periods when troops must cross exposed ground.

■ 506. As soon as the commander has made his decision, he completes his plan of attack and issues his *attack order*, wherein he prescribes the necessary coordination for the action. (See FM 101-5.)

■ 507. When conditions limit the ability of the commander to exercise a timely and direct influence on the action, the initiative of subordinates must be relied upon to a great extent. The commander issues less detailed orders to those tactical groupings over whose action he can not exercise a direct influence and attaches to them the means necessary to accomplish their tasks. He remains with and personally directs the action of the troops whose mission is of decisive importance to the action. This method of conducting an operation is most prevalent in pursuits, in opening phases of a meeting engagement, during crises of battle, and in envelopments in which the main and secondary attacks are separated by wide intervals. The greatest degree of coordination possible is prescribed initially; complete coordination is accomplished as soon as the course of action permits. (See par. 125.)

■ 508. Coordination is assured by *command and staff visits* to subordinates to see that orders are understood and are being carried out.

## SECTION II

### ATTACK IN WAR OF MOVEMENT

■ 509. A *meeting engagement* is a collision between two opposing forces more or less unprepared for battle. Ordinarily, the collision is caused by uncertainty or obscurity in the situation. This aspect is often present in the operations of small units and in situations where the means of reconnaissance have failed or are unable to operate.

A meeting engagement may ensue when each opponent is cognizant of the other, yet both decide to attack without delay to retain some tactical advantage, to gain a decisive terrain feature, or from a feeling of superiority. It may occur when one opponent decides to deploy hastily for defense while the other attacks before this defense can be organized.

■ 510. In open warfare, *immediate orders* and *rapid action* are essential. By the prompt exercise of initiative, endeavor must be made to deprive the enemy of his freedom of action and prevent the coordinated employment of his forces. A great advantage accrues to the force which first succeeds in making effective preparations. Action cannot be delayed awaiting the results of detailed reconnaissances. Prompt estimate of the situation, quick decision, and prompt attack are essential to success.

The tactical situation which develops on first contact has a strong influence on the subsequent course of action. Commanders must be well forward when the enemy is engaged; otherwise, units may be employed improperly.

Opportunities for decisive action must be exploited immediately. The rapidity of modern combat frequently makes the time element decisive.

■ 511. Open warfare requires the widest possible exercise of *initiative* by commanders of all echelons in the execution of the general mission assigned to the command.

Information gained by reconnaissance agencies during the advance affords a basis for the commander's preliminary disposition, and may enable him to determine the general line of engagement with the enemy and the plan of attack. As a rule, however, the enemy's intentions will remain obscure and will seldom be clarified until after the initial engagement.

■ 512. As soon as the prospect of an engagement becomes apparent, the superior commander initiates plans for the operation and disposes his command to facilitate its rapid entry into action. One or more advance message centers are established to facilitate prompt signal communication.

Early and rapid transmission of orders to elements of the main body is essential to an orderly and timely employment of the command, and may be vital, particularly in columns of high mobility.

■ 513. Initial orders are ordinarily issued in fragmentary form to the various elements of the command. The sequence in which orders are issued is based upon the priority of, and the time required for, execution.

■ 514. When timely information of the enemy is lacking, subordinate commanders are relied upon to exercise their initiative and make important decisions in consonance with

the general mission and the intentions of the superior commander. Without delay, the superior commander coordinates the action which his subordinates have initiated. (See par. 507.)

■ 515. Employment of the *advance guard* is the commander's first problem and is the basis for the employment of the remainder of the main body. When contact is imminent or when entering the zone of effective hostile artillery fire the advance guard moves forward on a broad front. When hostile resistance is encountered, the advance guard must secure possession of terrain that will afford good observation for the artillery and other supporting weapons, and gain the time and space required for the development and deployment of the main body. These missions require aggressive action against the enemy's leading troops. Unfavorable terrain or an encounter with superior hostile forces may make a temporary defense or a limited retirement advisable to preserve the commander's freedom of action. However, all advance-guard actions are characterized by speed and aggressiveness, by broad fronts, and by small or no reserves.

The advance guard performs its mission most effectively when, after securing possession of the essential terrain features, it is disposed to protect the deployment of the main body. Its artillery deploys on a broad front, opens long-range fire on enemy columns forcing them to an early deployment, and interdicts the principal routes of approach.

The advance guard is strongly reinforced by artillery from the main body and by supporting combat aviation. It is reinforced with other elements of the main body only when the situation *clearly* demands it.

■ 516. *Cavalry*, after withdrawal from the front of advance-guard infantry, may be employed on the flanks to screen our own dispositions, to execute reconnaissance or harassing action against the hostile flanks and rear, or may be held in reserve.

■ 517. The speed of modern offensive operations demands that supporting artillery be prepared to react immediately with fire when opportune targets are presented. To do this artillery observation and positions must be as far forward as possible.

Early entry into action of the bulk of the artillery with the

main body is essential to protect the development, to give support and cohesion to the advance-guard action, and to gain an early superiority over the hostile artillery.

It may be necessary for a portion of the artillery to occupy temporary firing positions to insure that troops do not come under hostile fire without artillery protection.

