# MechWar '78

# Tactical Armored Combat in the 1970s

NOTE: This set of modified rules adapts the rules for SPI's **October War**, the final iteration of this system, for use with **MechWar '77.** It is based on a suggested retrofit posted by Ian Raine in the Consimworld forums related to this game series as well as player discussion. Rules imported from October War are in **blue text.** 

J. Shanks-v.04, August 2016

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### [1.0] INTRODUCTION

**MECH WAR '78** is simulation of tactical combat in West Germany and Asia during the 1970s.

The game is played by scenario. Eight scenarios revolve around a hypothetical Soviet-American clash in West Germany. One scenario is drawn from the Yom Kippur War. The tenth scenario pictures a Sino-Soviet clash.

Each hex represents 200 meters from side to side. Each Game-Turn represents one to six minutes of elapsed time.

# [2.0] GENERAL COURSE OF PLAY

This simulation is a two-Player game. It is played in a series of turns called Game-Turns. During a Game Turn, both Players' playing pieces (called units) move and engage in combat in an attempt to achieve certain objectives. This activity takes place according to a rigid Sequence of Play. The game is played in Scenarios. Each Scenario lists the opposing forces and conditions under which they engage. Each Player attempts to win the Scenario according to the Victory Conditions set out for him in each Scenario.

### [3.0] GAME EQUIPMENT

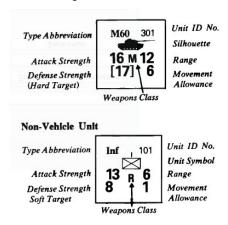
#### [3.1] THE GAME MAP

The mapsheet portrays an actual representative piece of terrain in Northwestern Europe. A hexagonal grid is superimposed on the map to regulate movement, position and firing range of the units. The hexes are numbered for identification when plotting orders for the units.

#### [3.2] THE PLAYING PIECES

Two contrastingly colored sets of die-cut counters are supplied. These counters are the playing pieces and are commonly referred to as units. They represent the various infantry platoons, artillery batteries, tank platoons, etc. that each Player will be assigned in a Scenario. Printed on each unit counter is a silhouette or symbol which serves to generally identify it as to unit type. More important the numeric and alphabetic inscriptions printed on each counter. These are arrayed in a standard fashion on each counter. By their numeric value and exact location on the counter they give the combat. movement. other characteristics of each unit.

#### [3.21] Sample Units



# [3.22] Summary of Unit Types (see Appendix, 24.0)

#### [3.3] GAME CHARTS AND TABLES

The game makes use of various charts and tables as a part of its play system and also to organize data into an easily retrievable form. The use of these graphic aids is explained in the appropriate rules sections. Players should examine the charts and tables as they appear or are referred to in the rules. Please note the separate chart sheet.

#### [3.4] DEFINITION OF TERMS

**Movement** is a basic game activity involving the physical displacement of a unit hex by hex across the mapboard.

**Combat** is a basic game process whereby one or more units pin, disrupt or destroy units belonging to the Opposing Player.

Weapons Class: The units portrayed in this game are small, platoon-sized organizations with 20 to 50 men and 3 to 10 vehicles. Each is organized around a particular main weapon system unique to its type of unit. Thus a mortar unit depends for its combat effectiveness on the high explosive shells lobbed by its mortars and any small arms carried by its men have no significant impact on its performance. Each unit then is classified according to the characteristics of its predominant weapons system.

**R-Class:** Units organized around rifle and machine gun fire: typically an infantry platoon.

M-Class: Units whose guns fire a mix of armor piercing and high explosive shell and are effective against both armored and unarmored targets; typically a tank or assault gun platoon.

H-Class: Units whose main weapons fire high explosive shell; typically on-map field gun or mortar units. This also includes Off-Board Artillery (14.0) and Close Air Support (15.0). In specific cases, infantry units may make an H Class attack against vehicles by virtue of inherent AT weaponry such as LAWs, RPGs or recoilless rifles (see 6.45).

**G-Class:** Units which depend for their defensive fire power on Anti-tank guided missiles.

**R\*** Class: Soviet Flak, or Anti-aircraft units, which are effective against ground targets as well as helicopters.

**Dual-Class:** Units (specifically, American infantry and Soviet BMPs) which have not only a complement of conventional weapons, but G-Class weapons as well. They have two counters each; see 6.87.

Target Type: Just as a unit is classified according to its weapons, so is it classified according to the vulnerability of its elements to fire, i.e., "what kind of target does it present?" Units are defined as either "soft" (unarmored), "protected" (lightly armored) or "hard" (armored) targets. Soft targets rely for their

protection on their ability to conceal themselves from fire and, for some, an ability to disperse their fighting elements. As an individual, the infantryman is an extremely vulnerable soft target, but the infantry platoon, while still a soft target, has a relatively high Defensive Strength, because it can take a lot of individual casualties before it ceases to be effective. Protected targets depend also on their ability to conceal themselves behind various terrain (they are usually low hull silhouettes) and their light armor when being engaged from a distance by small arms and high trajectory shells. Hard targets rely for their protection on armor. A tank, of course, is the archetypical hard target and a tank platoon is virtually invulnerable, except against weapons specifically designed to defeat armor. Helicopters are a special target type, and special procedures are used when attacking them.

Hard target type units are identified by brackets around their numerical Defense Strength. Protected target type units are indicated with parentheses around their numerical Defence Strength and include weakly armoured AFVs [see revised CRTs], APCs, Armoured Cars and IFV vehicles, and mortar, AAA and missile carriers based on APCs and IFVs. Soft target type units have no brackets around their numerical Defense Strength. Note that jeeps carrying ATGMs or RR antitank guns are Soft targets.

Attack Strength is a numerical rating of the firepower that a unit possesses. It is expressed in Attack Strength Points. The ability of a unit to attack depends on both its Attack Strength and its Weapons Class.

**Defense Strength** is a numerical rating of the ability of a unit to preserve itself when attacked. It is expressed in Defensive Strength Points.

Range is the maximum range or distance which a unit may fire at a target. It is expressed in hexagons and is measured by counting the shortest path in hexagons from the Firing unit (exclusive) to the Target hex (inclusive).

# [3.5] GAME EQUIPMENT INVENTORY

- One rules folder
- One set of counters (400)
- One game map
- One sheet of charts
- One die

One plastic box assembly

If any of these parts are missing or damaged, or if you have any questions concerning the game, please write: Simulations Publications, Inc. 44 East 23rd St. New York. N.Y. 10010. Questions must be accompanied by a stamped, self-addressed envelope.

### [4.0] SEQUENCE OF PLAY

#### **GENERAL RULE:**

Each game or Scenario is composed of Game-Turns during which both Players' units move and engage in combat according to a rigid Sequence of Play.

#### [4.1] SEQUENCE OUTLINE

A. DIRECT FIRE PHASE: The Players determine who the first Player is **for this Phase** (see 4.2). This Player may then have one or more of his units fire at any unit of the second Player (attack). The second Player may then have one or more of his units fire at any unit of the first Player. Players continue to alternate attacks until one Player has fired all his units or has passed. The Direct Fire Phase ends when both Players have fired all their units or both Players have passed (see Combat, Section 6.0).

B. MOVEMENT PHASE: The Players again determine who the first Player is for this Phase (4.2). The first Player then moves one unit that has not fired during the preceding Direct Fire Phase hex by hex across the map. After he has executed this move, the second Player may move a unit. While a unit is in the process of moving, Enemy units may attack the moving unit under the restrictions of Opportunity Fire and Overwatch Fire. Players continue to alternate moves until one Player has moved all his units or has passed. The Movement Phase ends when both Players have moved all their units or both Players have passed (see Movement, Section 8.0).

C. PANIC AND SUPPRESSION REMOVAL PHASE: Both Players remove all Suppression Markers that have been placed on units as a result of fire. Players then attempt to remove all Panic Markers incurred during the current Game-Turn or during a previous Game-Turn (see Panic, Section 13.0).

D. INDIRECT FIRE PHASE: Smoke Markers that impacted during the previous

Game-Turn are removed. Players consult their Indirect Fire Plots and execute any plotted Indirect Fire. Unlike Direct Fire and Movement, Players do not alternate Indirect Fire attacks. Finally, both Players may request future Indirect Fire on their Plots (see Indirect Fire, Section 7.0).

E. END OF GAME-TURN: At the conclusion of the Indirect Fire Phase, the Game-Turn is completed. Note the passage of the Game-Turn on the Game-Turn Record Track and begin a new Game-Turn.

**NOTE:** A unit may **move** or **fire** in a single Game-Turn, but it may not do both (EXCEPTIONS: see Overrun, Section 12.0; Mounted Combat, 9.4; optional Pull Back rule, 6.10; and the experimental Short Halt rule for vehicles with effective gun stabilization, 19.3).

#### F. REGROUPING [OPTIONAL]

Whenever partial strength units of the same type and class end a Game-Turn stacked in the same hex, they can regroup into full strength and partial strength platoons.

Example: At the end of a Game-Turn, one D2 and two D1 units are stacked in the same hex. They could regroup into a full strength platoon and a D1 platoon. If three D2 units are in the same hex at the end of a Game-Turn, they can reform into one full strength unit.

### [4.2] DETERMINING THE "FIRST" PLAYER

There are certain advantages in being the first Player to move or fire. In order to grant each Player a chance to be first, the Fire and Movement Phases of every Game-Turn require that a "first" Player be determined by random means for **each of these two Phases.** Suggested Procedure: For each "first" Player determination, let one Player be "odd" and the other Player "even"; roll a die and assign a first Player for that Phase according to the resulting number, be it odd or even. OPTIONAL: use the Overrun Fire Initiative procedure (12.0).

# [5.0] SPOTTING [OBSERVATION]

GENERAL RULE:

Spotting refers to the ability of one unit to see another unit. Whether or not a given unit spots another unit depends on whether or not the Line of Sight between the two units is blocked (obstructed), the type of unit being observed, and its movement/firing status. The Line of Sight is determined by drawing an imaginary straight line between the center of the sighting unit's hex and the center of the sighted unit's hex. The terms Line of Sight (LOS) and Line of Fire are synonymous. When a unit has a clear Line of Sight to a potential target unit within Observation Range, it can Spot the target unit and thus use the Line of Sight as a Line of Fire.

#### PROCEDURE:

#### JUDGING THE LINE OF SIGHT

Lay a straight edge from the center of the sighting (firing) hex to the center of the target hex. The line so described is the Line of Sight (Line of Fire). If the LOS passes through a blocking hex or hexside which is not common to either the Firing unit's hex or the Target hex, then the LOS is blocked. Otherwise it is unblocked.

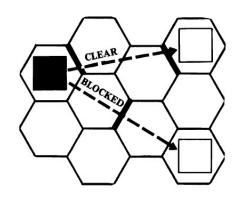
#### CASES:

## [5.1] BLOCKING HEXSIDES AND HEXES

[5.11] Any hexside which is covered in whole or in part by blocking terrain is considered a blocking hexside. Any hex which is wholly or partially filled by blocking terrain is a blocking hex.

The Terrain Effects Chart states which terrain features block Line of Sight and which do not block; also see Terrain, 10.35.

[5.12] Blocking terrain in the Spotting unit's hex and/or in the target hex, or on any hexside of either hex, does not block the Line of Sight.



#### [5.2] OBSERVATION RANGE

All units are initially deployed face-down so that only the owning Player knows what they are. They are turned face-up only when observed by enemy units.

[5,21] If a face-down unit fires at an Enemy unit from any range, it is automatically observed and is turned face-up. If a face-down **vehicle** moves through or into the LOS of an Enemy unit at any range, it is automatically observed and turned face-up. If a face-down unit neither fires nor moves, it remains face-down and unobserved until an Enemy unit is within Observation Range (see Observation Table).

[5.22] Once observed (face-up), a unit remains observed for the length of time that it remains in an Enemy unit's LOS, regardless of the distance between the observing unit and the target unit and the effects of terrain on Observation Range. If an observed unit can move out of the LOS of all Enemy units, it may be turned face-down (unobserved) until such time as it is again observed by an Enemy unit.

[5,23] For purposes of determining Observation Range, whenever a Friendly unit moves through two or more different types of terrain that is within the LOS of an Enemy unit-including the hexes in which the unit begins and ends its movement determine the Enemy unit's ability to observe that unit based on the terrain type passed through that best affords a chance for observation.

[5.24] Note that a Friendly unit attempting to move out of an Enemy LOS is still subject to Opportunity Fire from observing units in each hex en route.

# [5.3] EFFECT OF UNITS IN SPOTTING

Playing pieces never obstruct the Line of Sight. A unit may see through any number of intervening units (both Friendly and Enemy) to some distant target hex, and a unit may fire through both Friendly and Enemy units to some distant target hex without affecting the units fired through.

# [5.4] SPOTTING FOR INDIRECT FIRE

Any Friendly unit may spot a target hex for another Friendly unit which is capable of Indirect Fire. Unless assisted by a spotting unit, no unit may fire Indirect Fire (except when specifically allowed by the Scenario Instructions).

