Line of Battle Charts & Tables v2.0

Command Charts

Sequence of Play
(2.1)

First Player Turn

- **Command Phase**
  Orders
  Attack Recovery
  Fluke Stoppage

- **Activity Phase**
  Movement & Combat

- **Rally Phase**
  Rally
  Remove CBF markers
  Loss Recovery
  (12 midnight turn only)

Second Player Turn
  Repeat the above

Game Turn End Phase
  Advance Turn Markers

Night Orders

*Allowed at Midnight (only) with delivery upon the **first** Twilight turn that morning. The Order of Arrival could prohibit such orders.*

Order Delivery (10.6a)

Total all applicable (in turns)…

Army CO's Awareness:

Type	Turns
On Fire	**1**
Normal	**2**
Not so Sure	**4**
Comatose	**8**

Distance:
(between HQs, if any):

Within Command Radius **1**

Beyond Command Radius **2**

Or

Beyond Command Radius **and** 50 hexes or more away **3**

Order to Reserve:
Divide total by 2 (round down).

Total all applicable. The result is the number of turns later the order is delivered and can have an acceptance Command Roll.

Command Roll Table (10.6)

Roll (two dice)	Result
9 or less	**No**
10 or more	**Yes**

Dice Roll Modifiers:
+ Leader Command Value

+2 Deployment from a Move Order or any roll for by a formation in **Reserve**.

No = Nothing happens
Yes = Order sent, can be re-issued, or acted upon

No leader can *make* a Command Roll **unless stacked** with his HQ if he has one.

Command Radius

Level	Hex Range
Army	**20**
Corps	**12**
Division	**8**
Brigade	**6**
Arty Bn	**4**

Zero Rule
(9.1e)
Roll one die for each such brigade, each turn, which is following Attack orders:

Roll of …
1:
No MA

2-3:
Half MA

4-6:
Full MA

Attack Recovery Table (10.8c)

Check by division Each Turn. Use status as defined below.

Base Check (2 dice, no mods):   **Pass on a**

Div has no Wrecked or Dead units[1]…   **8+**

Div has Wrecked but no Dead units[1]…   **9+**

Div has Dead units[1]…   **10+**

On a pass, roll two dice below, otherwise no recovery—

Ldr Cmd Value:	4	3	2	1 or 0
No Recovery:	2-6	2-7	2-8	2-9
Attack Recovery:	7+	8+	9+	10+

All divisions automatically Recover on the first *Twilight* turn of each day.
[1] **Ignore** Open Order and Sharpshooter units

Fluke Stoppage Table (10.7b)

Make **no** Fluke Stoppage Rolls in the first 8 turns (2 hours) of any scenario.

Dice Roll Modifiers (Apply to Base Check only):
-1 *original* divisional **leader Wounded or Killed**.
+2 Command has the needed **Reserve** (10.7c)
    (Reserve mod **does not** apply at **Night**)
-2 Night turn

Base Check (2 dice): Pass on a modified 6+
Otherwise, roll two dice below **(-1 at Night)** —
Make no 2nd roll if you **pass** the Base Check

Leader Command Value

4	3	2 or less
6+	7+	8+

If the roll is less than the range above, Stoppage occurs.

Combat

Closing Roll Table (3.5) (One Die)

Die Roll Modifiers:

+1 for a 2 or better **Morale** Value **Leader**

+1 if into a **Rear** hex

-1 if the moving stack is **Shaken**

-1 if into frontal **Arty w/ Canister**

-3 stack *starts its move* **adjacent** to its current **Charge** target hex OR in **Breastworks**

Morale	Success
A	2 +
B	3 +
C	4 +
D or worse	5 +

Opening Volley Table (5.4)

Range					
3	**2**	**1**	**Charge**	**Shift Only**	**Loss**
1-5	1-4	1-3	1-2	1	**0**
6	5-6	4-6	3-5	2-4	**1**
—	—	—	6	5-6	**2**

is roll on one die, read right to determine the SP loss.

Shift One Column **Right**
if OV from frontal Arty w/ Canister.

Shift One Column **Left**
if OV from Wrecked (5.4i).