■ 518. The artillery preferably is deployed initially so that it can protect the development and support the attack from the same position areas. When initial positions are too distant, the artillery in direct support must so displace forward as to assure close support of the attack echelon.

While other troops are organizing their attack, the artillery completes preparation of firing data and arrangements for supporting the attack. Observation aviation is placed at the disposal of the artillery commander in order that the hostile artillery and large troop assemblies may be located and fire conducted on important targets at long range.

■ 519. In accordance with his estimate of the situation, the commander develops the main body and organizes a coordinated attack, or attacks directly from march columns with a part of his command and organizes a more coordinated attack with the remainder, or attacks with his whole force from march columns as units become available. (See pars. 485-487, 492, and 507.)

■ 520. Regardless of whether the attack is launched from assembly positions or directly from march columns, the method of approach to the hostile position is the same. Each battalion of the attack echelon moves to the most advanced position in which it can make its final preparations under cover from hostile small-arms fire.

The commander of each attack unit directs its advance in the assigned zone of action so as to be able to cross the line of departure at the prescribed hour. Each attack unit reconnoiters its zone of action and supports the reconnaissance elements with its supporting weapons. To keep troops in hand prior to contact with the hostile forces, a base unit is usually designated on which the other units regulate their advance from one terrain line to the next. Terrain features which afford extended observation, or which are otherwise of tactical importance, are the objectives of each bound.

■ 521. Whether an offensive battle is the result of a meeting engagement or is based on the attack of an organized position, the *conduct of the attack* from the time the enemy is engaged until he is defeated is essentially the same. What difference there is exists in the coordination, power, and speed developed in the opening phases. (See pars. 535-572.)

### SECTION III

## ATTACK OF AN ORGANIZED POSITION

### PRELIMINARY OPERATIONS

■ 522. Ordinarily the defender will attempt to screen his main position and deceive the attacker regarding his dispositions by the employment of covering forces. A thorough reconnaissance of the hostile position and its foreground is of primary importance. This reconnaissance seeks to determine the location, depth, and extension of the hostile position, the hostile occupation of the position, contaminated areas, the location of the hostile artillery, and natural and artificial tank obstacles. It involves a thorough study of the map and air photographs of the enemy's combat zone, and the use of available air and ground reconnaissance agencies.

■ 523. If air reconnaissance and advance detachments fail to establish definitely the main hostile position, the leading troops are reinforced strongly by artillery, combat aviation, other supporting weapons, and, if necessary, by tanks. Rifle reinforcements are held to a minimum. The reinforced leading troops execute a *reconnaissance in force* against critical points in the enemy's outpost zone to drive in the enemy's covering forces and determine the hostile main position. Their mission is to seize the terrain which will permit the proper deployment of the command and permit observation of the hostile battle position.

When the leading troops finally encounter a well-organized system of defensive fires of hostile artillery and other supporting weapons, it may be taken as a reliable indication that the hostile battle position has been reached. The leading troops establish themselves on the critical points and cover the deployment of the mass of the artillery.

■ 524. During these preliminary operations, cavalry and other troops seek to locate the flanks of the hostile position. The

leading elements are protected from hostile counterattack by strong supporting fires and by the presence of other units moved to concealed positions within supporting distance. The remainder of the command is held in readiness beyond the range of effective hostile artillery fire. Necessary measures are taken to protect it against air attack and attack by mechanized units.

■ 525. Reconnaissance is continued to obtain information as a basis for the conduct of the attack. This reconnaissance provides more detailed information for the assignment of objectives and as a basis for the plan of fire of the artillery and the other supporting weapons.

Reconnaissance of the terrain must determine the most favorable routes of approach to the hostile position, the nature and strength of obstacles, and the possibilities for employment of mechanized units.

Air photographs of the hostile main position are distributed to subordinate commanders.

The terrain over which the attack must pass is studied on the ground and from air photographs to determine the terrain compartments which the defender has organized for defense and can cover with defensive fires, and the areas in which the attacker can advance best by flanking fire and maneuver.

Artillery conducts reconnaissance to determine the possibilities of artillery observation and fire, and the location of its firing positions and the routes of approach thereto.

■ 526. Determination of the weak points in the enemy dispositions is of vital importance. By fire of artillery and other supporting weapons delivered from different directions, and by feints and raids, effort is made to ascertain the enemy's dispositions and his plan of defensive fires.

#### PREPARATIONS FOR ATTACK

■ 527. Based on the estimate of the situation, the main attack is made either as an envelopment or a penetration. A carefully coordinated attack is required. Orders are issued for the preparations for the attack and for the measures for secrecy and deception to be adopted.

Preparations for the attack include the completion of the signal communication system, organization of the command

for combat, provision for ammunition supply, and the regulation and coordination of supporting fires of all arms.

Special consideration is given during the preparation to measures designed to insure the continuity of the attack. Adequate provision is made for placing in readiness the necessary material and engineer units to destroy obstacles, assist the advance of tanks and heavy weapons, and for the construction of roads connecting our own system with that of the enemy.

All preparations for the attack are completed as far as practicable before the occupation of final assembly positions. Preparatory measures likely to betray the imminence of the attack are carried out secretly or are deferred as long as possible.