### [6.0] **COMBAT**

#### COMMENTARY:

A Player uses his units to fire at (attack) Enemy targets. A Player may attack during the Direct Fire Phase, in which case the attack is called Direct Fire, or he may attack during the Movement Phase, in which case the attack is called Opportunity Fire; otherwise they are identical in execution. Certain units may fire during the Indirect Fire Phase (see 7.0).

There are four Combat Results Tables. The Anti-Personnel Combat Results Table is used by all units when firing at Soft Targets. The other three tables are used by all units when firing at Hard or Protected Targets. We will refer to the last three tables collectively as the "Anti-Armor" Combat Results Tables.

Every combat unit has a maximum range printed on it. This is the greatest number of hexes it can fire at a target. All other things being equal, the ability of an individual unit to use its firepower varies with the range it fires over. The Attack Strengths of the various units were calculated on the basis of the units engaging targets at an average of 400 to 600 meters (2 to 3 hexes in game terms). This effect is called Range Attenuation and is numerically summarized on the Range Attenuation Table. H-Class units are insensitive to Range Attenuation, which is reflected in the H-Class Combat Procedures.

#### GENERAL RULE:

In order to fire at an Enemy target, a unit must be able to observe the target and must be within firing range. In the Direct Fire Phase, a Player may attack any Enemy unit. During the Movement Phase, a Player may attack only the unit that the Enemy Player is moving at that moment. When an attack is executed, the result is determined by the Fire Routine which considers the characteristics of the firing unit, the panic status of the firing unlit, the characteristics of the target unit, the range, and the effects of terrain.

#### PROCEDURE:

To make an attack, a Player identifies which of his units are firing and which

Enemy unit is the target. (NOTE: One attack may be made with several units firing at the same target.) Each individual unit that is attempting to fire consults the Panic Table (see sheet). A 1d10 is rolled, and if the outcome of the roll falls within the limits of the numbers specified, the unit panics and may not fire or move. Place a Panic Marker on that unit to indicate this condition. If the unit does not panic, it proceeds to the fire routine.

#### FIRE ROUTINE:

**Step 1:** The attacking Player determines the range in hexes between the firing unit and the target unit. When counting hexes to determine range, count the target unit's hex but not the firing unit's hex. If the computed range exceeds the range of the firing unit, the unit may not fire. (NOTE: Range should be calculated before the Player announces his attack, because once the attack is announced, the unit must fire, even if its fire will be ineffective.)

**Step 2:** Once the target unit is determined to be within range, the attacking Player determines the type of target he is attacking: Hard (units with bracketed Defensive Strength), Protected (units with parenthesized Defensive Strength), or Soft (units with no brackets or parentheses around Defensive Strength).

**Step 3:** The attacking Player modifies his attack strength for range attenuation by consulting the Range Attenuation Table:

- a) Determine the target type (i.e., Hard Target, Protected Target, or Soft Target) and locate the appropriate section of the table.
- **b)** Determine the Weapon Class of the firing unit and find the appropriate column within the section of the table as determined in Step 1.
- c) Determine the range (in hexes) from the firing unit to the target unit.
- **d)** Cross index the range with the Weapon Class column and read the modification indicated on the table.

Follow this procedure for each of the units that are firing at the same target unit. If several units are involved the Player may wish to write down the modified strength of his firing units as he calculates them via the table.

The target unit subtracts its defense strength from the modified attack strength which yields the attack superiority number. The attacking Player then selects the appropriate Combat Results Table for Hard/ Protected targets or Soft targets.

**Step 4:** The attacking player now rolls one die. He modifies this number for any terrain defense bonuses and cross-indexes his modified attack strength with the appropriate attack superiority column. A result is achieved which is immediately applied to the target unit (e.g., D1 meaning 1/3 of the unit is destroyed, D2 meaning 2/3 of the unit is destroyed). Sometimes a parenthesized number results which requires another die roll on the part of the defender (see Combat Results Table). Also if the attacking unit is a G class, it may deplete its ammunition (see 6.84).

#### CASES:

# [6.1] RESTRICTIONS ON FIRE COMBAT

[6.11] A panicked unit may not fire.

**[6.12]** A unit may suffer a Combat Result which prohibits it from firing or which reduces its effectiveness (see the explanation of Combat Results).

[6.13] A unit may not fire more than once during the Direct Fire Phase. Note that when a Player attacks, he may fire with more than one attacking unit (see Procedure). When he announces an attack, a Player identifies which units are firing. He may not add to this list after he has stated it, nor may he fire at the same target in a later attack during the same Phase.

**[6.14]** Once a Player states an attack, he must execute that attack. He is responsible for calculating the chance of success before he states his intentions. If he states an attack which is subsequently found ineffectual (most commonly because he fired on a target out of range), the attack is still considered to have been executed. In effect, the firing units have wasted their fire.

#### **[6.2] EFFECT OF OTHER UNITS**

Units never block the Line of Sight. A Player may fire through Friendly and Enemy units. Whenever a target unit is stacked with other units in a hex and it receives a combat result, the other units in the hex are unaffected. Personnel being transported by a vehicle are a special case (see Section 9.0).

#### [6.3] MULTIPLE FIRE ATTACKS

When a Player uses several units to fire at the same target, they are considered to all be firing simultaneously. He resolves each unit's fire separately in any order he wishes. He must, however, resolve each fire

[6.31] If a Player assigns several units to fire on a single target unit and the target is eliminated before all the units have had a chance to fire, the remaining units are considered to have fired for that Game-Tum

**[6.32]** A multiple-fire attack is considered a single attack for purposes of the Sequence of Play. If a Player states that three of his units are making one attack, the fire of each Friendly unit involved in that attack is resolved before the Enemy Player may do anything.

#### [6.4] DIRECT FIRE

**[6.41] Direct Fire** occurs during the Direct Fire Phase and is executed against any enemy units the Player can observe. In order to execute a Direct Fire attack against an Enemy unit, the attacking unit must be able to spot the unit with a clear Line of Sight, according to the rules of Spotting (see 5.0).

[6.42] Any unit with an Attack Strength may use Direct Fire, except Panicked units.

[6.43] On-map H Class units may use Direct Fire; if such a unit Direct Fires, resolve the attack on the D2 CRT. It is treated as Tight Pattern, affects all units in the target hex, and the Range Attenuation Table is not used. The target Defence Strength is not deducted from the Attack Strength, but the printed Attack Strength may be reduced by damage (see 7.16).

[6.44] All tanks and assault guns/tank destroyers are also considered to be armed with coaxial/bow and/or pintle-mounted MMG. These units (along with all APCs) can make a 2R3 attack on soft targets instead of an A or M class attack.

US and USSR tanks have an AAA HMG mounted atop the roof which can only be fired if the tank is not suppressed (buttoned up); this would be a **3R5** attack.

[6.45] Infantry units may attack vehicles at a range of up to 1 hex with a Direct Fire H-Class attack. This is calculated using a raw strength of 4, reduced for range attenuation by -3 at 1 hex range, damage, and Suppression. The

attack takes place on the D2 table, the target cannot button up, and all the rules about direct H Class attacks apply to it. Terrain is ignored. Note that the H Class strength of a rifle platoon at D1 and S1 attacking at a range of 1 hex would be -3.

### [6.5] OPPORTUNITY FIRE

**[6.51]** Opportunity Fire occurs during the Movement Phase and is executed only against enemy units that are moving and can be observed. (See also Overwatch Fire, 6.9.)

[6.52] A Player must pause each time his unit moves into a hex to allow the Enemy Player an opportunity to fire at the moving unit. This pause permits the Enemy Player to calculate ranges, etc. before he announces the attack. Only the unit actually being moved may be fired at. The attack is resolved exactly as detailed in Section 6.0.

**[6.53]** If a moving unit survives Opportunity Fire, it may continue moving. However, it may be fired at again when it enters a new hex, although the Enemy Player would have to use a different unit, since no unit may fire more than once per Game-Turn (Exception: see Overruns, 12.0).

# [6.6] TERRAIN EFFECTS ON COMBAT

When a target unit lies in a village or grove hex or is behind covering terrain, it receives a defense bonus in the form of a die modification (see Terrain Effects Chart on map; Covering Terrain: Case 10.2).

# [6.7] PARTIAL STRENGTH UNITS vs. SOFT TARGETS

Full Strength units do not modify the die roll when firing at Soft Targets. Dl strength units subtract one from the die roll when firing at Soft targets. D2 strength units subtract two from the die roll when firing at Soft targets.

### [6.8] SPECIAL WEAPONS CLASSES

[6.81] An H-Class unit, in addition to conducting Direct Fire [6.43], may conduct Indirect Fire (7.0) as either a Tight Pattern or a Loose Pattern attack. The difference is that a Tight Pattern attack affects defenders in the impact hex only. A Loose Pattern attack affects defenders in the impact hex and the surrounding six adjacent hexes (Impact Zone). All H-Class Fire must be

designated as either Tight (T) or Loose (L) Pattern as part of the Fire Plot. In the absence of such a designation, the fire is considered to be Tight Pattern.

[6.82] H-Class Fire affects all units located in the impact hexes (Zone). Thus an H-Class unit may attack more than one unit per Game. Turn though it may fire at only one impact hex per Turn. When there are multiple units in the Impact Zone (hex) simply attack each one separately as though it were the only unit present. The Attack Strength of an H-Class unit is not divided between multiple defenders. It attacks each one with its full strength (subject to the Resolution procedure).

**[6.83]** Naturally, a Loose Pattern attack represents a less dense bombardment of a given area than a Tight Pattern attack. For this reason, the procedures for resolving a Loose Pattern attack differ from a Tight Pattern; see 7.21.

[6.84] Each G-Class unit is assigned an ammunition depletion rating, which is printed on its counter face. Whenever a G-Class unit fires, the Owning Player will roll the die immediately after the resolution of the attack. If the die roll is equal to or less than the printed ammunition depletion rating for the firing unit, the unit is considered to have expended all of its missiles and is considered, henceforth, to have a zero G-Class Attack Strength. If a unit does not have a dual-Class identity (US M150 units) it is then removed from the map.

[6.85] A G-Class unit may only fire at Hard targets, but they may attack trucks as if they were Hard Targets. Soft Targets being transported by Hard Targets (or trucks) are equally affected by the fire of a G-Class unit.

**[6.86]** The following G-Class units have a minimum range of two hexes (i.e., they may not fire at adjacent targets): Soviet BRDM; British Swgf; West German Cbra.

[6.87] Each **Dual-Class** unit has two counters: One represents its G-Class Strength, the other its conventional R- or M-Class Strength. All Dual-Class units (**American infantry and Soviet BMPs**) are portrayed on the map with their G Class counter. Whenever a Dual-Class unit loses its G-Class capability on account of ammunition depletion after a G-Class Attack (see 6.84), the G-Class counter is permanently removed from play

and replaced with its conventional counterpart.

[6.88] A dual-Class unit may fire with its conventional Strength even though it is portrayed on the map with its G-Class counter. It is neither necessary nor desirable that a switch be made between the G-Class counter and the conventional counter for the unit to fire its conventional Weapons Class.

#### [6.9] OPTIONAL COMBAT ACTIONS

The following rules are from the **October War** errata and may be implemented here.

#### [6.91] OVERWATCH FIRE

#### GENERAL RULE:

During the Movement Phase, a Player may fire at an Enemy unit which has itself fired during the current Movement Phase. Overwatch fire allows a player to fire at a unit which is moving or at a unit which has just fired Opportunity Fire. The Overwatch fire must be executed immediately.

Example: An M60 platoon moves into hex 3013 and receives fire from a T62 in hex 3415. An M60 unit in hex 2611 could then Overwatch fire at hex 3415 immediately. If not conducted immediately, Overwatch fire could not be directed against the above hex for the rest of that movement phase.

[6.911] In order for a unit to be eligible to fire Overwatch Fire it must fulfill the following conditions: it may not have moved that Game Turn; it may not have fired in that Game Turn.

**[6.912]** A unit may only conduct Overwatch Fire once per Game Turn.

#### [6.92] PULL BACK

### COMMENTARY:

Vehicles in hull down position that are behind covering terrain after firing will usually pull back behind the covering terrain to avoid return fire.

#### GENERAL RULE:

Any unit (including helicopters, 17.0) that fires from behind Covering Terrain (see 10.2), after firing and receiving Overwatch or return fire may at the end of the phase revert to a Hidden state if no enemy units are within observation range (see 5.14). Example: if no units were within one hex of a town hex after receiving Overwatch fire, the firing unit in

that town hex could again resume a Hidden state and would not be eligible as a target during the next Direct Fire phase unless it fired again.

#### [6.93] **SPLIT FIRE**

All vehicular platoons consist of multiple vehicles of the respective type shown on the counter. Given the breakdown of a platoon into abstracted D1/D2 components, a full strength platoon could fire as a Full strength platoon, one D1 and one D2, or three D2s. In essence, each individual platoon element is seeking its own target. Panic in this circumstance is evaluated for each individual fire, except if one element in a platoon panics, they all panic.