Weapon Characteristics Charts

Type	Small Arms Type	Max Range	Notes
R	Rifled Musket	4	-
M	Smoothbore Musket	2	Buck 'n Ball
C	Carbine	3	Breechloader
SR	Sharps Rifle	5	Breechloader
CR, S	Colt or Spencer Rifle	4	Repeater
HR	Henry Repeater	3	Repeater
SH	Shotgun	1	Buck 'n Ball
P	Pistol	1	-
T	Target Rifle	5	-

Type	Artillery Type	Max Range	Canister Type
R	Rifled Cannon	30	Normal
N	Napoleon	16	**Dense**
H	12-lb Howitzer	10	**Dense**
L	Light Gun (6-lb)	14	Normal
hR	20-lb Parrott	30	Normal
hH	24-lb Howitzer	12	**Dense**
MH	Mtn Howitzer	10	Normal
SG	4.5 in Siege Rifle	30	Normal
W	Whitworth	38	-
NG	Naval Gun	22	-

Combat Column Shifts

Range...

Small Arms… or

Range	Regular	Sharpshooter
1	—	—
2	1 Left	—
3	2 Left	1 Left
4+	3 Left	1 Left

… Artillery

Range	Shift
1-5	—
6-9	1 Left
10-13	2 Left
14-15	3 Left
16+	4 Left

Shift # Left Firer's **CBF** level

Firepower...

Shift	Type	Max Range for effect
1 Right	**Buck 'n Ball***	1
	—OR—	
1 Right	**Breechloader***	2
	—OR—	
2 Right	**Repeater***	2
1 Right	**Normal Canister***	3
	—OR—	
2 Right	**Dense Canister***	3

***** Apply the Threshold Chart to see if shift applies.

Other: Target is...

2 Right **Rear** **

1 Right **DG*** **

1 Left using **Protective Terrain** (*See note*)

1 Left **Open Order Capable**

Combat Table (5.6)   Total Firing SPs (DG is x1/2)

Two Dice	-B	-A	1	2-3	4-5	6-8	A	B	C	D
2	-	-	-	-	-	-	-	m	m	1
3	-	-	-	-	-	-	m	m	1	1
4	-	-	-	-	-	-	m	1	1	1
5	-	-	-	-	-	m	1	1	1	1
6	-	-	-	-	m	m	1	1	1	2
7	-	-	-	m	m	1	1	1	2	2
8	-	-	m	m	1	1	1	2	2	2
9	-	-	m	1	1	1	2	2	2	3
10	-	m	1	1	1	2	2	2	3	3
11	m	1	1	1	2	2	2	3	3	3
12	1	1	1	2	2	2	3	3	3	4

Key: m=Morale Check # = Losses, Leader Loss, and Morale Check

On any **m** or better result *and* the target contains artillery:
Increase CBF level by 1 (max 2).

Threshold Value Chart

SPs	#
6-8	3
4-5	2
1-3	1

is the **min** SPs needed. (5.6)

Use Lettered columns when called for by shifts.

Rolls in this color band call for Canister Depletion.

Rolls in this color band call for Depletion of whatever type is being used.

Artillery Depletion
(8.2a & 8.2c)
Deplete **one** firing battery of the given ammo, if used.

Range 10 or more...

-**Ignore** shifts marked with **

Note : **Protective Terrain** *Shift once, no matter how many apply*: • Stone Walls 1.7e • Rock Ledges • Sunken Road • Trench • Boulders • Breastworks

Slope Table

Range to Lower End Point hex (hexes)

Diff	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16+
10+	94	51	34	26	21	17	15	13	12	10	9	9	8	7	7	7
9	86	46	31	23	19	16	13	12	10	9	9	8	7	7	6	6
8	78	41	28	21	17	14	12	10	9	8	8	7	6	6	6	5
7	69	36	24	18	15	12	10	9	8	7	7	6	6	5	5	5
6	60	31	21	16	12	10	9	8	7	6	6	5	5	4	4	4
5	51	26	17	13	10	9	7	7	6	5	5	4	4	4	3	3
4	41	21	14	10	8	7	6	5	5	4	4	3	3	3	3	3
3	31	16	10	8	6	5	4	4	3	3	3	3	2	2	2	2
2	21	10	7	5	4	3	3	3	2	2	2	2	2	1	1	1
1	10	5	3	3	2	2	1	1	1	1	1	1	1	1	1	1
0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0

In any case where the Obstacle Height is greater than the Higher End Point, the LOS is automatically Blocked.