Restrictions are imposed on those activities within our front lines and in rear areas, which may disclose, to hostile reconnaissance, operations for the attack. Strict surveillance is imposed on the use of radio communication.

■ 528. The plan of attack consists of the *plan of maneuver* and *plan of fire*. The attack unit, artillery, and supporting combat aviation commanders make detailed arrangements for coordinating the action of their units to carry out the common mission. (See pars. 498-500.)

In coordinating their plans, it is essential that the supported and supporting commanders carefully study the successive compartments of terrain in which hostile resistance may be encountered and identify the successive intermediate objectives of the attack.

An agreement is reached relative to the known targets to be taken under fire respectively by the artillery, by combat aviation, and by the other supporting weapons. Areas to be kept under surveillance for targets appearing after the attack is launched, especially those targets in adjacent zones which are dangerous to the advance, are agreed upon. Associated commanders must arrange for mutual reinforcement of fire.

■ 529. Attack unit commanders must receive early information of their *assembly positions* and *zones of action* in order that they may make their own reconnaissances and formulate plans.

Attack units usually move at night into final assembly positions, preparatory to an attack the next morning. Move-

ment of units into their assembly positions by day generally is practicable only when visibility is poor or when overwhelming artillery and combat aviation support is available.

When tanks are employed, their assembly positions and routes of approach are reconnoitered, marked, and prepared.

■ 530. The first *mission of the artillery* is to protect the movement into and the assembly positions of attack units. During this phase, hostile artillery and observation posts constitute its principal targets. Registration fires should be conducted so as not to disclose the impending attack. The artillery gives special consideration to those measures which will attain surprise in the opening of effective fire, gain fire superiority over the hostile artillery, and concentrate the mass of its fire on the decisive objectives.

■ 531. *Artillery positions* are selected so that fire can be concentrated on the objectives of the attack. Deflade, concealment from air reconnaissance, and proximity to observation are sought. Sufficient time is allowed for the preparation of firing data, establishment of signal communication, and organization of the artillery ammunition supply.

Artillery usually moves into position by echelon. The movement is frequently wholly or partly executed at night. Units assigned to positions screened from hostile air reconnaissance are moved first. The movement of artillery is regulated to avoid interfering with the attack echelon in its occupation of final assembly positions. Long-range artillery is placed well forward to be able to take under fire the most distant echelons of the defender's light and medium artillery.

■ 532. During the advance of the attack echelon from assembly positions, the hostile artillery constitutes the principal target of our artillery fire. Superiority over the hostile artillery is indispensable for the success of the attack. It rarely can be attained after the attack is launched.

Located hostile batteries are silenced early in the artillery action. Their neutralization then is maintained by a portion of the artillery in order that the mass may be employed on other missions until again required for counterbattery fire as new hostile batteries are located. If counterbattery fire is unable to gain superiority over the hostile artillery, neutralization of the hostile observation just prior to the attack is of great importance.

■ 533. Artillery fires prior to the hour of attack may be limited to normal fires already in progress, or the attack may be preceded by an *artillery preparation*.

The duration of the preparation varies with the situation. A prolonged preparation is destructive of surprise and gives the enemy time to take countermeasures. The length of the preparation is influenced also by the extent to which tanks are to participate in the attack and the role assigned to them. The duration of the artillery preparation may vary from 15 minutes to several hours.

The nature of the artillery preparation depends upon its mission. Concentration of effect is greatly favored by dividing the preparation into *phases*.

The object of the *first phase* of the preparation is to neutralize the defender's artillery, destroy the most important hostile agencies of command and fire control, isolate the defender's forces from the rear, disrupt assembled hostile mechanized forces and protect our troops from the enemy's counterpreparation fires. Artillery fire of the first phase comprises counterbattery fire; destruction fire on command posts, observation posts, and signal communication installations; interdiction and destruction fire on enemy routes of communication; destruction fire on mine fields and hostile obstacles; and concentrations on the hostile defense areas and assembled mechanized units.

In the *subsequent phase* of the preparation, sufficient artillery continues counterbattery fire to maintain neutralization of the hostile artillery. The fire of the mass of the remaining artillery is concentrated on the hostile defense areas.

■ 534. During the preparation, other supporting weapons fire on sensitive points in the advanced zone of resistance. Supporting bombardment aviation is concentrated against hostile artillery, signal communication centers, and reserves, with particular attention to mechanized units which cannot be covered effectively by artillery. During the last few minutes of the preparation bombardment aviation is concentrated upon the hostile defense areas.

#### CONDUCT OF THE ATTACK

■ 535. The attack is characterized by the positive action of fire and movement, combined and controlled to create a preponderance of force in the decisive direction.

■ 536. The attacking echelon advances from its final assembly positions so as to cross the line of departure at the prescribed time. Any mass formation of units runs grave risks of incurring heavy losses from hostile counterpreparation fires and air attack. The leading echelon is therefore thin initially; its fire power is gradually built up as the enemy discloses his plan of defense.

When *fire superiority* has been gained, the leading echelon closes to assaulting distance.

■ 537. Superiority of fire rests chiefly upon the mutual support of units in the attacking echelon, and the coordination of their action with the fire support of artillery, bombardment aviation and supporting tanks. It depends not only on volume of fire but also on its direction and accuracy.