### [6.10] SUPPRESSION OF ARMORED VEHICLES

#### GENERAL RULE:

R-Class units may fire at Hard Target types. To perform this type of combat you take the attack strength of the firing unit and subtract the defense strength of the target yielding an attack superiority number. The attacking player then resolves the attack on the anti-personnel combat results, modifying the die roll for terrain. If any result other than no effect is achieved, the defending Hard target type is placed in an S1 state. R-Class units may fire at Hard Target types up to 3-hex range using suppressive fire.



#### [7.0] INDIRECT FIRE

#### GENERAL RULE:

In most scenarios, both Players are given an Off-Board Artillery capability (14.0), which simulates the availability of artillery, rocket, or mortar batteries located elsewhere than in the area depicted on the map, to fire at the Enemy targets located on the map. In addition, players may have on-map H Class combat units assigned as organic support which function similar to Off-Board Artillery except that they move on the map and are therefore susceptible to enemy fire (see 6.71).

#### PROCEDURE:

Artillery is available in terms of "concentrations" of H attack strength points per turn. Each Scenario's Order of Battle states that a Player has, for example, "3 concentrations of 6 H points each"—abbreviated to read: OFBDA—3(6H).

CASES:

# [7.1] AVAILABILITY AND CAPABILITIES

[7.11] A Player always plots Indirect Fire at least one turn in advance of its execution, e.g., he plots Indirect Fire on Game-Turn 2 and executes it on Game-Turn 3. He may also plot fire for more than one Game-Turn in advance.

[7.12] Once an impact hex has been designated, continuous fire over several Game-Turns into the same impact hex does not have to be pre-plotted. If the impact hex is changed or not fired on, the plotting procedure must be repeated.

[7.13] A unit firing Indirect Fire may fire at one and only one target hex. This target hex must be in the LOS of at least one Friendly unit (see 5.4).

[7.14] Because Indirect fire is resolved after the Movement Phase, the intended target units may move from the target hex, and other units may move into the target hex prior to impact. The Indirect fire impacts on and attacks any units which are present in the impact zone during the Indirect Fire Phase.

[7.15] If an on-map H Class unit panics in a turn when it is plotted to fire, the fire is cancelled for that turn. In addition, if the on-map H Class unit is subjected to Direct or Opportunity fire in a turn when it is plotted to fire, the fire mission is cancelled whether the unit takes losses or not.

[7.16] If an on-map H Class unit takes losses, lower the H concentration 1 H factor for each loss, i.e., if a mortar section takes one loss, it would thereafter fire a 3H concentration.

[7.17] Indirect Fire is always subject to Scatter. There is a 1/6th chance that the actual impact hex will be different than the intended target hex for any Indirect fire. Roll a die for each H concentration that is Indirect Firing. On a roll of **one**, the Indirect Fire scatters; roll the die again and consult the Scatter Diagram (see map). The Indirect Fire from that unit

impacts one hex away from the target hex in the indicated direction.

[7.18] Units receiving Indirect Fire receive a terrain benefit if they are in Woods or Village hexes; the benefit is a -2 from the die roll.

#### [7.2] TYPES OF H FIRE

H fire comes in three varieties: **tight** pattern, loose pattern, and smoke.

[7.21] Tight pattern H fire affects only the impact hex. Loose pattern H fire affects each hex with one-half of the original H concentration (round fractions up).

[7.22] Smoke must be fired in a tight pattern and therefore affects only the impact hex. Place an inverted marker on that hex.

[7.23] Smoke lasts for one turn and is treated in all ways as a woods hex. Smoke is removed during the beginning of the Indirect Fire Phase of the Game-Turn following its impact.

[7.24] Effects of Smoke are not cumulative. In a Smoke hex, take the terrain feature with the maximum defensive benefit and use that one only.

# [7.3] EFFECTS OF H FIRE ON HARD AND PROTECTED TARGETS

Hard targets (units with a bracketed "[]" Combat Strength) and Protected targets (units with a parenthesized "()" Combat Strength) have the option to receive H fire either "buttoned" or "unbuttoned."

[7.31] To button up, a Hard or Protected unit voluntarily assumes a state of Suppression 1 (S1) immediately prior to the resolution of the attack. The S1 applies equally to any infantry mounted on the unit. A Hard or Protected target (together with its mounted infantry) that receives H fire while buttoned up is liable to Suppression 2 (S2) **only** if the H fire is in tight pattern. To resolve an H fire attack on a buttoned target, roll the die; if the number rolled is equal to or lower than the H concentration of the attacking unit(s), the target is double suppressed (S2). Example: a Hard target buttons up on a 4H concentration in tight pattern and the die roll results in a 5; the unit is only S1 (due to its voluntary buttoning up). If the roll had been a 4 or less, the unit would have been S2.

[7.32] To receive H fire unbuttoned, a Hard or Protected target and any mounted

infantry simply accepts the fire without assuming a state of S1. To resolve H fire of an unbuttoned target, use the H concentration as the attack superiority on the D2 CRT.

# [7.4] EFFECTS AND DURATION OF SUPPRESSION ON HARD TARGETS

Suppression, whether regular or doubled, is automatically removed during the next Panic and Suppression Removal Phase. Suppression affects a Hard Target only by reducing its Attack Strength by 2 points for each suppression. Example: A unit with an Attack Strength of 15 which is double suppressed has an attack strength (while in this state) of 11.

# [7.5] EFFECTS OF SUPPRESSION ON PROTECTED TARGETS

The effects of suppression on Protected Targets are identical to its effects on Hard Targets except for the following units: Soviet LRRPs are open topped and thus cannot be buttoned up. These units automatically accept fire on the D2 CRT and all passengers are affected as is their carrying unit. The effect of suppression on M113s, BMPs, BDRMs and BTR-60s is a reduction of 3 attack strength points for each suppression state. All Protected targets button up to protect their passengers just like Hard targets.

# [7.6] EFFECTS OF H FIRE ON SOFT TARGETS

Soft Targets that are not in APCs (protected vehicle) are affected by H fire in tight or loose fire identically. The Indirect fire attack is conducted on the Anti-personnel CRT using the H fire concentration as the Attack Superiority column. (See Anti-Personnel CRT for explanation of results.)

The effect of suppression on Soft Targets is a reduction of 3 Attack Strength points for each suppression state, and the unit may not move until the suppression is removed; suppression states in excess of S2 against Soft Target types only are possible.

### [7.7] CLOSE AIR SUPPORT [CAS]

Close Air Support is in all ways identical to Indirect Fire except that it is always tight pattern, may never drop smoke, and has to be plotted only one turn in advance. See Rule 15.0. Armored vehicles may not button up when being attacked by Close Air Support; they are attacked on the +8

column of the D2 CRT. The only terrain benefits a target unit receives when being attacked by CAS are identical with 7.18.

#### [7.8] COUNTERBATTERY FIRE

[7.81] A Player may assign any or all of his artillery and mortar units (only) to a Counterbattery task (CB). If and when an Enemy artillery or mortar unit (only) executes Indirect Fire the die is rolled. If it is a "one" then the Enemy unit is Spotted and the Friendly Player may automatically fire at this unit with one or more of the Counterbattery units within range. The Counterbattery Fire is, in effect, "triggered"; otherwise the Firing unit remains concealed and there is no Counterbattery Fire.

[7.82] Counterbattery Fire is, by definition, a variant of Opportunity Fire and it is executed just as though it were Indirect Fire.

[7.83] Counterbattery Fire is executed in the same Game-Turn that it is triggered.

[7.84] Several Enemy units may be triggering Counterbattery Fire on the same turn from several Friendly units. The Friendly Player can allocate his Counterbattery Fire among the several targets as he sees fit, so long as no unit attacks more than once per turn and all attacks are executed as separate events. If a Player is executing Counterbattery fire on more than one Enemy unit in a turn, he must allocate all of his fires before executing any given Counterbattery.

[7.85] By its nature, the act of Counterbattery reveal can the Counterbattery unit to the Enemy's Counterbattery units, who proceed to execute Counter-Counterbattery, so to speak. A Player may deliberately withhold given unit from executing Counterbattery in hopes that some Counter-Counterbattery Enemy unit will reveal itself. All of this indirect Fire. Counterbattery, Counter-Counterbattery. etc. takes place in the Game-Turn in which it is triggered.

[7.86] If an Indirect Firing unit draws Counterbattery Fire, other units in its immediate vicinity may be affected, depending on the type of Counterbattery pattern fired, and the extent and direction which the Counterbattery Fire scatters. The effect of Counterbattery Fire is no different from that of Indirect Fire.

[7.87] Once a unit has been Spotted (see 7.81) by Counterbattery it remains Spotted for all following Game-Turns (and can be fired on by normal Indirect Fire) so long as it remains in the same hex it was spotted in. This is true even if it was not immediately fired on by Counterbattery.

[7.88] ALTERNATE PROCEDURE: Every Game-Turn a unit fires from the same hex the chance of it revealing itself goes up by one-sixth (e.g., the second time a unit fires from a given position, a die roll of **one or two** Spots it). This is a very realistic optional rule, but it does involve considerable record-keeping.

### [8.0] MOVEMENT

**GENERAL RULE:** 

During the Movement Phase, the Players alternate moving their units one by one. A Player may move any unit which has not fired during the current Game-Turn and which is not suffering a combat result which prohibits it from moving (see Combat Results Explanation; Panic: Section 13.0). Within these restrictions, a Player may move one, some, none, or all his units. A unit moves hex by hex. The distance a unit may travel in a Movement Phase is dependent on its Movement Allowance and the cost of the terrain it crosses and enters. Whenever a unit enters a hex, it may be liable to fire from Enemy units using Opportunity Fire. Once a Player passes (i.e., declines to move another of his units) that Player may move no more units during that Movement Phase. The opposing Player may continue to move his own units until he, too, passes or has moved all his units.

PROCEDURE: The first Plaver announces that he will move a particular unit. He consults the Panic Table, crossreferences the current strength of the unit with the movement column, and rolls a1d10. If the number rolled is one of those specified on the Panic Table, the unit panies. Full strength units do not check for panic. If the unit is eligible to move normally, the Player moves the unit from hex to hex up to the limits of its Movement Allowance. Basically, a unit expends one movement point for each hex it enters. Some hexes and hexsides cost more than one Movement Point for a unit to move through or across them (see Terrain Effects Chart).

## [8.1] EFFECT OF ROADS AND TRAILS

When a vehicle moves so that its path coincides with the path of a road or trail, it pays only the cost for moving along the road or trail, ignoring any other terrain. It costs a vehicle 0.5 movement point to move through a hexside containing a road. It costs a vehicle 1 movement point to move through a trail hexside regardless of other terrain in the hex. Personnel units (unmounted) may move 1 hex regardless of the presence of roads, trails, or terrainin any Movement Phase.

# [8.2] RESTRICTIONS ON MOVEMENT

[8.21] A Player may move his units in any order he desires, but once he has moved a unit he may not move it again in that Game-Turn.

[8.22] A Player may not move a unit which has fired during the current Game-Turn, nor may he move a unit which has suffered a Combat Result that prohibits it from moving.

[8.23] A Player may not move any units once he has passed in that Movement Phase

[8.24] A unit may not expend more movement points than its total Movement Allowance.

[8.25] Friendly units may never enter a hex containing an Enemy unit (exception: Overrun, 12.0), nor may they enter a hex or cross a hexside which is impassable (see Terrain Effects Chart).

[8.26] Friendly units may freely enter and pass through hexes containing other Friendly units so long as they do not terminate their Movement in violation of the Stacking limits (see 8.5). Friendly units may enter hexes containing enemy units by conducting an Overrun (12.0).

[8.27] Units may never exit from the map, unless the Scenario Instructions so indicate. Units which do exit from the map may never return to play.

#### [8.3] ZONES OF CONTROL

There are **no** Zones of Control in this game.

### [8.4] EFFECT OF MOVEMENT ON SOFT TARGET DEFENSE

When a Soft Target moves, it is a body of men walking or running upright. As such, it is much more exposed than a similar body of men hugging the ground in place, taking advantage of every fold in the earth, trees, boulders, etc. Therefore, when a Soft Target receives Opportunity or Overwatch fire while moving, it loses all benefits from Terrain.

### [8.5] STACKING

A Player may place up to three Friendly units in the same hex. This is called stacking. He simply places one unit on top of the other. There is no movement cost to stack units or unstack them except when such action represents mounting or 9.0). dismounting (see Stacking limitations apply only at the end of the Movement Phase. During the Movement Phase, a Player may have any number of units in the same hex, as long as he meets the limit by the completion of the Movement Phase.

[8.51] When transporting a personnel (non-vehicle) unit(s) a vehicle is placed on top of the passenger unit(s) (see 9.0). For purposes of the stacking limit, a vehicle with passengers is treated as one unit. Thus, a Player may have up to three vehicle units, each with passenger, stacked in the same hex.

[8.52] Stacking has no effect on a unit's ability to attack. Units in the same stack may fire at different targets, the same target, or no target.

**[8.53]** Stacking has no effect on a unit's vulnerability to Enemy fire. Enemy units may fire at a single unit in a stack and ignore any other units in the stack (Exception: see Case 7.0).

[8.54] Units stacked together are each vulnerable, in turn, to any Indirect Fire which impacts on the hex they occupy.

