**BRIEF : DEVELOPMENT OF WING DROP TANK FOR MIRAGE -2000 AIRCRAFT**

1. The Wing Drop Tank is installed on a pylon under the outboard wing stations of the aircraft. The tank has a capacity of 1300 litres (343.46 USG).
2. Wing drop tank is made essentially of light alloy and the structure is composed of the following assemblies:-
   1. At the top, a receptacle (with plug) used for gravity refuelling.
   2. At the rear of the filling receptacle, a grounding connector.
   3. On the right sidewall, a receptacle (and plug) for suction de-fuelling.
   4. A cylindrical centre section of conventional design with frames and sheet metal skin.
   5. Tank-to-pylon electric connector.
   6. Air cross feed receptacle.
   7. A suspension fitting at the front, a locating and stress pickup ball joint at the rear, a suspension socket attached to the bottom of the fitting by a set of concave and convex washers and a locknut.
   8. The tank suspension system under the pylon also incorporates the rear retaining device (RRD) which, in addition to the hook, contains a clevis assembly attached to the hook lower boss by a pinned key.
   9. The clevis houses a body and a tie-rod, held by three shells. The shells are retained by a ring and encased in a cap.
   10. The locknut and the ball joint are screwed to the tie-rod, with the ball joint housing between the locknut and the ball joint.
3. Physical Characteristics:-
4. Overall length: 5700 mm (224.41 in)

(b) Max. Cross-section: 630 mm (24.80 in)

(c) Nose cone length: 1850 mm (72.83 in)

(d) Centre section length: 2000 mm (78.74 in)

(e) Tail cone length: 1850 mm (72.83 in)

(f) Empty weight: 97.8 kg (215.61 lb)

(g) Full weight: 1130 kg (2491.2 lb)

(h) Usable capacity: 1300 l (343.46 USG)

(j) Transferable capacity: 1285 l (339.46 USG)

1. The Wing Drop Tank can be jettisoned in selective or emergency mode by a device incorporated in the drop tank pylon. On jettisoning, the drop tank is ejected and the hook nose is released from the clevis opening. The cap is then twisted. The ring breaks open and the three shells separate, releasing the tie-rod and the tank. The tank drops together with the clevis. The ball joint with the half-body and the tie-rod remain attached to the pylon.
2. Interested individuals / Start Ups / MSMEs / DPSUs / Indian Companies, desirous of participating in this development project may submit their proposals to the project officer by the last date listed on MoD Website of Make II. The respondents are requested to provide information on points listed in the General Aspects and Technical Aspects as follows.