Fire effect is increased by enfilade action. Flanking or oblique fire is especially effective when frontal fire is delivered simultaneously against the same objective. A convergent fire forces the enemy to defend himself against attack from several directions and creates a powerful moral as well as material effect.

Units seek to gain flanking fire by enveloping action. Flanking fire is also secured through the lateral echelonment of supporting weapons with respect to the units they support. Heavy machine guns, from positions in adjacent zones of action, deliver oblique fire over the troops in their front and protect the flanks of troops in the attack echelon. Light machine guns of rifle units follow the leading elements closely in order to take advantage of and deliver flanking fire through the gaps along the front. Units which have succeeded in gaining advanced positions deliver flanking fire across the front of adjacent rearward units.

Lateral echelonment of artillery for purposes of flanking fire increases the difficulties of fire control and of liaison between the artillery and supported units. The fire of supporting artillery is more reliable and effective when its positions and observation posts are in the zone of action of the supported unit.

■ 538. The attacking echelon advances to assaulting distance of the hostile position under its own and supporting fires. Until the main hostile resistance is broken, attack units advance by bounds to successive terrain lines on each

of which the fire support for the next bound is organized. Fire and movement are alternated in such manner that an attack unit, whose advance is made possible by the combined fire of adjacent and supporting units, moves forward to an advanced position and by its fire from that position assists the advance of the adjacent units.

■ 539. Troops transported by air may be employed to seize, hold, or destroy objectives which contribute directly to the success of the main attack.

■ 540. Artillery and other supporting weapons insure continuity of support by displacing forward in groups (by echelon), while the bulk remains in position and maintains fire. Fire is lifted successively to more distant targets as the attacking echelon becomes endangered by it. When supporting artillery, heavy machine-gun, and mortar fires are lifted from the hostile position to permit the attacking echelon to close with the enemy, the loss of this support must be compensated for by the increased fire of the lighter weapons and by the cooperative action of tanks. (See ch. 16.)

■ 541. Artillery supports the attack through the depth of the hostile position by successive concentrations in accordance with the requests of the supported commanders. Concentrations of artillery fire are regulated to bring the greatest possible volume of fire on objectives of decisive importance at the critical moments of the attack. Attack units take immediate advantage of artillery fire effect to gain ground to the front. The artillery is prepared for early movement forward to maintain close support as the attack progresses. Essential fire missions of units being displaced are distributed to units in position.

■ 542. Artillery must employ all means at its disposal (observers, liaison sections, airplanes, wire and radio communication to attack units) to obtain exact information of the location of the front line. The attacking units must cooperate by employing all means of transmitting information to the artillery (display of panels, pyrotechnics, and various other means of signal communication). When uncertain as to the location of the attack echelon, direct support artillery takes immediate steps to establish close contacts with those elements.

■ 543. During the attack, the supporting fires are concentrated against the fronts where the attacking echelon is making the greatest progress. Artillery fires are supplemented by fires of other supporting weapons. The fire of these weapons is used to increase the density of the artillery fire or is placed on those areas and targets which can not be effectively engaged by the artillery. When the attack echelon arrives close to the hostile position, the fire of all artillery, including that in general support, is concentrated on rearward hostile defense areas.

■ 544. The primary purpose of close supporting fire is to prevent the enemy from manning his defensive works in time to meet the assault. Its progression to successive objectives is arranged between supporting and supported commanders. It may be regulated by a time schedule based upon the probable rate of advance of the attacking troops, by signal given by assaulting troops, or by a time schedule based upon a desirable duration of the fire.

Other fire is placed on critical points in the hostile position to protect the attack echelon from hostile long-range and flanking fires and from counterattack. It is lifted to correspond with the advance of the attacking echelon.

■ 545. Each attack unit uses the close supporting fires of its artillery and other supporting weapons to close with the enemy and to push on to its successive objectives without deviating from the prescribed general direction of attack.

■ 546. Combat aviation supports the attack through the depth of the hostile position. Commanders of the supporting aviation thoroughly familiarize themselves with the terrain in the zone of the attack. Supporting combat aviation is concentrated over that part of the hostile front where the attack seeks decisive results. Its operations are coordinated to provide the maximum support at the time the ground forces launch the attack.

■ 547. The attack must not permit its advance to be long arrested by hostile chemical concentrations. Contaminated terrain which cannot be avoided is posted and passed with the protection of gas masks.

■ 548. Whether the main attack is based upon an envelopment or a penetration, the battle generally develops into local

conflicts along two opposing fronts. During the course of battle the combat action of units may undergo a change as between envelopment and penetration. A force that has successfully enveloped the enemy's flank may have to make a frontal attack to defeat a hostile reserve or may find a favorable opportunity to attack the hostile resistance in flank. In a penetration, once minor resistances have been overrun, the outflanking action of small units is the most effective means of reducing the stronger hostile defense areas.

■ 549. An attack seldom is executed exactly as planned. As long as the enemy has any freedom of action, unexpected difficulties are encountered which culminate in a crisis. The approach of this critical phase of the attack must be recognized by the commander so that timely measures can be taken to shape the course of action to secure a favorable outcome or to prevent a reverse. (See pars. 476-482.)