### [9.0] TRANSPORTING

**GENERAL RULE:** 

Transport is a specialized form of movement which allows a vehicle unit to carry one or more personnel units. It is the **only time** that a Player is allowed to move more than one unit at a time. Transport requires two separate operations: **Mounting** and **Dismounting**. Mounting represents a personnel unit, such as an Infantry Platoon, boarding a vehicle, such as an APC. Dismounting represents a personnel unit's disembarkation from a

vehicle. While aboard a vehicle, the personnel unit is called a mounted unit.

CASES:

# [9.1] PROCEDURES AND RESTRICTIONS

[9.11] To mount, a Player places a vehicle unit on top of a personnel unit. To dismount, he places the vehicle beneath the personnel unit. While transporting, the Player moves the vehicle unit—with its passengers beneath—as one unit.

[9.12] To mount or dismount a personnel unit(s) must be in the same hex at the instant of mounting as the vehicle. Mounting costs 3 movement points; dismounting costs 2 movement points. These movement points are expended by the **vehicle.** The vehicle may move in the same turn in which a unit mounts or dismounts, as long as the vehicle does not exceed its Movement Allowance.

[9.13] When a transporting vehicle is hit by fire and takes losses (a 1 or 2 result), the passenger units take the same result. Thus, if a passenger unit dismounts from a vehicle that has taken a 2 result, the infantry also has a 2 result assessed against it.

[9.14] An infantry unit cannot mount a vehicle unit that has taken **more** damage than the mounting unit.

[9.15] You may not mount an infantry unit or anti-tank gun which is stacked in an Improved Position. The unit would have to move out of the Improved Position and mount in the following Game-Turn.

### [9.2] INFANTRY ON TANKS

[9.21] Infantry may ride on tanks, but if the tank is fired on, then the infantry receive fire as Soft Targets. Whatever combat roll is made is also applied on the Anti-Personnel CRT using the same differential as was achieved on the CRT against the tanks (or nearest column). Infantry are limited to riding on medium or heavy tanks and assault guns—not on light tanks or armoured cars, or any vehicle with explosive reactive armor (ERA—although none appear in the games as published). Infantry cannot fire while mounted when riding on a tank.

**NOTE:** infantry riding on a tank will be affected by R Class fire. Apply the die roll achieved against the tank on the Anti-Personnel Table to find the result, but to

not use the differential column; calculate the differential in the usual way for an R Class attack on a Soft Target.

# [9.3] STATUS OF UNITS ENGAGING IN MOUNTING OR DISMOUNTING

[9.31] Units which in a given Game-Turn are about to engage in mounting or dismounting, or which have just engaged in mounting or dismounting, are considered to be **moving** for purposes of combat resolution.

[9.32] When a truck or APC unit is moved into or out of an adjacent hex, in the act of mounting or dismounting, it can trigger Opportunity Fire. If any combat effects are assessed on the unit, it is placed in the initial hex, and the mounting or dismounting operation does not take place.

[9.33] Whether or not a unit is mounted or dismounted simply depends on whether or not the truck or APC unit is on top of the non-vehicle unit. Thus, if you have two unmounted units, truck and infantry, and they are fired on during the Direct Fire Phase which is prior to the Movement Phase, they would be unmounted; then, assuming they mount during the Movement Phase and then receive fire during the Indirect Fire Phase, they would be mounted for the Indirect Fire Phase.

#### [9.4] COMBAT WHILE MOUNTED

[9.41] Personnel (infantry platoons) may fire while mounted in APCs. The normal range and effectiveness of mounted infantry fire is reduced. (NOTE: Due to the sequence of play, some units are fired on before they have an opportunity to fire. The defensive strength of a mounted infantry unit is dependent on whether it fires or not. When the current defending Player is asked whether or not a particular mounted unit will fire in that Direct Fire Phase, his answer is binding, i.e., if he says that that unit will not fire, it cannot then fire.)

#### [9.5] SPECIFIC UNIT CAPABILITIES

[9.51] One infantry unit may fire while mounted on a BMP or Marder IFV. Its maximum range is 1 hex. Execution of this mounted fire does not preclude the BMP/Marder itself from firing normally. However, the BMP/Marder may not move if the infantry unit has executed mounted fire during that Game-Turn. The infantry unit is considered to be inside the

BMP/Marder when executing mounted fire.

[9.52] One infantry unit may fire from a BTR-60 with unaffected range and attack strength. This mounted fire does not preclude the BTR-60 from firing normally. However, the BTR-60 may not move if the infantry has executed mounted fire during that Game-Turn. Infantry mounted on a BTR-60 fires from hatches and is therefore considered dismounted for defense considerations in the turn in which they fire only.

[9.53] One infantry platoon may fire while mounted on an M113 or FV432 (and all halftrack APCs) with its range and attack strength unaffected. This does not prevent the APC from also firing while the infantry execute mounted fire.

[9.54] Infantry conduct fire standing up (halftracks) or from hatches (M113/FV432); thus for defensive considerations the infantry are considered dismounted in the turn in which they fire only.

[9.55] In addition infantry may fire before the APC has moved. If they fire prior to the APC moving, their Attack Strength is halved. If the APC is stationary the Attack Strength is unaffected. Whether the APC is moving or not they are considered dismounted targets (soft) in the turn in which they fire only.

#### [9.6] TRANSPORT VEHICLES

Only truck, UH units (17.0) and APC units may be used to transport non-vehicle units. APCs are M113, F432, Marder, BMP, and BTR60 units.

#### [10.0] TERRAIN

**GENERAL RULE:** 

The terrain features printed on the map represent towns, roads and bridges, natural obstacles like rivers and streams, and wooded areas, and the very contour of the ground itself. All of this terrain affects the ability of a unit to move and fight to some degree. The exact effect of a given terrain feature on Movement and Combat is summarized on the Terrain Effects Chart.

Additionally, Terrain affects the ability of one unit to "see" another unit, which is treated in section 5.0 (Spotting).

#### [10.1] EFFECT ON MOVEMENT

[10.11] When a unit moves from hex to hex, it expends Movement Points from its Movement Allowance based on the Terrain "costs" of each hexside it crosses and each hex that it enters. These Terrain costs are summarized on the Terrain Effects Chart (10.4). These costs are cumulative and no unit may enter a hex if it lacks the Movement Points to pay both the cost of crossing the entry hexside and the hex itself.

[10.12] Most of the hexes and hexsides on the map are Clear Terrain, i.e., devoid of any terrain symbols, and cost one Movement Point to enter (two Points for trucks). A Clear Terrain hexside has no effect on Movement since its crossing cost is zero. Hexsides which are covered by woods, hilltop, swamp or town symbols have no additional effect on Movement since the Movement cost has been built into the woods or hilltop hex itself. The only hexsides which affect Movement are stream, river and crest and slope hexsides.

[10.13] For Movement purposes all units are divided into three classes: trucks, other vehicles (including APCs) and foot mobile units (those with a Movement Allowance of one), with terrain affecting the Movement of each class separately, according to the Terrain Effects Chart.

[10.14] Roads and Towns provide a unique exception to rule 10.11. When a unit moves in a path which coincides with the path of a road (or from town hex to town hex) we assume that the unit is benefitting from the road. Thus, when a unit enters a hex by traversing a hexside which is crossed by a road, the unit expends only the Terrain cost for crossing a road hexside (0.5 Movement Point), ignoring any other terrain on the hexside being crossed or in the hex being entered.

#### [10.2] EFFECT ON COMBAT

[10.21] Terrain affects Combat by reducing the Combat Results die roll number by the amount shown on the Terrain Effects Chart.

In general, woods or towns provide a -2 DRM, and being on a hilltop or behind a slope, crest, or railroad embankment is treated like a ridge/defilade at -3 DRM (as well as possibly allowing use of the Pull Back rule).

[10.22] Terrain has no effect on H-Class/Tight pattern Fire against Hard

Targets. Crest hexsides **never** affect any type of H-Class fire.

[10.23] Some Terrain features have no effect on Combat. Those which do are divided into affecting hexes (woods, town, hilltop) and affecting hexsides (slope and crest hexsides).

Affecting hexes benefit defending units because the terrain in them gives a solid increase in protection or shelter to the defending unit. Affecting **hexsides**, on the other hand, provide a partial defilade to defending units. Thus, we can say that affecting **hexes** provide a constant benefit to units defending in them, regardless of the direction of incoming fire, while affecting **hexsides** are directional and provide benefits only if the incoming fire intersects them.

[10.24] Crest hexsides benefit a defending unit which is on either side of the hexside; slope hexsides are uni-directional and only benefit a unit which is on the slope-splashed hex (see 10.3).

Terrain benefits are [10.25]not cumulative. If a defending unit is in a hex in which it could benefit from two or more terrain features. it simply benefits from whichever terrain feature has a greater effect on Combat. For example, a (Soft Target) unit is in a woods hex and is fired on through a common crest hexside by an M-Class unit. The defending unit would benefit from either the crest hexside or the presence of the woods. However, if it were fired on by an H Class unit, it would benefit from the woods hex since the crest hexside doesn't help against H Fire

# [10.3] SLOPES AND CREST HEXSIDES

There are two types of slanting-ground hexsides extant in this game. They are the slope hexside and the crest hexside.

[10.31] The slope hexside is distinguished by a heavy tinted line running along the hexside itself with contour splashes on only one flank of the hexside. The hex containing the contour splashes lies below the slope hexside and only a unit which resides in that contoured splashed hex benefits from the slope-hexside for Combat purposes. If the unit moves up the slope crossing the slope hexside to enter the adjacent hex, it must pay the cost of crossing the slope hexside (in addition to the cost of the hex itself).

By contrast, a unit which is adjacent to a slope hexside, but is in a hex devoid of contour splashes is considered to be above the slope. It does not benefit from the slope for Combat purposes NOR does it expend Movement Points to cross the slope hexside and move down into the adjacent hex.

[10.32] A crest hexside is distinguished by a heavy tinted line running along the hexside and by contour splashes in both flanking hexes. Both flanking hexes are considered to be below the crest hexside. A unit in either flanking hex benefits from the crest for Combat purposes and it must pay the cost for crossing the crest when it traverses the hexside.

[10.33] The contour splashes are a graphic aid to the Players. Their sole purpose is to illuminate the various slope and crest hexsides. There is, for example, no additional cost to move from one contour splashed hex to another, except if an intervening crest or slope is traversed. Nor is there any defensive advantage to a contour-splashed hex, except if the fire is received through a slope or crest hexside.

[10.34] The Players should note that all of the hill masses (one or more adjacent hilltop hexes) are defined on their perimeter by slope hexsides. Thus, any unit which enters a hill mass must pay for crossing a slope hexside and entering a hilltop hex.

[10.35] Treat hilltop hexes as level 2 terrain. If there is a discrete plateau area around the hilltop which is delineated by a continuous unbroken, second set of slope hexes away from the hilltop then that is level 1, and the rest is level 0.

To be more explicit, most hilltop hex/clusters on the game map have such a level 1 area around it (there may be another hilltop "knob" on the same "plateau") except the hilltop ridge from 4626 to 4827, the hilltop at 6103/04, and the two three-hex clusters around 0628 and 0825. Note that one hex each of the hilltops at Geiersberg (2326) and Glockenburg (2030) are on the edge of the plateau as well; the hexes directly south are level 0.

#### [10.4] TERRAIN EFFECTS CHART

(See separate sheet.)

# [11.0] IMPROVED POSITIONS [ENTRENCHMENTS]

**GENERAL RULE:** 

If in the initial deployment, a player is told to place his personnel units in improved position, all personnel units are said to be in Improved Positions. Such units benefit from the improved position so long as they remain in that hex. If a unit moves from its initial deployment hex it is no longer in improved position and may no longer assume that state. Players must keep track of which personnel units have moved (i.e., left their improved positions).

CASES:

# [11.1] WHO CAN USE IMPROVED POSITIONS

Only dismounted personnel and guns may benefit from improved positions. The presence of vehicles has no effect on Improved Positions, nor do vehicles benefit from Improved Positions.

# [11.2] BENEFITS OF IMPROVED POSITIONS

A unit in an Improved Position that neither moves nor fires may be observed only by an **adjacent** Enemy unit. If fired upon during the Direct Fire Phase, a unit in an Improved Position benefits as though it were in defilade. If the unit is already in defilade, it gains no further defense benefits from the Improved Position. If fired on during the Indirect Fire Phase, a unit in an Improved Position is treated as a Hard Target Type (and can "button up" (7.3).

### [11.3] DEPLOYMENT OF IMPROVED POSITIONS

Improved Positions may be deployed only at the start of a Scenario as per the scenario instructions. They may not be constructed during play.

#### [12.0] **OVERRUNS**

GENERAL RULE:

During the Movement Phase, a Player may move a Friendly unit into a hex containing an Enemy unit at no **additional** movement cost. When he does so, all other action is suspended and an Overrun Firefight is conducted according to the Overrun Procedure.

#### PROCEDURE:

To Overrun, a Player moves his unit into a hex containing an Enemy unit or units. There is no determination of Panic-Fire during Overrun. The range is 0 hexes. The Players roll a die for Fire Initiative. Each player rolls 1D6, and then adds 1/10th of the percentage Panic level (i.e., 1-5, and could be 0) to the roll, and the lower adjusted roll wins. On a tied roll the side with lower panic level wins.