For ranges 5 or more: Use the Slope Table. Find the differential in Levels between the High and Low End Points on the left column, cross index with the total range to determine the **Overall Slope**.

For any obstacle, use the obstacle's modified Level minus the Low End Point's Level and cross index with the distance from the Lower End Point to the Obstacle hex to determine the **Obstacle Slope**.

If the Obstacle Slope is *greater than* the Overall Slope, the Obstacle blocks the LOS, otherwise it does not.

For ranges 4 or less (or any Small Arms shot), if **anything** is on the LOS that isn't ignored because of Same Hill, the LOS is Blocked, otherwise it is Clear.

Modifiers that apply to End Point Hex heights:
Crest +1

Modifiers that apply to Obstacle heights:
Woods +3
Orchards +1
Town: +2
Crests: +1

Units (of both sides) **only** block if the **range is 4 or less (or any Small Arms shot).** In those cases, all of the above modifiers also apply, but no value is needed. When a hexside is involved with units that might block LOS, enemy units include their hexsides, friendly units only include their hexsides if **both** hexes involved are occupied. If the range is 5 or more and the shot is being made by artillery, ignore units of both sides. See also 4.2f

Open Order Capable units of both sides do not block LOS.

Miscellaneous

Formation Effects Chart

Unit	Formation	Facing	Combat	Movement	Charge Attacker
Infantry	Line	Normal	Yes	Yes	Yes
	Column	All Rear	No	Yes, may use roads	No
Cavalry	Line (*Dismounted*)	Normal	Yes	Yes, as Line Infantry	No
	Mounted	All Rear	No	Yes, may use roads	Yes
Artillery	Limbered	All Rear	No	Yes, may use roads	No
	Unlimbered	Normal	Yes	No, may change facing	No

Unlimbered Artillery **cannot** stack with other Combat Unit types

Unit	Formation	Facing	Combat	Movement	Charge Attacker
Inf/Cav	Open Order	Normal	Yes	Yes, as Line Infantry	No
Inf/Cav	Open Order **Capable**	All Front	Yes	Yes, as Open Order Capable	No

Activity Effects Chart

	Move	Fire
MA	Full	1/2 [1]
Fire Combat	No	Yes
Charge	Yes	No
Formation Change	Yes	Yes
Facing Change	Yes	Yes

[1] Drop Fractions

Morale State Effects Chart

Type	Fire	Movement
BL	NE	NE
Normal	NE	NE
SH	NE	NE
DG	x1/2	x1/2 [1,2]
Routed*	No	No [2]

* Routed units do not have a ZOC.

[1] Drop Fractions
[2] But can retreat 10 hexes (3.0e)

Loss Recovery Chart
(9.3)

Do this during the Rally Phase once per game day. (12 midnight only)

In each regiment or battery, recover 1 SP or 25% of losses, dropping all fractions.

Sharpshooter units **cannot** recover losses.

Additive Morale Effects Chart (6.2a)

		New State Result				
		BL	**Normal**	**Sh**	**DG**	**R**	**Town Hex** (1.7g)
Current State	**BL**	BL	BL	Sh*	DG*	R*	DG
	Normal	BL	Normal	Sh	DG	R	DG
	Sh	BL	Sh	Sh	DG	R	DG
	DG	Normal	DG	DG	R	R	DG
	R	Sh	R	R	R	R	R

* For these, ignore any Retreat or Loss results from the Morale Table result.

Fluke Stoppage Reserves (10.8c)

The reserve must have been established using the usual Reserve Command Rules.

The reserve **does not** contain *any* Wrecked or Destroyed regiments.

Cavalry cannot be a reserve for an infantry division.

A **division** of three or more brigades needs one complete **brigade**. A division of less than 3 brigades needs one **full-strength regiment** (which is not DG or R).