■ 550. When the attacking echelon approaches assaulting distance, observation aviation is employed to observe especially the situation of our own and the hostile advanced elements. Observers on this mission report to the division commander and the commanders of infantry units the points where the attack is stopped and those where penetrations have been effected, hostile counterattacks, and other features of the situation of our own and the hostile advanced elements. Other observers continue to inform higher commanders concerning developments farther in rear of the battle front such as shifting of hostile reserves, arrival of reinforcements, train movements, and the like. From these reports and other information, commanders direct the movements of reserves toward those portions of the hostile front that offer the greatest prospects for decisive success and to support the attacking troops in repulse of counterattacks. Combat aviation is effectively employed to attack enemy reserves and counterattacking forces.

■ 551. In an attack of a stabilized front, the approach has already been effected and the attack opens with a coordinated assault. The hour of the assault is fixed by the commander of the whole front from which the assault is to be launched. The exact day and hour is kept secret until the latest practicable moment.

■ 552. On a stabilized front, the period during which the opposing forces have been in contact makes available more detailed information of the enemy's defensive dispositions. The completeness of information will depend upon the length of time the front has been stabilized and the efficiency of intelligence measures. Available information is augmented by continuous reconnaissance. Reconnaissance throughout preparation for the attack is conducted in such manner that the appearance of normal activity is maintained. Information is disseminated in the form of intelligence summaries, maps, and air photographs.

#### THE ASSAULT

■ 553. Against a strong resistance and well-organized defense, the superior commander will prepare the assault of the first hostile organized line of resistance by concentrating the firepower of all supporting weapons, including combat aviation, to neutralize the enemy and wear down his power of resistance before launching the assault. After the first onrush, a series of local assaults delivered by units of varying strength on their own initiative continues the action. Each unit delivers its assault at the earliest moment that promises success.

The commander of the unit will have arranged to deliver the assault on a time schedule, or will notify the supporting weapons, by a prearranged signal, that he is about to assault. The intensity of supporting fires is increased. Under cover of the supporting fire, the assault unit advances close to its objective. When the supporting fires are lifted from the objective the assault unit overruns the hostile resistance in a single rush. Any delay in launching the assault after the fires lift allows the enemy to man his defenses.

#### CONTINUATION OF THE ATTACK

■ 554. After the assault of an organized position the attack often breaks up into a series of separate combats which are continued throughout the depth of the hostile position. These combats are directed by subordinate commanders within their zones of action and are supported by all the means at their disposal. The first task is to capture assigned objectives. Resistances are reduced by fire or are outflanked.

The utmost importance attaches to maintaining the continuity and direction of the attack by the timely movement

and employment of reserves and by the timely displacement of the artillery and other supporting weapons. Reserves are disposed behind points where the greatest progress is being made, to protect the flanks of the leading units and support them in the repulse of counterattacks. Artillery and air observers search for probable assembly areas of hostile reserves so that enemy preparation for counterattack may be broken up by artillery fire and air attack. If the attack is unable to make further progress, the captured terrain is organized for defense and held until the attack can be continued.

■ 555. The enemy's reaction following the successful assault of his main line of resistance, road conditions, and the possibility of maintaining ammunition supply determine when and in what strength the artillery will be moved into advanced positions.

Artillery executes its missions with the fewest possible changes of position. Frequent changes of position reduce the volume of fire support. The occupation of new positions and renewal of fire require considerable time. Nevertheless, change of position should unhesitatingly be made when fire effect or deficiency in liaison with the attacking echelon requires it. Changes of position generally are effected by echelon after timely reconnaissance of advanced position.

Artillery promptly fires upon enemy troop assemblies, troops forming for counterattack, and on any rearward position on which the enemy attempts to reconstitute his defense.

■ 556. If the tide of battle turns against the enemy, he may endeavor to disengage his forces and renew the defense on a rearward position or he may fight a delaying action until battle can be renewed under conditions more favorable to him. Ordinarily, the enemy will strive to hold out until nightfall and effect his withdrawal under cover of darkness.

Frequently the enemy will disclose his intentions to withdraw. Attacking troops must exercise great vigilance in observing the conduct of the enemy in their front, press their attack with energy and maintain close contact with him. Observation aviation searches the rear areas for indications of retrograde movements of artillery and trains.

■ 557. If the enemy succeeds in withdrawing his major forces from action, the commander intensifies reconnaissance to obtain the necessary information on which to decide what

line of action to follow. Aggressive action may prevent the enemy from reconstituting his defense on a rearward position. If the enemy succeeds in occupying a new position during darkness, a renewal of the attack in force must be delayed until daylight.

It may be of great advantage to regroup the attack forces during the advance to the new position and launch the main attack on another part of the front. Effort is made to exploit the moral ascendancy by a quick and powerful blow before the enemy can reconstitute his defense. The action of tanks or armored forces and combat aviation at this time may be decisive.

■ 558. If the enemy is fighting a delaying action on an extended front, the objective ordinarily will be attained more quickly by concentrating on a decisive part of the front and attacking with energy and dispatch. An attack pushed deeply and energetically through the hostile front will force the enemy to an early evacuation of the whole front.