**Example:** Germans with panic level of 10% (+1 DRM) are engaged in an Overrun firefight with a Soviet unit with a panic level of 30% (+3 DRM). The Germans roll a 4, the Soviet roll a 2. After the DRMs the adjusted rolls are both 5. Germans have lower panic level, so they fire first.

(**Note:** An Overrun situation is the **only** exception to the normal procedure for determining Fire Initiative as described in Case 4.2). Fire is then alternated until **all** units in the overrun hex have fired once.

If the Overrunning unit and at least one Enemy unit survive the fight, the Overrunning Player may either (1) move his Overrunning unit out of the hex at no additional movement cost, or (2) leave his unit in the hex. If he chooses the second option, another Overrun Firefight must take place immediately, repeating the same procedure. At the conclusion of this Overrun Firefight, second Overrunning Player must again choose to move out or remain in the hex. Inevitably, the Overrun hex will be vacated by the departure of the Overrunning units or the destruction of the units involved.

# [12.1] EFFECT OF TERRAIN ON OVERRUN

In an Overrun Firefight, terrain is completely ignored. (Exception: A unit in an Improved Position still benefits as though it were in defilade; otherwise, the prior positions of the engaged units, the presence of woods, villages, smoke, etc., are ignored).

### [12.2] EFFECT OF PRIOR FIRE ON OVERRUN

An Overrun is a special event. The units engaged in an Overrun situation are not affected by whether or not they have fired previously during the Game-Turn. A unit could conceivably fire during the Direct Fire Phase **or** Movement Phase and still **defend** with fire during an Overrun.

### [12.3] EFFECTS OF OPPORTUNITY FIRE ON OVERRUN

A unit must **be moving** to conduct an Overrun. It may therefore trigger Opportunity Fire on itself from Enemy units. Such Opportunity Fire is resolved **before** implementing the Overrun procedure.

#### [12.4] EFFECTS OF PANIC

There is no Panic Fire during an Overrun. A unit that Panic-Moves may not Overrun. If a panicked unit by chance scatters in the direction of an enemy unit and has enough movement points to enter the enemy hex, it ceases movement adjacent to the enemy hex. Panicked units that are Overrun may fire.

[12.5] At the end of a Game Turn, no units from opposing sides should be in the same hex.

### [13.0] PANIC [Command Control]

GENERAL RULE:

On every Game-Turn the units in a Player's force are exposed to Panic. That is, the Player may lose the ability to control a percentage of his units on every Game-Turn. The effects of Panic are meant to simulate the **real effects** on the battlefield of communications problems, misunderstood orders, human error and, sometimes, just plain physical fear, which result in units not doing what the command (the Player) has ordered (plotted). Panic is assessed randomly, so that a Player does not know either, how many, nor exactly which of his units will Panic.

### PROCEDURE:

Each Player is given a Panic Level in each Scenario. Immediately before firing or moving any unit (or, for ease of play, while rolling for fire) the Player must check for panic for that unit by rolling 1d10 and cross-indexing the current strength of the unit on the appropriate column of the Panic Table. If the number rolled is not one of those numbers specified, the unit may function normally. If the die roll is a result that is specified, the unit panics. Place a Panic Marker on a unit when it panics in any Phase.

Panic Markers are removed during the Panic and Suppression Removal Phase of each Game Turn by rolling 1d10 on the Panic Table for each unit affected and referring to the appropriate column.

CASES

#### [13.1] PANIC FIRE

A unit that panics while attempting to fire may neither fire **nor move** in that Game-Turn; it is in a state of **panic-fire.** 

[13.11] A unit that panics while attempting to fire and fails to remove the panic during the Panic and Suppression Removal Phase of that Game-Turn must panic-move during all succeeding Game-Turns until the Panic Marker is eliminated (see 13.2).

[13.12] Panic is determined for each individual unit separately each time it attempts to fire (Exception: see Overrun, 12.0).

#### [13.2] PANIC MOVEMENT

A unit that panics while attempting to move **panic moves.** This condition is reflected by rolling a die and consulting the scatter diagram on the map. This diagram indicates the direction in which the unit must move. If the unit is dismounted infantry, the unit moves one hex in the indicated direction. If the unit is a vehicle, the die is rolled again, and the unit moves that number of movement points in the scatter direction up to but not exceeding its movement allowance.

[13.21] Units that panic while attempting to fire (panic-fire) and fail to remove the panic during the removal phase of that Game-Turn must panic move on all succeeding Game-Turns until the Panic Marker is removed.

[13.22] Units that panic-move and fail to remove the panic during the removal phase of the Game-Turn must panic-move on succeeding Game-Turns until the Panic Marker is removed.

[13.23] A unit that panic-moves while attempting an Overrun may not overrun. Once the Overrunning unit has reached the Overrun hex, panic **is not** determined for the attacking or defending units prior to resolving the Overrun (see 12.4).

### [14.0] OFF-BOARD ARTILLERY

GENERAL RULE:

In most Scenarios, both Players are given an Off-Board Artillery capability, which simulates the availability of artillery or rocket or mortar batteries located someplace other than the map, to fire at the Enemy targets located on the map.

#### PROCEDURE:

Off-Board Artillery is available in terms of "concentrations" of H Attack Strength Points. The Scenario Order of Battle will state that a Player has, for example, "3 concentrations of 7 H Points each" [abbreviated to read: OFBDA—3(7H)).

CASES:

### [14.1] USE OF OFF-BOARD ARTILLERY

[14.11] Off-Board Artillery Fire is always Indirect Fire. It is H-Class Fire, and the Firing Player should indicate Tight or Loose Pattern. H is susceptible, as such, to Scatter (see 7.17).

[14.12] Having a concentration of 7H Points is exactly the same as having a unit with an Attack Strength of 7H Points, except that the artillery is Off Board Artillery. Each concentration may be used once each Game-Turn.

[14.13] Off-Board Artillery can reach any target on the map (unlimited range), but it may not be fired at an Unspotted target hex, unless specifically permitted in the Scenario Instructions.

[14.14] Off-Board Artillery Fire is plotted during the final step of the Indirect Fire Phase of the Game-Turn, and impacts (after target-hex Scatter) during the Indirect Fire Phase of the following Game-Turn. The Plot should read "OFBDA—hex #1234-7H" for example.

# [14.2] OFF-BOARD ARTILLERY RESTRICTIONS

[14.21] The Points in a "concentration" may not be apportioned against several targets, just as the fire of an individual unit may not be apportioned against several targets in a single Game-Turn.

[14.22] Assuming a Player has more than one "concentration" available, he may fire several "concentrations" at the same target hex or different target hexes on the same Game-Turn, but each concentration is treated as a separate attack.

[14.23] Off-Board Artillery may not be used for counterbattery fire.

[14.24] Off-Board Artillery may not be fired at.

#### [14.3] U.S. OFF-BOARD ARTILLERY

[14.31] The U.S. Player (in his role as a battalion or task force commander) could theoretically look for the support of up to eighteen batteries if his need was great enough and the target was lucrative enough. Given an H Attack Strength of 7 to either a 6-gun 155 battery or a 4-gun 8" battery, this would give him as many as 18(7H) concentrations when necessary.

[14.32] Each Scenario will state the minimum number of 7 H Attack Strength Point concentrations the American Player will have on each Game-Turn. It will also state the number of turns on which he is allowed to apply additional multiples of this minimum. The exact multiples will be determined randomly through use of the die.

[14.33] Before plotting his Indirect Fire (7.11), the American Player may attempt to multiply his Off-Board Artillery support. He informs the Soviet Player of this desire and proceeds to roll the die, concealing the result from the Soviet Player. Whatever number he has rolled represents the multiple of Off-Board Artillery fires he is allowed to plot for arrival in the next turn's Indirect Fire phase.

EXAMPLE: In Scenario 21.2, the American Player is given a minimum of 3 x 7H concentrations per turn. He is permitted to apply multiples on any three Game-Turns of his choice. Assume that on Game-Turn 2 he decides to attempt a multiple. He rolls the die with a three resulting. He can now plot (3x3) 9(7H) concentrations for impact in the Game Turn 3 Indirect Fire phase. The die roll is not revealed until the beginning of the Game Turn 3 Indirect Fire phase.

[14.34] The scenario states on how many Game-Turns the American is allowed to multiply his Off-Board Artillery. He rolls the die once each turn that he decides to plot a multiple fire. A result of 1 means that he has failed to multiply his artillery, but still counts as the use of one of his multiples.

### [15.0] CLOSE AIR SUPPORT

GENERAL RULE:

Either Player is sometimes given Close Air Support. This is given in terms of "strikes". Each strike is a certain weight of H attack Strength Points. Each "strike" is applied just as though it were an Off-Board Artillery concentration, except for a different Scatter pattern.

#### PROCEDURE:

During the Indirect Fire Phase, the appropriate Player allocates a Close Air Support Strike to a target hex. During the Indirect Fire Phase the Close Air Support Scatter will be implemented, the actual impact hexes of each strike determined, and the strike executed just as though it were an Indirect Fire Attack.

#### CASES:

## [15.1] CLOSE AIR SUPPORT SCATTER

A Close Air Support Strike scatters in the following fashion: Roll the die. If the roll is a one or two, the strike impacts on the target hex. If the roll is a three, four, five or six, the strike scatters, in which case the die is rolled once more to determine the direction of Scatter (see 7.17). The strike, if it scatters, scatters one hex.

### [15.2] APPLICATION OF CLOSE AIR SUPPORT

[15.21] A Close Air Support Strike is always a Tight Pattern H Attack affecting only the hex it impacts on.

[15.22] Each strike must be used as single unitary value. A single Strike may not be apportioned against several target hexes.

[15.23] The weight of each Close Air Support Strike will be given in the Order of Battle. For example, CAS—3(5H) means Close Air Support available is three strikes each of 5 H Attack Strength Points.

[15.24] Armored vehicles may not button up when being attacked by Close Air Support; they are attacked on the +8 column of the D2 CRT.

#### [16.0] MINES



GENERAL RULE:

In certain Scenarios, one Player or the other is allowed to deploy mines in order to impede the movement of units and to inflict damage on units. When a Player has deployed mines in a hex, it is called a

mined hex. A mined hex is presumed to contain both anti-vehicular mines and antipersonnel mines. There are three types of mined hexes: hasty, preventive, and defensive, corresponding to a rising density of mines within the hex and an increasing probability of inflicting damage.

#### PROCEDURE:

The Scenario will state which Player has mines to deploy in terms of a number of mined hexes and the type of mined hexes. This Player, while both Players are deploying and setting-up their regular units, shall select which hexes on the map he deems to be mined. He shall secretly note the numbers of the mined hexes and type of mined hexes. Thereafter, in the course of play, whenever a unit (from either side) enters or leaves a mined hex, an immediate Mine Attack shall be executed against that unit, any result applied immediately, and a Mined Hex Marker is placed in that hex.

#### CASES:

#### [16.1] MINE ATTACKS

[16.11] A Mine Attack is executed against any unit. no matter what its Defense Strength or Target Type, just as though the unit were fired upon by a weapon. Mines have a certain Net Attack Superiority on the Combat Results Table, according to the type of Minefield. regardless of the Type of unit in the hex.

- 1. Hasty Mined Hex: Attacks a unit at -2 Net Attack Superiority.
- 2. Preventative Mined Hex: Attacks at +1 Net Attack Superiority.
- 3. Defensive Mined Hex: Attacks at +7 Net Attack Superiority.

The Preventative and Defensive Minefield types are not called for in the Scenarios, but Players may make use of them in creating their own scenarios.

[16.12] All considerations of Terrain, Defense Strength and Target Type are ignored when executing a Mine Attack. The Player whose mined hex it is simply announces that a unit is attempting to enter or attempting to leave a mined hex, rolls the die, and reads the result from the appropriate column of the Combat Results Table. This means that the strongest and weakest units are equally vulnerable to mines.

[16.13] Whenever a unit enters a mined hex, it must immediately cease all further movement in that Game-Turn, regardless of whether the Mine Attack successfully affects it. It must cease movement within the mined hex. (Exception: see 16.15 for treatment of Overruns.)

[16.14] Whenever a Player desires a unit to leave a mined hex, he announces this fact and a Mine Attack is executed on the unit. No matter what the result of the attack, the unit is permitted to exit the mined hex. Any Pin or Disruption Results are assessed in a hex adjacent to the mined hex, which the Owning Player moves the unit to.

[16.15] Whenever a unit Overruns through a mined hex, it undergoes a mine attack when it enters the hex and again when it leaves the hex.

[16.16] Mines attack Friend and Foe alike. In his initial deployment, a Player may elect to place Friendly units in mined hexes. If and when he chooses to move those units out of the mined hexes, they must suffer Mine Attacks.

#### [17.0] HELICOPTERS

GENERAL RULE:

Helicopters are exceptional types of units with unusual rules regarding their Combat and Movement. VH is a generic term describing any helicopters.