Open Order Crib Notes (9.4)

** **Requires** Open Order Capability (9.4b)

1) Use the Open Order Capable column of the *Terrain Effects on Movement Chart*. ** (If not Open Order Capable, use the Line column.)
2) Apply Open Order Capable mod on the *Combat Table*. **
3) Free EZOC entry and exit in movement (if the first hex *entered* is **not** also adjacent to an enemy unit). **
4) *Open Order Capable* units **must** withdraw 2 hexes before any fire at their hex that would require an Opening Volley. There is no Opening Volley. This can be done into EZOCs without incurring loss. **
5) Automatic Closing Roll success. **
6) No MP Cost to change facing. **
7) Sharpshooter units (specifically) cannot recover losses.

Open Order (Capable or not) units **cannot** Charge and **never** become Blood Lusted.

Smallness
3 SPs or less.

Artillery Leaders
(9.1c)

• Marked with Crossed Cannon symbol.

• Arty Leaders can allow a **second or third** artillery shot at a given target hex.

• Arty Leaders can "post" batteries.

• Allows artillery to unlimber 4 hexes away from the enemy, not 5 hexes, as is normal.

Morale Table (6.1)

Morale Table Modifiers:

—*Value** Target **Leader's Morale** [3]

+1	**Shaken** or **Disorganized**
+3	**Wrecked**
+2	**Rear**
+1	**Small** *(see note at right)*
+1	**Cowardly Legs**
+3	**Night**
+1	**Artillery or Cav** [4] check generated by Small Arms

-1* *if any one or more:*
Behind **Stone Wall** [1] **Rock Ledge**
in **Slope** [2] **Sunken Road, Boulder,**
or Breastworks hex

[1] *Regardless of type of incoming fire, unlike on the Combat Table. Apply 1.7e.*
[2] *If fire comes from a lower elevation.* [3] *Ignore for determining Blood Lust (6.2).*
[4] *Even if dismounted.*

Small requires each of the following:
A Shot…
—*containing* **Small Arms**
—at **Range 1 or Charge**

AND a Target that…
—is Small
—is *NOT* Open Order Capable

*** If Range is 10 or more…
use **only** the Terrain and Leader mods.

Additional Charge Modifiers

(7.0g)

SP Differential is…	Larger Side	
	Attacker *(or same)*	Defender
Lots Bigger *5 or more*	+2	-2
Bigger *3 or 4*	+2	-1
About Same *2 or less*	+1	0

• SPs only count if **capable** of firing.

Also…

| +1 | Attacker is **Blood Lusted** |
| +Value | Attacking **Leader's Morale** |

Morale Rating

Two Dice	A	B	C	D	E	F
2	BL	BL	BL	-	-	-
3	BL	BL	-	-	-	-
4	BL	-	-	-	-	Sh b1
5	-	-	-	-	Sh b1	Sh b2
6	-	-	-	Sh b1	Sh b2	DG b3 L1
7	-	-	-	Sh b2	DG b3 L1	DG b4 L1
8	-	-	Sh b1	DG b3 L1	DG b3 L1	DG b4 L2
9	-	Sh b1	Sh b2 L1	DG b3 L1	DG b4 L2	DG b4 L2
10	Sh b1	Sh b1 L1	DG b3 L1	DG b4 L2	DG b4 L2	R b6 L2
11	Sh b2 L1	DG b3 L1	DG b4 L1	DG b4 L2	R b6 L2	R b6 L3
12	DG b3 L1	DG b4 L1	DG b4 L2	R b6 L2	R b6 L3	R b6 L4
13	DG b3 L1	DG b4 L2	R b6 L2	R b6 L3	R b6 L4	R b6 L4
14	DG b3 L2	R b6 L2	R b6 L3	R b6 L4	R b6 L4	R b6 L4

Take losses **after** the retreat.

BL only if the checking stack is **adjacent** to the unit that fired or Charged it.

BL—Blood Lust **Sh**—Shaken **DG**—
Disorganized **R**—Rout **"-"** —no effect
b#—Retreat hexes, cannot be negated
L# —Loss required

If a stack *Retreats or is Destroyed*
Don't forget the **Cowardly Legs**! (6.5)

***Retreat* into EZOC Losses…**
Lose 1 SP per EZOC hex entered. (6.3e)

Small Unit Retreats…
Do not affect other stacks. (6.3d)

Charge Sequence

Assuming a successful Closing Roll.