■ 559. In case of a break-through, armored units penetrate deeply into the hostile position and attack the enemy's reserves, artillery, and command and signal communication centers. The gap is widened by attacking its flanks. Other mobile forces are sent through the gap to exploit the advantage gained and to attack the enemy in rear and prevent his escape. The maximum efforts of combat aviation are concentrated on supporting and cooperating with the forces exploiting the break-through.

■ 560. When the attack does not reach its objective or does not break through the hostile position during the day, foot troops intrench themselves at the points reached. The night is utilized to extend the advance. Strong patrols with machine guns are sent forward to occupy advanced positions. The foot troops advance and intrench in a new position under the protection of these patrols. Several advances of this character may bring the troops within assaulting distance of the hostile position. These night advances must be coordinated with the artillery and supporting combat aviation.

#### RELIEFS TO CONTINUE THE ATTACK

■ 561. In offensive combat, a relief may be necessary to continue the momentum of the attack with fresh or more ex-

perienced troops; to change the direction of the attack, or to extend an envelopment; or to initiate a strong offensive on a front where stabilization has existed.

■ 562. When a relief is necessary, warning orders are issued by each commander (higher commander, relieving unit, and unit to be relieved) to each of his subordinate units. Warning orders include: approximate hour the movement for the relief is to begin; zones in which relieving units are to operate; and the restrictions imposed upon reconnaissance parties as to size, routes, and hours of operation.

■ 563. Personal reconnaissance by the commander and staff of the relieving unit and prior conference with the commander and staff of the relieved unit are highly desirable. When neither is possible, relieving units move forward to attack without delay, reconnoitering as they go. As they move forward, commanders make every effort to locate commanders of units to be relieved.

■ 564. A plan is formulated and orders are issued covering the movement of relieving units. Fundamentally the operation is the same as the development of a command for combat. In the preparation of the plan, restrictions imposed by higher authority because of other traffic in the zone of advance to relief, the greater road spaces that may be required because of increased distances between units, the road net, and practicability of cross-country movement, must be considered. The plan must be flexible as to times and routes of movement. The size of the unit involved and the speed with which the relief must be conducted will govern the thoroughness with which the details of the plan are prepared.

■ 565. In accordance with the plan of the higher commander, commanders and staffs of both the relieving and relieved units arrange and agree upon such details as guides, use of roads, fire support to be furnished by the relieved unit, security measures which will be provided for the incoming troops by the unit to be relieved, transfer of the existing signal communication system, administrative matters, and the time command passes to the relieving unit.

■ 566. Units to be relieved furnish guides. Guides meet the relieving unit before it enters the area and conduct it to assembly positions. Whenever possible, guides are furnished for units down to and including the platoon.

■ 567. The plans for executing the relief must be in harmony with the plans for continuing the attack.

When the relief is executed in darkness, troops relieved are withdrawn promptly from the zone of action before the attack is continued. Artillery of the relieved unit (and frequently other supporting weapons) may be held in position to support the attack.

When the relief is executed in daylight, troops relieved or passed through remain in position and continue the fire support of the new unit until their fires are masked and until the attack has progressed far enough for the relieved troops to be assembled and reorganized without undue casualties.

■ 568. If the exact location of forward elements to be relieved is known, and if relief is effected at night, the line of departure for the attack is the line held by the forward elements. When the exact location of the most advanced elements of unit to be relieved is unknown, the line of departure must not be forward of the line held by most advanced elements whose location is known. In daylight and terrain permitting, a line of departure between the forward elements to be relieved and a covered position close in their rear may be better than a line coinciding with the front-line elements.

■ 569. To disclose the fact that a relief is in progress invites disaster—a heavy bombardment by air and artillery, a counterattack, or both, at a time when congestion and traffic circulation are doubled.

■ 570. In reliefs on a scale large enough to require more than a single night, troops, animals, and vehicles of the relieving unit are concealed during periods of visibility. The relief is carried out by echelon. To prevent the discovery of the relief through the capture of prisoners by the enemy during an intervening day or night, front-line elements are relieved during the last night preceding the resumption of the attack.

When the relief is made in daylight, woods, fog, and defilade are utilized in the approach. Smoke is placed on hostile observation posts and hostile forward elements. Mobility, ruses, feints, and demonstrations are exploited.

■ 571. During the course of the relief, artillery maintains its normal fires, but is prepared to execute counterbattery and protective fires along the front of the relief in the event of a counterpreparation or of attack by the enemy.

■ 572. The principal task involved in a passage of lines is the preparation for continuing the attack. Therefore, the incoming commander must assume command of the zone of action before his troops reach their attack positions.

#### SECTION IV

### ATTACK FROM THE DEFENSIVE

#### PLANNED DEFENSIVE-OFFENSIVE

■ 573. A commander with an offensive mission may decide to assume the defensive initially because of temporary combat inferiority in numbers or dispositions, or to create a situation which will place the enemy at a tactical disadvantage and offer opportunity for a decisive counteroffensive. In either case, an early adoption of the offensive to attain the objective is contemplated. By inducing the enemy to attack first, the commander hopes to fix and exhaust him and then, when he is disorganized, to launch the counteroffensive.