CASES:

#### [17.1] **MOVEMENT**

[17.11] All VH units ignore all Terrain costs when moving. A VH unit expends one Movement Point from its Movement Allowance for each hex that it enters, regardless of the terrain in the hexside crossed or the terrain in the hex entered.

[17.12] A VH unit may freely enter and exit a hex containing any other unit(s)—Friendly or Enemy—except a hex containing another VH unit. They may stack with ground units at the end of a Game-Turn. By the same token, ground units may ignore the presence of helicopters for Movement and Stacking purposes.

[17.13] Helicopter units may be of two types: those bearing a UH designation may be used to transport infantry and engineer units. AH units may not transport.

[17.14] VH units are presumed always to be in the air, except a UH helicopter in the act of Mounting or Dismounting. Such a unit is presumed to be on the ground: therefore, a UH unit may not Mount or Dismount a unit which is in a forest or city hex.

#### [17.2] COMBAT

[17.21] VH units may attack Enemy units using their respective weapons, according to the normal Combat Rules.

[17.22] For purposes of firing at an Enemy unit, a VH unit is considered capable of elevating itself to a height which allows it to see over woods hexes, town hexes, and slope and crest hexsides which would normally block Line of Sight/ Line of Fire. Thus, when the Enemy target unit is in clear terrain, the VH is exempt from Line of Sight restrictions. A target which is located within a town or woods hex such that the VH unit's LOS passes through an adjacent woods or town hexside cannot be fired at by a VH unit.

[17.23] A VH unit can always fire at a unit which it is stacked on top of or adjacent to. When firing at a unit it is stacked with, the range is considered to be one hex.

[17.24] A unit which is being fired at by a VH unit loses any benefit for being behind a slope or crest hex side and retains any benefit for being in a woods or town hex.

[17.25] VH units are subject to Ammunition Depletion in the same fashion that G-Class units are (see 6.27).

#### [17.3] FLAK UNITS AND ANTI-HELICOPTER FIRE

Helicopters are subject to being fired at according to the following special rules. This is in effect a special combat relationship, except that the normal Combat Results Table is used to determine the outcome of anti-helicopter fire.

[17.31] FLAK STRENGTH / RANGE ATTENUATION TABLE

Range in Hexe
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Unit	0–2	3–5	6–10	11–20
Z23	16	14	12	10
T55	8	6	0	0
T62	10	8	0	0
M60	12	9	0	0
Inf Coy	12	10	0	0
Inf Plt	8	6	0	0
Others	8	0	0	0

Explanation: Simply establish the range between the firing unit and the target VH unit. Cross reference the range with the identity of the Firing unit and read the Attack Strength of the Firing unit.

After establishing the Attack Strength of the Firing unit, simply subtract the Defense Strength of the Target VH to establish the Net Attack Superiority. Roll the die. Do not adjust for terrain.

### [17.32] Effect of Terrain

A VH unit never receives a die roll benefit for terrain. However, a VH unit which is itself not firing may not be fired at if the LOS passes through any blocking terrain, unless the Firing unit is adjacent to the VH. Conversely, if a VH unit is firing it is presumed to have elevated itself above blocking terrain, thus exposing itself in turn to fire. See Pull Back, 6.10.

#### [17.33] Flak Units

The Soviets have the Z23 flak unit (R\* Class). In addition to their obvious role in attacking helicopters, they may be used to attack ground targets.

## [17.34] Effect or Combat Results on VH Units

In assessing Combat Results of an attack on a VH unit, any Panic prime results are ignored. A VH unit is only affected by a D1, D2 or D3 Result.

#### [18.0] **SMOKE**

GENERAL RULE:

All H-Class units which are capable of Indirect Fire, and Off-Board Artillery and Close Air Support, are capable of firing Smoke instead of explosives. Firing Smoke is handled just as though the Player was firing HE, except that he adds an S notation to his Fire Plot. The effect

of Smoke is to block the Line of Sight. A unit firing Smoke may perform no other Task that Game-Turn.

#### PROCEDURE:

The Player allocates his Smoke Fire to a specific target hex. It is treated as Indirect Fire, which means it may or may not Scatter to a different Impact Hex. The Player places an upside down marker (any marker) on this hex. The marker remains on the map, marking the Smoke Hex until the beginning of the next Indirect Fire Phase, when it is removed.

#### CASES:

#### [18.1] LINE OF SIGHT EFFECTS

[18.11) Smoke is treated in all ways like a woods hex. No unit may trace an LOS through a Smoke Hex (one with a Smoke marker in it). Thus, for purposes of plotting and executing fire, Smoke blocks fire. Helicopters may rise above the Smoke (see 17.22).

[18.12] If a target unit is in a Smoke hex it may be fired at. Subtract three from the die roll for all R-, G- and M-Class attacks. Smoke in the target hex does not affect an H-Class attack.

#### [18.2] PERSISTENCE OF SMOKE

[18.21] Smoke persists for one full Game-Turn. If a Player wishes to maintain a Smoke screen he must continue to fire Smoke. Smoke is always fired and created in the Indirect Fire Phase of a Game-Turn. This holds even if the firing unit is capable of firing Direct Fire at the hex.

[18,22] No matter what the size of the Smoke firing unit, a Smoke Attack creates only one Smoke hex. Thus, for purposes of firing Smoke, a weak H-Class unit is as effective as a strong H-Class unit.

# [19.0] OTHER OPTIONAL AND EXPERIMENTAL RULES

#### [19.1] **PLOTTING**

NOTE: This is the Plotting procedure from MechWar '77 as published. It is included here for ease of reference should players wish to retain or experiment with this aspect of the original game system, either in part or whole. To integrate Plotting into the MechWar '78 Sequence of Play, it is conducted during a Mutual Plot Phase which precedes the Direct Fire Phase each turn.

During the Mutual Plot Phase both Players simultaneously plot the intended actions of their units for that Game-Turn.

#### PROCEDURE

The Plot is written on a piece of scratch paper, called the Plot Sheet. The detail required for each unit's plot varies, depending upon the action intended for the unit. Six different plots are possible.

Every unit has a unique Identity Number on it. Every hex on the map also has a unique Identity Number. To Plot, you simply note the Identity Number of your unit and the Task Code describing the action (Task) you intend for this unit.

If the action intended is a Combat Task. then the target hex of this activity must be identified by its hex number (exception: Counterbattery). That is, you must write down who is going to shoot at whom. If, on the other hand, the action intended is simply one of Movement, then you just identify which units are going to move. You do not need to plot a path or course of movement, or destination. [NOTE: disregarding the requirement to identify a target hex for Direct and **Opportunity Fire eases play** considerably.] Mounting, Dismounting and Overruns are specialized forms of Movement and are plotted as Movement. The Player need not indicate beforehand which of his moving units shall engage in these Tasks.

If you intend that a unit do nothing active during the Game Turn, simply leave it off the Plot Sheet. Each unit may have only one Task Code plotted per Game-Turn.

#### CASES:

# [19.11] SIMULTANEITY OF COMBAT

All Fire (Combat) is considered simultaneous. Postpone the application of all Combat Results until all fire of every kind in the Phase is completed. Thus, a Friendly unit may fire at an Enemy unit and the result of that fire will not prevent the Enemy unit from firing in that Phase (assuming that it had been plotted to fire). Each unit may only plot one target hex per Game-Turn.

#### [19.12] MOVEMENT IN SEQUENCE

Movement must be planned in advance only to the extent that a Player identifies which of his units he intends to move. The execution of Movement is sequential. One Player moves all his units that he has plotted to move. Then the second Player moves his units. For game purposes, this movement is not considered to be simultaneous. The movement of the first Player's units is final and cannot be changed.

### [19.13] PLANNING TASKS IN ADVANCE

A Task is defined as a specific, unique action which a unit may undertake during a Game-Turn. A given unit may perform one and only one Task during a given Game-Turn. Case 5.4 lists all the Tasks which may be performed in a Game-Turn and gives a simple code for each Task. All Tasks must be plotted in advance during the Mutual Plot Phase of the Game-Turn in which the Task is to be executed. No unit may perform a Task unless that unit was plotted to perform that Task.

#### [19.14] TASK SUMMARY

# Task Code Description MV Movement: The a

MV Movement: The act of physically moving a unit from one hex on the map to another hex. This term and code also cover Mounting, Dismounting, and Overrunning.

**DF** Direct Fire: The act of firing along a direct line of sight, to a specific Enemy target.

IF Indirect Fire: The act of firing at some hex to which the firing unit cannot trace a Line of Sight.

OF Opportunity Fire: The act of laying down a line of tire in anticipation that some Enemy unit shall enter, and trigger that fire.

**CA** Close Assault: A variation of Direct Fire.

**CB** Counterbattery Fire: A variation of Opportunity Fire.

# [19.2] COUNTERBATTERY MEASURES

As an alternative to rules 14.23 and 14.24, Off-Board Artillery and CAS may conduct Counterbattery fire.

PROCEDURE:

Off-Board Artillery and CAS can be assigned a Counterbattery mission against enemy Off-Board Artillery, as well as onmap artillery, effective the following turn. This requires record keeping as to the damage/suppression state of the off-board units.

#### CASES:

[19.21] All Off-Board Artillery "concentrations" are considered Soft Targets, with the exceptions of NATO M109 (SP 155mm providing 7H concentrations) and BAOR FV433 Abbot units, which are considered Protected Targets. Note that where a US/NATO player has  $\leq$  3 x 7H OBA fires in a scenario, they are all considered to be M109/Abbot batteries. For each that is available beyond 3 x 7H OBA fires (including by US fires multiplication), the fourth, eighth, etc, OBA concentration is coming from M107/M110/towed FH-70 systems and is a Soft Target.

[19.22] A Spotted off-map unit can be given a "move order" in the plotting phase, so that it can displace and become un-Spotted instead of firing. It becomes available again after 3 turns.

[19.23] Where the US player multiplies his fires per 14.33, and some batteries are hit by Counterbattery fire, then when the US player reverts to his usual allocation of OBA (and before any further multiplication roll) the worst affected batteries are the ones available going forward.

#### [19.3] SHORT HALT FIRE

Short Halt fire is a type of Opportunity Fire conducted during the Movement phase by a moving tank with effective gun stabilisation.

[19.31] To conduct Short Halt fire, a moving unit (which has not fired before during the turn) can:

- (a) at the cost of 2 MPs, halt (or at least slow down) and fire at a target that has come into sight during its move.
- (b) at the cost of 2 MPs, execute a return fire attack by a unit that fires at it using Opportunity Fire, before that unit can "pull back" into cover.

In either case, there is a -2 DRM on Short Halt fire, meaning it has a 1/3 chance of missing, in addition to terrain effects reductions to the combat die roll.

### [19.4] FASCAM ROUNDS

NATO Off-Board Artillery may, in some scenarios, be provided with a limited amount of FASCAM rounds.

#### CASES

[19.41] One battery FASCAM fire onto a hex creates a Hasty minefield on the hex.

[19.42] FASCAM is always Tight Pattern, and may scatter.

[19.43] If more than one FASCAM fire impacts the same hex, add +2 to the attack differential for each such fire; so if three FASCAM fires hit a road junction there is a minefield which attacks (both sides) at +2.

# [20.0] HOW TO SET UP AND PLAY THE GAME

#### [20.1] SCENARIOS

As stated in the Introduction, the game is played by Scenarios. Each Scenario is from six to twenty Game-Turns in length and the number of units per side varies with the Scenario. A Scenario is a game in itself and the term Scenario and game are used interchangeably. Each Scenario listing contains a historical note which relates the Scenario to the actual event which is being simulated, an Order of Battle for each Player, and other instructions relating to the length of the Scenario, initial deployment of forces and later reinforcements, Victory Conditions and special rules pertaining to that Scenario.

### [20.2] **SETTING UP**

The Players must first decide between themselves who is going to play which side. Then they must decide what Scenario to play. Once they have decided which Scenario to play, that Scenario becomes the game. (Note that Scenarios do not link together.) Next they must spread out the map and seat themselves around the map, and select their respective forces from the counter mix according to the Scenario Instructions, deploying these forces on (or about to enter) the map in

accordance with the Scenario Instructions. After this, they may begin the first Game-Turn.

### [20.3] ORDERS OF BATTLE

Each Player is given an Order of Battle under the listing of the side he has chosen. This Order of Battle lists each playing piece by unit code and the number of that type unit; 3(Inf) means three infantry units, 5(Lprd) means five platoons of Leopard tanks. This Order of Battle is further broken down (when necessary) initial starting forces and reinforcements, which are also broken down (when necessary) if the forces are deployed in different areas of the map or if they arrive at different times or entry points.

#### [20.4] DEPLOYMENT

A Player's initial forces (those units he begins the first Game-Turn with) are placed according to the Instructions in the Scenario being played. Usually these forces are either placed physically on the map surface itself (Initial Deployment on Map) or are adjacent to the map surface for entry onto the map on the first or succeeding Game-Turns.