1)Opening Volley & Leader loss, if needed

2) Defender takes **1 SP loss** and checks for **Leader loss**, **unless**…
…Attacker is **Small**
…Defender is in **Breastworks**
 (with the attacker coming from the front)
 If **either** of those are true, THEN…
No Defender loss or **Leader Loss check**

3) Defender Makes **Morale Check** using the Additional Charge Modifiers in addition to the normal ones

Leader Loss Table (9.1a)

is roll on two dice.

Result	Other Cases	Cap-ture	Charge *(if side has loss)*	
			Defender	*Attacker*
No Effect	2-10	2-8	2-9	2-7
Captured	-	9-10	-	-
Wounded	11	11	10	8
Killed	12	12	11-12	9-12

+1 if fire is from a Sharpshooter–Capable unit.

Artillery Formation Changes (3.1f)

Limbering: Can be done regardless of the location of the enemy with no losses, etc.

Unlimbering: No closer than 5 hexes* from the enemy unless stacked with an Artillery Leader in which case a battery can unlimber 4 hexes* away.

* From enemy units capable of firing and a clear LOS ignoring other units of both sides, Facing, Weapon Max Range, and Visibility.

Arty & Retreats

Retreating arty does not affect any other units and other unit types do not affect Unlimbered arty they retreat through, unless they end stacked with other units. They can extend its retreat. (3.2d & 6.3f)

Terrain Effects on Movement Chart

	Line	Column, Open Order Capable	Mounted	Limbered	Wagon	Leader
Movement Allowance:	6	8 (b)	12	10	4	12
Formation Change:	1	1	3	3	na	na
Clear or Orchard	1	1	1	1	1	1
Woods hexside (a)	+1	ne	ne	+1	+2	ne
Thicket	3	3	4	4	P	3
Pike or Road	ot	1/2	1/2	1/2	1/2	1/2
Trail or Railroad	ot	1/2	1/2	1/2	1	1/2
Town	1 (c)	Use Road-type being followed (c)				
Inclined Ground hex *with…*						
…0 to 2 Slope lines	2	1	2	3	3	1
…3 or more Slope lines	3	3	4	6	P	2
Slope hex (without a *Inclined Ground* symbol)	No Effect					
Boulders	3	2	4	P	P	2
Vertical Slope	P	P	P	P	P	P
Stream (d)	+1	ne	+2	+3	+3	ne
Creek (d)	+3	+3	+3	P	P	+3
River (d)	Crossing only allowed at Bridge or Ford hexside or Ferries					
Ford	+2	+1	+1	+1	+1	ne
Foot Bridge	P	+2	P	P	P	+1
Marsh (Swamp)	2	2	3	4	P	2
Briar Marsh	3	3	5	P	P	4

Some older RSS games have features that are not listed above, use their Terrain Effects for those.

ot—Use other terrain in this hex, this feature does not matter.
ne—No Effect
na—Not Applicable
P—Prohibited

Notes:
- (a) Woods hexsides are for movement, the actual **Woods** symbol is for LOS (+3 LOS level mod)
- (b) Must end move in Column to qualify, see 3.1c. *Exception: Open Order Capable* units.
- (c) Do not apply the Intersections Rule (1.7g) to units in Line, Open Order, or Leaders. **Intersection Roll:** One die, success on a 4 or more. Apply the "automatic DG" effect to units in Line or Unlimbered in Town hexes.
- (d) Bridges exist wherever a Pike, Road, Railroad or Trail crosses these features (unless a Ford or Foot Bridge is shown). Units in Line cannot use bridges.

The following have no effect on Movement and exist either for visual effect or show up as modifiers on the various tables and charts (includes old game features that no longer have an effect).

- Elevation Change (only, no Slope symbol)
- Corn (Corn has no LOS effect, either)
- Runs
- Buildings
- Hay Stacks
- Rocky Ground
- Rock Outcrops
- Rock Ledges
- Stone Walls
- Crests (+1 height level mod)
- Sudden Dip Hexsides
- Mill Dam
- Sunken Road (still counts as the type of road going through it)
- Bridges (still counts as the type of road going through it and negates the MP cost of Creeks or Rivers the road crosses)
- Cemetery
- VP Hex
- Entry Hex
- Critical Exit (TTS)
- Fence
- Camps (AFS)