This type of action demands the highest type of leadership and tactical skill and troops with a high order of training. The major problem for the commander lies in timing the attack.

■ 574. The selection, occupation, and organization of the defensive position conform to the general doctrines discussed in sections I and II, chapter 10, except that organization of the ground is not as complete as is required for a protracted defense and a larger proportion of the close-combat elements of the command are assembled concealed in a position favoring the execution of the contemplated counteroffensive.

■ 575. Conduct of the defense conforms to the doctrine discussed in section II, chapter 10.

As soon as the purpose of the initial defense has been accomplished, the counteroffensive is launched. Thereafter, the conduct of the action is that of the attack.

## THE COUNTEROFFENSIVE

■ 576. A defending force frequently has an opportunity to adopt the offensive. When a general counterattack launched by the defender throws the attacker back following an apparently successful advance, or when a hostile attack breaks down in front of the main line of resistance, the enemy seldom will be able to withstand a determined counteroffensive. The enemy artillery fire still may be superior but his attacking echelon will be disorganized and signal communication in his forward area will be disrupted. If the defender seizes the initiative and passes to an offensive before the attacker can recover from his disorganization and can properly dispose his reserves, results often are decisive. The defense must be prepared to pass to the offensive and exploit the results of successful defensive action.

■ 577. The general doctrines governing the preparation for and conduct of an attack are applicable to the counteroffensive.

## SECTION V

## PURSUIT

■ 578. The pursuit is launched when the enemy is no longer able to maintain his position and endeavors to escape by retreat. A commander recognizes success by the continued advance of his troops in a decisive direction and the capture of critical objectives; by the number and morale of captured prisoners; by the number of abandoned weapons; by the numbers of hostile dead; by the diminution of hostile artillery fire; by the relaxation or cessation of hostile countermeasures; and from reports that the enemy is withdrawing.

■ 579. When a commander recognizes that the enemy is having difficulty in maintaining his position, he utilizes all means to maintain the continuity of the attack and exert a relentless pressure on the defeated enemy.

Effective pursuit requires leadership and exercise of initiative to the highest degree in all echelons of command. All commanders in the attack echelon spur on their troops and clinch the advantage with their reserves. Pursuit of a defeated enemy is pushed to the utmost limit of endurance of troops, animals, and vehicles. No opportunity is given him to reorganize his forces and reconstitute his defense.

■ 580. The object of the pursuit is the annihilation of the hostile forces. This can seldom be accomplished by a straight pushing back of the hostile forces on their lines of communication. *Direct pressure* against the retreating forces must be combined with an *enveloping or encircling maneuver* to place troops across the enemy's lines of retreat. *Encirclement of both flanks* of the retreating forces or of their separate elements is attempted wherever conditions permit.

By the coordinated employment of every available agency of destruction and terrorization, the shaken morale of the defeated enemy is converted into panic. The incipient dissolution of his organization is transformed into rout.

■ 581. In anticipation of the time for launching the pursuit the commander causes preparatory measures to be taken. These measures include necessary plans and orders in all echelons. Reserves are regrouped. Artillery and other necessary units are attached to the direct pressure forces for the pursuit. Distant objectives are assigned to the principal tactical groupings. Missions are assigned to combat aviation and to the artillery in general support to obstruct movement on hostile avenues of withdrawal. Preparations are made for launching one or more forces of *great mobility* in encircling maneuvers to strike the enemy in flank and rear and cut off his retreat. General reserves are especially appropriate for this mission. (See par. 507.)

■ 582. The pursuit is conducted on a broad front. Motor transportation is employed to expedite the movement of foot troops.

Troops before whom the enemy is giving way send in their reserves to gain his flank and rear or break through his covering troops.

■ 583. The forces engaged in the direct pressure and in the encircling maneuvers are assigned directions, zones of action, and objectives designed to bring the pursuit to a decisive conclusion. Such directions and zones of action may be around the flanks or through the wider gaps which defeat has opened in the hostile dispositions, or may be a continuation of the existing zones of action.

■ 584. Supporting combat aviation concentrates on lines of communication centers in the enemy's rear area, on hostile columns in retreat and on hostile reserves endeavoring to

reconstitute the defense. It blocks defiles on the enemy's line of retreat and disrupts traffic on the main roads and railroads in the enemy's rear area.

Observation aviation reconnoiters the roads in the enemy's zone of retreat to keep contact with retreating columns and to locate any movement of hostile reinforcements, and keeps ground commanders informed of the hostile activities and movement within their zones of action.

■ 585. The employment of artillery is based upon the maximum exploitation of the mobility of lighter pieces and the long range of the heavier types. So long as the withdrawing enemy can be engaged with observed and planned fire, a portion of the artillery remains in position to fire on the more distant targets. Long-range artillery working with observation aviation and balloons continues its fire on the enemy lines of communication up to the limit of its range.

The artillery attached to the pursuing forces, in addition to its supporting action, fires on hostile elements attempting to form columns in rear of the enemy's covering troops, and gradually takes over the missions of the artillery remaining in position.

