



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

FORSCOM's HMMWV Egress Assistance Trainer (HEAT)

**JRTC & Fort Polk
SFC Koski
G3 Training Division
531-1378**





Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

NOTE TO INSTRUCTORS

- **This POI was designed as a HEAT train the trainer and for Primary Instructors to train Soldiers on proper egress drills.**
- **When using as a train the trainer package, all 27 slides are covered.**
- **When used only by the Primary Instructor to train HMMWV egress to Soldiers, begin on slide eight and continue to slide twenty-seven.**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Components

- Power source- 30 AMP, 120 Volt
- Ladders
- Axle
 - welds
 - bearings
- Doors
 - Always double check
- Seatbelts
- Seats
- Support Frame
 - welds
- Motor
- Hydraulics
- Control module



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Pre-Operation Checks

- Fluids - Tank filled with 10W Hydraulic Fluid?
- Grease fittings - Front and aft axle grease fittings in good condition and not broken?
- Axle Welds - Check for cracks or fissures that will fail under strain.
- Support Welds - Check for cracks or fissures that will fail under strain.
- Locking bar - Ensure locking bar prevents rotation of trainer when not under load.
- Seatbelts - Ensure seatbelts are operational.
- Doors - Ensure doors shut and lock when closed.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

During Operation Checks

- Safety Equipment - Ensure all Soldiers have ballistic helmet, gloves and eye protection.
- Ladders - Stable and in working order and placed outside safety area during operation.
- Seatbelts - All Soldiers are wearing seatbelts.
- Doors - Ensure Assistant Trainer closes and checks all doors.
- Safety Area - Ensure Assistant Trainer clears to the rear before operation.
- Safety Area - Ensure Primary Trainer clears to the front before operation.
- Primary trainer disengages locking bar before.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Post Operation Checks

- Fluids - Tank filled with 10W Hydraulic Fluid?
- Grease fittings - Front and aft axle grease fittings in good condition and not broken?
- Axle Welds - Check for cracks or fissures that will fail under strain.
- Support Welds - Check for cracks or fissures that will fail under strain.
- Electrical Plug - Ensure trainer is unplugged.
- Locking bar - Ensure locking bar prevents rotation of trainer when not under load.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Operation

- Load no more than four Soldiers.
 - It's easier for everyone to load through the rear doors
- PI and AI verify seatbelts are secured.
 - Have the Soldier remove all slack from the lap belt
- PI checks doors on passenger side.
- AI Checks doors on driver side.
- PI secures the controls.
- AI turns on the motor
- PI asks for thumbs up from the Vehicle Commander
- PI asks AI if the rear is clear.
- AI announces CLEAR and turns on the motor.
- PI announces AREA CLEAR, UNLOCKING and removes the locking bolt from the front.
- Time to train.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **Goal of Developing the Egress Trainer:**
- Teach Soldiers to properly exit an inverted HMMWV
- Allow vehicle crews to gain experience in the proper exit procedures.
- Teach the Soldiers the self-control needed and to overcome panic after the vehicle turns upside down.
- *Gain a 250 percent better chance of surviving a roll over.*
- HEAT Training will help Soldiers to develop confidence in their ability to respond automatically to this this type of emergency.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **Elements:**
 - **Observe critical angle (25 – 30 degrees)**
 - **React to rollover**
 - **Rotate 540 degrees (or more) for seatbelt confidence**
 - **EGRESS Training**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

– Observe critical angle

- TACOM found that an M1114 HMMWV can function on a 30 degree side slope – like this
(TM has not been updated)





Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **A Combat Patrol loaded M1114 will probably overturn at that angle because of additional weight high on the roof!**





Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- The additional armor on the roof shifts the center of gravity up, making the HMMWV tip over at a smaller angle





Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

So, we
SHOW
them what
30 degrees
feels like!





Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Roll over Drill (GTA 55-03-030)

In a nutshell....

- All crew members announce “ROLL OVER, ROLL OVER, ROLL OVER”.
- Vehicle Commander, and all interior crew members grab and pull gunner into vehicle.
- All Soldiers grab a stationary object, chin on chest, push feet into floor, Press back into seat.
- Driver has the option to hold on to steering wheel.



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **Egress Training**
 - If you are in a HMMWV, hanging upside down from your seatbelt, something bad just happened

 - You might be
 - Under water
 - Under fire
 - On fire
 - All of the above



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **Egress Training**
 - **If you are any of those things, I'd say you've earned your right to have a nice little panic attack**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- **Egress Training**

- Right in the middle of a panic is not the time you want to try and figure out how to do something you have never done before
- We need to get nine basic steps to be an automatic, no thought required reaction to the disaster of overturning your HMMWV



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

Premise: you are upside down, hanging from your seatbelt, the ceiling is now the floor:

- 1. Brace one hand on floor**
- 2. Unbuckle seatbelt with other hand and immediately put both hands on ceiling.**
- 3. Slide out of seat and sit up.**
- 4. Disconnect headset.**
- 5. Orient yourself on your door.**
- 6. Unlock combat door locks.**
- 7. Get door open: if door does not open try a different door.**
- 8. Exit with your weapon.**
- 9. Check on other crew members and assist as necessary.**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- 1. BRACE with one hand against the floor**
 - Which hand should you brace with? Well, what hand can reach your seatbelt? Then use the other one to brace**
 - Do not undo your seatbelt without bracing on the floor – your neck cannot support your body weight let alone all the battle rattle you have on**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

2. UNFASTEN your seatbelt with your other hand

- You may have to push against the floor with your bracing hand to allow the seatbelt release to unfasten**
- Find the release button and press it firmly until it pops loose**
- BE PREPARED TO FALL WHEN THE BELT CUTS LOOSE (you are NOT in the Matrix)**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

- 3. SLIDE out of your seat and sit up**
 - **Protect your neck at all costs, but you cannot open the door while upside down**
 - **Be aware of your buddies and DON'T kick them in the face**
 - **MUZZLE AWARENESS AT ALL TIMES!!!**
 - **Be aware your gear may get caught on something**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

4. DISCONNECT your headset

- Untangle yourself from anything holding you back, like your seatbelt, comm cords, slings, whatever**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

5. ORIENT yourself on the door

- Dropping out of your seatbelt is more disorienting than expected
- Get yourself right side up before worrying about the door
- Now you are looking at the door and the question is, how does it open now that up is down and down is up?



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

6. UNLOCK the Combat Lock

- There are about five types of combat locks in service. Which do you have?**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

7. GET the door open

- Armored doors weigh 240 pounds and are not meant to be upside down
- The door may be difficult, very difficult or impossible to open
- Once the latch is open you will have to really lean into that door to get it open, however, if your door is not opening try another door!
- When you open a door shout **OPEN DOOR (and the location) DRIVER'S FRONT!**



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

8. EXIT with your weapon



Joint Readiness Training Center & Fort Polk

FORSCOM HMMWV EGRESS ASSISTANCE TRAINER

(HEAT)

9. CHECK on other crew members

- Don't let your buddy down!
- Are all crew members aware of the open door and are they moving toward it?
- Are all crew members conscious?
- Consider the risks of moving injured soldiers – don't make it worse, but you can't leave them hanging upside down either
- Continue with tasks outlined by GTA 55-30-030