

MK93 SMOKE DETERRENCE SYSTEM

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Need for Smoke Deterrence System?

- US Special Operations Command, Riverine
- US Marine Corps, Riverine
- Less than lethal response











Need for Weapons Mounted System?

- Hard mounted fixtures move with the craft
- Hard mounted fixtures can't be turned
- Weapons mounted can provide both deterrent and lethal coverage



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• What is the purpose of this system?

- Provide Smoke Deterrence for Numerous Applications
 - Hot Extractions
 - Provide cover from hostile aggressors
 - Provide precise placement of smoke placement
 - Provide rapid response
 - Provide lethal response from a covered position













What is the MK93 Smoke System?

- Standard MK93 Universal Gun Mount
- M6 66mm Smoke Grenade Discharger
- M82 or M76 Smoke Grenades
- Discharger Interface Bracket
- Discharger Harness and Switches





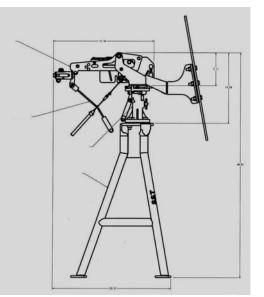




MK93 Universal Weapon Mount

- Interfaces with multiple weapons:
 - M2HB .50 Caliber Machine Gun
 - MK19 40mm Grenade Machine Gun
 - M240 7.62mm Machine Gun
 - M249 5.56mm Machine Gun
- Commonly found throughout the Armed Forces





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M6 Smoke Grenade Discharger

- Deploys all Q-STAG 401 Grenades
 - M82 Practice Grenades
 - M79 Non-IR Penetrating
- Weighs 8.5 Pounds





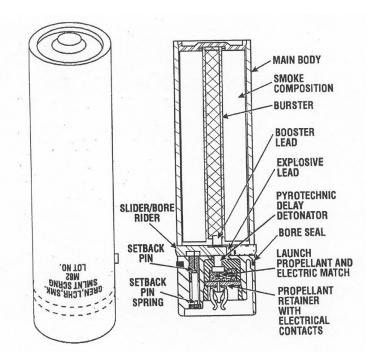




Smoke Grenades

M82 Practice Grenades M76 NON IR penetrating





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- Discharger Interface Bracket
- Designed to interface M6 Discharger to MK93 Weapon Mount.
 - No modifications required to MK93.
 - Bracket moves in train and elevation, allowing the gunner to aim where the grenades deploy.
 - Safety tested to double recoil for 2000 shots.
 - Live fire tested and design concurred by user evaluation



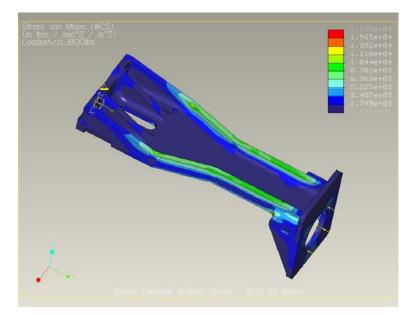
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• Discharger Interface Bracket – Engineering testing











PROTOTYPE TEST



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- Harness and Switches
- Firing switches designed to interface with all of the MK93 weapons.
 - Switches bolt on to the weapons.
 - Harness and Switches are EMI safety certified.
 - 24Vdc power











SMOKE IN ACTION



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- Ancillary Equipment
- AN/PAS 13 for FLIR viewing and Smoke Penetration





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- Ancillary Equipment
- AN/PVS21 with MHUD
 - Augment the head up viewing thru PAS21







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Summary

- Interface Discharger to MK93 with no modifications
- Interface with current FLIR sights and NVEO goggles
- Full range of motion for deploying smoke deterrence
- 35 pounds total weight per MK93 system
- Estimated \$2000 per kit.