■ 586. The purpose of the encircling maneuver is to get in rear of the defeated enemy and halt his retreat so that he may be destroyed between the direct pressure and encircling forces.

When practicable, mobile forces in the encircling maneuvers advance along roads paralleling the enemy's line of retreat to cut him off at defiles, bridges, and other critical points. When the encircling forces cannot outdistance the enemy they push through to a critical locality and engage the enemy's main forces in flank.

Combat aviation; armored, mechanized, and motorized units; and cavalry are employed in the encircling maneuvers.

Troops transported by air for employment at critical defiles deep in the hostile rear pending the arrival of more powerful, mobile encircling forces may contribute decisively to a successful pursuit.

■ 587. The advance in the decisive direction must be maintained. Hostile rear guards or forces on flank positions must not turn pursuing forces from the decisive direction. Every effort must be made to block the main hostile force. When

necessary, a new encircling force to continue the pursuit is constituted.

When the enemy succeeds in establishing himself in a position from which he cannot be dislodged quickly, the superior commander takes prompt measures to coordinate the attack again, supporting it with all available means. (See pars. 557 and 558.)

■ 588. The enemy's attempts to organize his retreat under the cover of darkness must be frustrated. Under no circumstances must he be allowed to break contact. Units which have advanced without serious opposition continue their march during the night. Other units organize successive limited attacks against the enemy in their front.

During a night pursuit, the leading detachments push their advance along all available roads, followed by the main pursuing forces. The attached artillery advances by echelon, going into successive positions from which it can interdict the enemy's routes of retreat by map firing or by fire directed by observers which accompany the leading detachments. Prompt report is made when objectives are reached so that artillery fires may be coordinated.

The effect of artillery fire is complemented by combat aviation which searches enemy routes of retreat with flares, and bombs enemy columns and critical points in the enemy's rear area.

■ 589. Pursuit requires extensive reliance upon radio for communication with the leading troops. The importance attached to hostile interception of radio communication in other situations does not obtain in equal degree in pursuit. Effort is made to intercept the enemy's radio messages. The construction of wire lines is concentrated along the more important axes. Command posts or advance message centers are established close behind the leading troops.

■ 590. Adequate provision for the supply of ammunition and motor fuel to the pursuing troops is essential to the success of the pursuit. The commander must relieve the pursuing columns of all worries concerning supply and evacuation.

## SECTION VI

## SECURITY IN THE OFFENSIVE

■ 591. Success or failure of an offensive is dependent in a large measure upon the action taken to protect the command from hostile reaction. Open flanks are highly vulnerable. The best security is to keep the enemy so heavily involved that he has no time or means available to endanger the success of the attack. Security of attack forces is assured by a timely search for information in all directions from which a hostile threat may come, by the proper disposition of security forces of ample mobility and combat power, and by prompt dispatch of accurate information and orders to security forces. This is particularly true in security against hostile forces of great mobility such as air, tank, motorized, and cavalry units. In offensive operations, the service of security is performed in accordance with the general doctrines discussed in chapter 6.

■ 592. In offensive operations, the mass of available means for defense against air and mechanized attack is disposed to favor the main attack. The combat means for defense against air attack are supplemented by utilization of cover, defilade, dispersion, and night movements to the maximum. The combat means for defense against attack by tanks or other mechanized forces are supplemented by utilization of natural and artificial obstacles to protect the flanks and rear of the command, by dispersion, and by night movements. (See chs. 6 and 10.)

■ 593. Antitank guns in each echelon of troops are disposed to cover the most likely avenues of approach of hostile mechanized units; the bulk of the antitank guns are held mobile, prepared to meet a hostile mechanized attack at any point. Protection against mechanized attack is best assured by meeting the attack with the combined action of tanks and mobile antitank guns supported by every available and effective means of fire support, to isolate and destroy the hostile mechanized forces.

■ 594. In offensive operations, the greatest need for security exists during critical phases of the battle. Security is enhanced by meeting possible threats with heavy fire before they can develop. The action of combat aviation against

highly mobile threats and against close, less mobile threats is particularly effective, especially if hostile troops or vehicles are in close formation.

## SECTION VII

### TERMINATION OF OFFENSIVE ACTION

■ 595. An offensive action once begun is halted only by hostile reaction or by other elements in the situation which demand it.

If, during the course of an attack, it becomes necessary to pass to the defensive, the leading foot elements intrench themselves on the ground then held. The leading echelon then is thinned out and forces are redistributed to organize the defense in depth. It may be necessary to move some elements to the front or rear for short distances to establish the defense on favorable terrain and secure flanking fire. Any major adjustments attempted in daylight will probably result in heavy casualties. The general position of attacking units is maintained until darkness, when the selected defensive position is occupied and organized as described in chapter 10.

If the situation demands major adjustments in daylight, they are accomplished under protection of fog or smoke, and of a maximum of fire support by artillery, combat aviation, and other supporting weapons.

■ 596. If, during the course of an attack, it becomes necessary to break off the action and withdraw, the command initially passes to the defensive. The completeness of the defense is dependent upon the situation and whether the initial defensive and the withdrawal must be executed in daylight or darkness. Thereafter, the withdrawal is executed according to the doctrines discussed in chapter 11.