#### [20.41] Initial Deployment on the Map

When a Player is instructed to deploy certain units (collectively described as a "force") on the map, he is normally told to deploy them within a certain area (deployment area) which is bounded by one or more map edges and lines drawn (hypothetically) between hexes on the hex grid or along hex rows. (Note the compass rose on the map. indicating North, East, etc.) Thus, if a force is required to deploy "South of the line hex 0119 through hex 3134, inclusive" it means that the Owning Player would deploy the units anywhere in the Southwestern corner of the map, including and below (south of) the line of hexes 0119, 0219, 0320, 0420, 0521... 2832, 2933, 3033, 3134. Occasionally, a deployment area will correspond to a complete terrain feature. The Owning Player has freedom to place his units as he sees fit, within the deployment area, subject to the normal Terrain and Stacking Restrictions.

### [20.42] Initial Deployment Off the Map

When the Deployment Instructions state that a force is to enter the map on Game-Turn One, they mean that the force is positioned adjacent to the map so that it might enter the map on the Movement Phase of the first Game-Turn. The Deployment Instructions will indicate whether or not the force is to enter the map in a column formation (one unit behind the other, each entering Successively into the same hex, see 20.61) or whether the force can enter in a free formation (each unit entering onto one hex of a row of hexes or of an entire map edge, see 20.66). In either case, the units composing the entering force must be prepositioned in the order of formation in which they will enter the map.

#### [20.43] Secret Deployment

When using restricted Player knowledge and inverted counters (see 11.5), the Players always place their units facedown. The First Player always deploys first (unless stated otherwise) and his Player-Turn is always the first in each GameTurn. The First Player is defined in each Scenario.

#### [20.5] VICTORY CONDITIONS

These are used to determine the winner at the end of the game. They usually state either a geographical objective, or explain how to gain Victory Points. When Victory Points are itemized in the Victory Conditions, the Player with the greater number of Victory Points at the end of the game wins. When the Victory Conditions refer to "combat units" they mean any unit with an Attack Strength (not trucks or APCs). When the Victory Conditions mention a town, they refer to all of the town hexes composing the town. When a unit is exited off the map in fulfillment of Victory Conditions, it must pay the Movement Point cost for the hypothetical hex it is presumed to be entering upon leaving the map. The terrain in the hypothetical hex is arbitrarily identical to that in the exit hex. Victory is evaluated at the conclusion of the final Game-Turn in the Scenario.

# [20.51] Victory Points for Units Destroyed

When the Victory Conditions state that a Player receives points for every destroyed Enemy unit, the number of points which the Players receive is determined as follows: Total the Attack Strength, Defense Strength and Movement Allowance of the destroyed unit. This is the number of Victory Points received for destroying that unit. Example: If the U.S. Player destroys a Soviet T62 Tank

Company, he receives 35 Victory Points (19+ 10 + 6). For Dual Class weapons destroyed, ignore their G-Class Attack Strength. For G-Class weapons without Dual Class identity, which are depleted and removed from the map, no Victory Points are received (keep such units separate from units destroyed in combat).

#### [20.6] REINFORCEMENTS

Scenario Instructions may state that units enter the map "in column" or "in free formation".

[20.61] Entry in column is accomplished as follows: The units are deployed off map, one behind the other, with the lead unit poised adjacent to the map entry hex listed. If the entry hex is a road hex, a hypothetical road may be presumed to stretch off the map, away from the entry hex.

[20.62] As each unit enters the map, it will pay the cost for entering the entry hex plus the additional cost for any hypothetical clear terrain hexes that it would have to traverse to reach the entry hex. If units are entering on a road hex, they are considered to be moving through hypothetical road hexes until they reach the map. Example: The lead unit in the column would pay 0.5 Movement Point to enter the map, the second would pay 1 Movement Point to enter the map, the third 1.5 Movement Points, etc.

[20.63] Once the Players have composed their columns, they may not alter the positions of units in the columns to change the order in which units reach the map.

[20.64] Given the number of units in some Scenarios, often it will not be possible to enter all units onto the map during the first Game-Turn that they are available. Units which cannot enter on the first Game-Turn of availability simply enter on the second Game-Turn in column order. Units which are off map are out of play for all game purposes except, of course, to be moved along in sequence in order to eventually reach the map.

[20.65] Once a unit enters the map, it may be moved freely with no restrictions as to formation.

[20.66] When not stated otherwise, units may be brought on to the map in any formation the Player wishes; in one column, multiple columns, one unit per entry hex, or any combination. The Player

may use as many entry hexes as he wishes; however, if more than one unit enters the map through the same hex, then the units which do so are presumed to have entered in column and must follow the procedure for entry in column, above.

[20.67] Reinforcements may be brought on to the map in Mounted condition, at the Player's option, when vehicles are provided.

[20.68] If a unit's assigned entry hex is occupied by an Enemy unit, it must enter on the nearest non-Enemy hex.

# [21.0] SCENARIOS—NATO and Warsaw Pact

(See original rules)

# [22.0] SCENARIOS—Middle and Far East

(See original rules)

#### [23.0] **GAME NOTES**

A simultaneous system (even one as simple as Mech War's) requires a ruthless paring of the numbers of units under each Player's hand. This is a design-development criteria which can vield some interesting results. In this game it led to dual class units and the ammunition depletion system. Units which employ the modern ATGM systems differ in size and mission. The Soviet BRDM units and the US M150 are purely tank-hunters with essentially no combat role except that of anti-armor. The Soviet BMP and US infantry platoon, on the other hand, have a powerful anti-tank capability, in addition to other important values. All units employing the ATGMs suffer to one degree or another from a limitation in ammunition. There are just so many rounds of TOW, Dragon or Snapper that a unit or vehicle can carry. For example, the Dragon round weighs some 15 to 20 pounds and the AT section of a platoon might carry some fifteen to twenty rounds into action. Assuming good conditions these would be sufficient to destroy over a dozen tanks. Now the army has provided for resupply in the form of an NCO who drives around in a modified dune buggy dropping off extra Dragons "as needed." We could have instituted a system with a finite number of fires per infantry platoon and with a resupply counter moving around the map rejuvenating exhausted platoons. In fact, we tried this briefly and it was messy. It was also unrealistic. The Player is the Task Force commander. His job is to deploy those units he could reasonably expect to control. He should expect that the resupply of his missile firing units will not necessarily correspond to tactical needs. In other words, his infantry platoons will run out of Dragons at the most inconvenient times and there is nothing he can do about it.

The US infantry platoon is also an illustration of the dual-class concept. Armed with the normal infantry complement of rifles, MGs, grenade launchers and LAWs (a small one-shot bazooka) the platoon is a considerable combat force in its own right. It also controls an AT section of three Dragon teams (ten men). Originally, we had one unit representing the platoon. This unit had two Attack Strengths; an R and a G Class Strength. It was impossible to keep track of which platoons had depleted their

Dragons. It was also impossible to read the counter. If the M150 unit runs out of TOWs, it is simplest to remove it from the map. It has no other combat value except its TOW system, and, unarmed, it has no essential Victory Value. (The removal simulates the crews running for the rear. Presumably they would eventually find a resupply of TOWs, but not within the time limits of the scenario.) However, it would be manifestly unfair to remove an infantry platoon because it ran out of Dragons. It has other important values and roles besides anti-tank. One solution was to have a separate Dragon section counter. However, this would increase the number of units in play at any one time. It also would lead to the Player maneuvering his AT section independently of his platoons (in fact, present doctrine calls for limited employment of the Dragon in independent tank ambushes); taking advantage of Player knowledge of the situation and seriously distorting the simulation. Playtesting showed that the infantry platoon was usually involved in a long range anti-tank battle which more often than not would exhaust its G Class Strength long before it would use its R Class Strength. In those situations when a platoon had occasion to use its R Class Strength and it was still represented by the G Class counter, no tester had any problem making the mental switch.

Soviet infantry is not given a G Class capability. We felt that the Sagger ATGM with which the Soviet company is equipped would operate from the BMP units rather than the dismounted infantry company, at least in the scenarios depicted. Since the Soviet infantry unit is company sized, it has been given a two-hex close assault range, which simulates both the greater range of the Soviet RPG-7 rocket versus the US LAW and the fact that the company overflows the 200 meter hex.

Soviet Artillery has been treated differently than US Artillery. It is handled in terms of a fixed amount of support per Game-Turn. Frankly, this level of support is our best guess of what the Soviets will be able to deploy in a forward mobile situation. Presently the vast bulk of their artillery assets are towed pieces and their doctrine envisions artillery battalions used in dedicated support of specific front line formations, with a lesser capability of switching fire than US artillery. If and when the Soviets acquire self-propelled

artillery, and beef up their communications and logistical tail, their capability will rise to US levels. This is not to belittle the Soviet artillery. There is no set piece assault or set piece Soviet defense scenario; a situation in which the weight of Soviet artillery would be paralysing.

The rules for Smoke are a subtle compromise between too much and too little. Both the Soviets and the NATO forces rely heavily on smoke, particularly to shield armored units from ATGM fire. In fact, if smoke is used as liberally as doctrine calls for. West Germany will be covered by one large white cloud. Some early playtesting used extensive Smoke Rules and effects. It was a lot of fun. The Players would spend one hour per Turn playing meteorologist, moving smoke screens around the map and generally having a great time. In the interests of playability the role of Smoke is deliberately down-played. We assumed that the battle would be a smoky affair and built general smoke effects into such things as Panic and Range Attenuation. If Players wish to increase Smoke effects to a level they think is reasonable, they can extend the effects of Smoke to include the six hexes adjacent to the smoked hex. There are no dummy or smoke markers in the counter mix, but face-down Pin or Disruption Markers perform the function admirably.

Another compromise between playability and reality is the prohibition against Most Armored mounted combat. Personnel Carriers being built or designed today are providing vision blocks and firing ports for the infantry passengers. Some of these designs are quite good (the German Marder, the proposed MICV) and would appear to allow part of an infantry squad's firearms to be used from inside the vehicle, particularly for area fire. Be that as it may, infantry cannot really fight from inside vehicles. It cannot employ grenade launchers, MGs, mortars, etc., when everybody is buttoned up. It cannot engage entrenched, dug-in opponents, or winkle them out of buildings, etc. Therefore, we arbitrarily state infantry cannot fight mounted. Not because it can't in reality, but because its effect would be minimal, compared to dismounted infantry, and would introduce a needless complication. For those who are adamant about mounted combat, we offer this informal rule: "Infantry can fire

while mounted. When it does so its Attack Strength is halved prior to Range Attenuation."

To those who wish to allow infantry to ride around on tanks, we say fine, go ahead and allow it. Just treat the infantry unit as a Soft Target when the tank is fired at

One of the newer weapons systems in the NATO arsenal is the "instant minefield" which will be implanted by means of artillery, rockets, or air (both fixed wing and helicopter). The means of delivery will be a projectile which will split up into several "minelets," each capable of disabling a tank track. There is no provision for such a system in the game, an Off-Board Artillerv concentration is allowed to create a Hasty Mined Hex it would probably come close to the proper effect. "Smart" artillery shells are another system being developed. These are steerable projectiles which zero in on a target which has been "painted" by a laser beam designator. Presumably an FO would not only call for artillery, but would also insure that each shell was a direct hit. Players may wish to experiment with the implications of this system by eliminating Scatter from the Indirect Fire sequence. (It is reasonable to suppose that the Soviets are developing a similar system.)

One final note from the developer: Make up your own scenarios. It can work like this: Each Player assigns a geographical objective to his opponent, giving it a point value of, say, fifty to a hundred fifty points. He does this secretly. Then each Player creates his own Order of Battle and Reinforcements Schedule. A time limit of between twelve and twenty-four Game-Turns is selected in some random fashion. Off-Board Artillery and Air Support are mutually agreed upon (be reasonable). Then the geographical objectives and values are revealed. Play proceeds. At the final tally, each Player receives points for destroyed Enemy units and for seizing the assigned objective. If the total value of his units which he has committed to the battle exceeds the value of his objective (whether or not he took it), the excess is subtracted from his final Victory Point total. If the total unit value is less than the objective, then he adds the difference to his final Victory total. This balancing procedure will insure that a Player doesn't

automatically throw his entire counter mix into every scenario.

Oh yes, the British and West German units are there for the fun of it.

### [24.0] **APPENDIX**:

#### SUMMARY OF UNIT TYPES

### 14 G 8 6 3 1

#### UNITED STATES

Infantry Platoon (101-109)
Forty-seven men, 10 MG, 3
DRAGON ATGM teams.



Infantry Platoon (R) (101-109)
Forty-seven men DRAGON ammunition exhausted.



Self-Prop. Mortar Platoon (201-203) Three M125's, 81mm Mortar mounted on M113 carrier.



Self-Prop. Hvy. Mortar Platoon (211) Four M106's, 4.2" mortar mounted on M113.



Main Battle Tank Platoon (301-307) Five M60A3 tanks, 49 tons, 105mm gun.



Self-Prop. ATGM Section (401-409) Two M150's, TOW ATGM mounted on M113.



Combat Recon Platoon (501-508) Six M551 Sheridans, 15 tons, 152mm hybrid gun; one M106, one M113 and infantry squad.



Scout Platoon (511-512) Six M114 armored tracked reconvehicles, 7 tons.



APC Section (601-609) Four or five M113 APC's, 11 tons, 1-2 MG's.



Attack Helicopter Platoon (701-705) Seven Huey Cobra attack helicopters armed with MG, rockets, and TOW.



Air Transport Platoon (711-716) Four or five Iroquois helicopters.



Aeroscout Section (721-724)
Three Kiowa observation helicopters.

#### WEST GERMAN



Infantry Platoon (G) (111-113) Fifty men with Milan ATGM systems.



Infantry Platoon (R) (111-113) Fifty men with Milan exhausted.



Heavy Mortar Detachment (221) Four 120mm mortars mounted on M113 APC's.



Main Battle Tank Platoon (311-316) Five Leopard tanks, 40 tons, 105mm gun.



Tank Destroyer Platoon (411)
Four self-propelled turretless 90mm
AT guns, 26 tons.



Tank Hunter Platoon (421) Four jeep mounted COBRA ATGM systems.



Tank Hunter Platoon (431) Five HOT ATGM systems mounted on APC's.



Armored Personnel Carrier (611-613) Four or five Marder Armored Personnel Carriers.

#### ISRAELI



Infantry Platoon (141-146) Forty men, 6 MG.



Heavy Mortar Section (231-232) Four 120mm mortars mounted on APC's.



Medium Tank Platoon (341-347) Five modified M48 tanks, 46 tons, 105mm gun.



APC Detachment (631-636) Four or five M113 APC's mounting extra MG.

#### BRITISH



Infantry Platoon (121-126) Thirty-one men, 3 MG, 27 FN rifles.



Close Suport Detachment (131) Thirty-one men, 3 MG, 3 2" mortars, 3 Gustav RR.



Main Battle Tank Platoon (321-326) Three Chieftain tanks, 50 tons, 120mm gun.



Light Tank Platoon (331) Eight Scimitar light tanks, 11 tons, 30mm gun.



Self-Propelled ATGM Platoon (441) Four FV432 APC's mounting Swing fire ATGM.



APC Detachment (621-627)
Three, four or five FV432 full tracked
APC mounting 7.62mm MG with one
APC mounting 30mm gun.

#### CHINESE (PLA)



Anti-Tank Detachment (001-004) Four 100mm anti-tank guns.



Heavy Mortar Detachment (011) Three 120mm mortars.



Infantry Company (101-104)
One hundred forty men, 12 MG, 6
mortars, various rocket weapons.



Medium Tank Platoon (301-304) Three Chinese made T55 tanks.



Truck Detachment (601-604) One to seven trucks.

#### SOVIET



Field Howitzer Battery (001-003) Six 122mm M63 or M38 towed field howitzers, 100 men.



Anti-Tank Detachment (011-014) Four 100mm M55 AT guns, 50 men or six 85mm M45D48 AT guns.



Infantry Company (101-111) One hundred thirty men, 15 MG, 9 RPG-7, 1 82mm RR, 2 82mm mortars, 1 57mm AT gun.



Engineer Platoon (121) Fifty-three men, 6 MG.



Self-Prop. Lt. AA Battery (201-203) Four ZSU-23, 23mm quad AAMG mounted on PT76 chassis.



Self-Prop. Mortar Detachment (211) 120mm M38 mortars mounted on BTR50PK tracked APC.



Medium Tank Platoon (301-309) Four T55 tanks, 36 tons, 100mm gun, replaced by T62 as Main Battle Tank, presently in Mot.Rif.Div.



Main Battle Tank Platoon (311-330) Three T62 tanks, 36.5 tons, 115mm smoothbore gun, standard in tank divisions.



Main Battle Tank Platoon (331-333) Three T70 tanks, 37 tons, 115-120mm smoothbore gun.



Self-Prop. AT Detachment (401-403) Three ASU-85, turretless 85mm AT mounted on PT76 chassis.



Self-Prop. ATGM Section (411-413) Six BTR-40P or PB mounting Snapper, Swatter or Sagger ATGMS.



Light Tank Platoon (501-503) Three PT76 light tanks, 15 tons, 76mm gun, found in recon battalion.



Scout Platoon (511-514) Six BRDM BTR40 armored scout cars with MG.



Long Range Recon Platoon (521) Ten scout cars armed with MG plus motorcyclists.



APC Detachment (601-609) Ten BMP-76PB APC's, mounting 76mm gun and Sagger ATGM.



APC Detachment (601-609) Ten BMP-76PB APC's, mounting 76mm gun, Saggers depleted.



APC Section (611-612)
One to five BTR60 wheeled APC's.



Truck Detachment (621-624) One to ten trucks.



Combat Trans. Helicopter Sect. (701) Six to ten MI-4 Hound helicopters.



Air Defense Command Post (901) Hypothetical unit of about 100 men plus communications equipment.

### MechWar '78: Tables

### **COMBAT RESULTS TABLES**

**Full Strength Attacker** 

		3			Atta	ck Superio	ority				
		-3	-2	-1	0	+1	+2	+3	+4	+5	+6
	1	(1)	(2)	(3)	(4)	(4)	(4)	(5)	1	1	1
	2	(1)	(2)	(3)	(4)	(4)	(4)	(5)	1	1	1
Roll	3	(1)	(2)	(3)	(4)	(4)	(5)	(5)	1	2	2
Die	4	(1)	(2)	(3)	(4)	(4)	(5)	1	2	2	2
	5	(1)	(2)	(3)	(4)	(5)	2	2	2	2	3
	6	(1)	(2)	(3)	(4)	2	2	3	3	3	3

### D1 Attacker

					Attac	k Superio	ority				
		-2	-1	0	+1	+2	+3	+4	+5	+6	+7
	1	•	(1)	(2)	(3)	(3)	(3)	(4)	(4)	(5)	1
	2	•	(1)	(2)	(3)	(4)	(4)	(4)	(5)	(5)	1
Roll	3	•	(1)	(2)	(3)	(4)	(4)	(5)	(5)	1	1
Die I	4	(1)	(1)	(3)	(3)	(4)	(4)	(5)	(5)	2	2
	5	(1)	(2)	(3)	(3)	(4)	(4)	(5)	2	2	2
	6	(1)	(2)	(3)	(4)	(4)	2	2	2	2	3

### D2 Attacker

					Attac	k Superio	ority				
		-1	0	+1	+2	+3	+4	+5	+6	+7	+8
	1	•	(1)	(1)	(2)	(2)	(3)	(3)	(3)	(3)	(4)
	2	•	(1)	(1)	(2)	(3)	(3)	(4)	(4)	(4)	(4)
Roll	3	•	(1)	(1)	(2)	(3)	(3)	(4)	(4)	(4)	(4)
Die	4	•	(1)	(2)	(2)	(3)	(3)	(4)	(4)	(4)	(5)
	5	•	(1)	(2)	(2)	(3)	(3)	(4)	(4)	2	2
	6	(1)	(1)	(2)	(3)	(3)	(4)	(4)	2	2	2

- 1 ......One third of the target unit is destroyed (losses are cumulative) and it assumes a D1 state in addition to any previous damage.
- 2 ......Two thirds of the target unit is destroyed (losses are cumulative) and it assumes a D2 state; if there was any previous damage, the unit is eliminated.
- 3 ......The target unit is eliminated.
- (#) .....The defender rolls the die; if the result is equal to or less than the number in parentheses, then one third of the target unit is destroyed (losses are cumulative) and the target assumes a D1 state in addition to any previous damage.
- .....No effect.

**NOTE:** If the attack superiority in a given combat is less than the lowest shown on the appropriate CRT, then the lowest column is used; if it is greater than the greatest shown, the greatest is used. Note that if the die roll is less than the lowest value shown (after adjustments) the attack is ineffective.

### ANTI-PERSONNEL COMBAT RESULTS TABLE

						Attacl	C Superio	ority					
		-3	-2	-1	0	+1	+2	+3	+4	+5	+6	+7	+8
	-2	•	•	•	•	•	S	S	Р	Р	Р	1	2
	-1	•	•	•	•	S	S	Р	Р	Р	1	2	2
	0	•	•	•	S	S	Р	Р	Р	1	1	2	2
=	1	•	•	S	S	Р	Р	Р	1	1	1	2	2
Die Roll	2	•	S	S	Р	Р	Р	1	1	1	2	2	3
	3	S	S	Р	Р	Р	1	1	1	2	2	3	3
	4	S	Р	Р	Р	1	1	1	2	2	3	3	3
	5	Р	1	1	1	1	2	2	2	3	3	3	3
	6	1	1	1	2	2	2	3	3	3	3	3	3

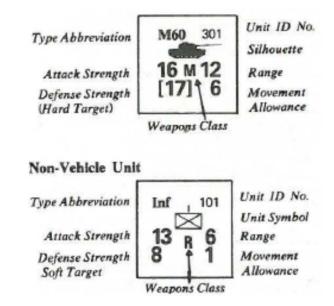
- 1 ......One third of the target unit is destroyed (losses are cumulative) and it assumes a D1 state in addition to any previous damage.
- 2 ......Two thirds of the target unit is destroyed (losses are cumulative) and it assumes a D2 state; if there was any previous damage, the unit is eliminated.
- 3 ......The target unit is eliminated.
- S ......The target unit suffers a suppression (S1).
- P ......The target unit automatically panic-moves in the following Movement Phase.
- .....No effect.

**NOTE**: If the attack superiority in a given combat is less than the lowest shown on the appropriate CRT, then the lowest column is used; if it is greater than the greatest shown, the greatest is used. Note that if the die roll is less than the lowest value shown (after adjustments) the attack is ineffective.

### FLAK STRENGTH / RANGE ATTENUATION TABLE

LINIT	Range in hexes								
UNIT	0–2	3–5	6–10	11–20					
<b>Z23</b>	16	14	12	10					
T55	8	6	0	0					
T62	10	8	0	0					
M60	12	9	0	0					
Inf Coy	12	10	0	0					
Inf PIt	8	6	0	0					
All other	8	0	0	0					

Subtract the Defence Strength of the targeted VH to establish the Net Attack Superiority and roll the die. Do not adjust for terrain.



### RANGE ATTENTUATION TABLE

Range	with	ing at <b>HAF</b> n Defence using Wea	Strength	[5]+	(Hai Strengt	at <b>PROTE</b> rd Targets h [4] or lesusing Wea	with Defe ss; any Al	Firing at <b>SOFT TARGET</b> using Weapon Class:			
in hexes	A/M	G* NATO	<b>G</b> * Pact	R	A/M	G* NATO	<b>G</b> * Pact	R	M	R	Α
0	N	Р	Р		N	Р	Р		-3	+1	Р
1	N	Р	Р	Rule	N	-3	Р	Rule	N	N	Р
2	N	Р	Р	6.10	N	N	Р	6.10	-1	N	Р
3	N	N	Р		N	N	Р		-2	N	Р
4, 5	-1	N	-3	Р	N	N	N	Р	-3	-2	Р
6–8	-2	N	N	Р	-3	N	N	Р	-5	-5	Р
9–11	-4	N	N	Р	-6	N	N	Р	-7	Р	Р
12–20	-7	N	N	Р	-11	N	N	Р	-10	Р	Р

<sup>\*</sup> D Class units use either M or G columns depending upon which of their weapons they employ. If a Weapon Class is not shown under a given Target type, this means that this weapon may not be used against that type of target. G Class units use one of two columns depending upon the nationality of the firing unit: NATO includes US; Pact includes Soviet, the PLA and any force using Soviet weaponry.

### PANIC TABLE Roll 1d10

Panic Level	D0 Move	D0 Fire	D1 Move	D1 Fire	D2 Move	D2 Fire	Removal
0%	•	•	•	•	1	1	Auto
10%	•	1	1	1	1	1–2	1–9
20%	•	1	1	1–2	1–2	1–3	1–8
30%	•	1–2	1–2	1–3	1–3	1–4	1–7
40%	•	1–2	1–2	1–4	1–4	1–5	1–6
50%	•	1–3	1–3	1–5	1–5	1–6	1–5

<sup>● =</sup> No effect (unit does not panic). # within range shown = Unit panics.

**N** = Normal (no modification of Attack Strength).

P = Prohibited. The unit may not fire at that type of target at that range.

Plus or minus # = Add or subtract the number shown to the firing unit's Attack Strength.

### **OBSERVATION RANGE TABLE**

Unit is	Maximum Observation Range [in hexes] is
Stationary Personnel in Clear terrain	3
Moving Personnel in Clear terrain	10
Moving or stationary Personnel in any other type of terrain	1
FIRING Personnel in any terrain	Unlimited
Stationary Vehicle in Clear terrain	15
Stationary Vehicle in Woods	2
Stationary Vehicle in any other type of terrain	1
Moving/FIRING Vehicle in any terrain	Unlimited

### PROTECTED TARGET TYPES

Nationality	Units
US	M125, M106, M150, M551 (Cmbt platoon), M114, M113
Israeli	120m, M113
West German	120m, Marder, Jaguar
UK	Scimitar, Swingfire, Fv432
Soviet	Z23, 120m, Spat, Brdm, Rcp, Scp, Lrrp*, BMP, BTR60
PLA	_

<sup>\*</sup> Unit is open-topped

[Terrain Effects Chart]