

**BRIEF AND QUESTIONNAIRE ON MAKE PROJECT  
INDIGENOUS PRECISION RANGE EXTENSION KIT**

**Brief Outline**

1. A precision range extension kit glide helps in converting normal general purpose bombs into a weapon for accurate delivery. Such kit support conversion of existing GP bombs into Long Range Glide Bombs at much lessor cost.
2. It is proposed to indigenously design, develop and manufacture a *Indigenous Precision Range Extension Kit (iPREK)* for use on existing GP 500 and HSLD 250 Bombs of IAF under the Make-II procedure of DAP 2020.
3. Indian vendors (term to include, public limited company, private limited company, partnership firms, limited liability partnership, one person company, sole proprietorship registered as per applicable Indian laws) desirous of undertaking the design/development/manufacture may submit their response, as per format placed at **Appendix B**, through letter, fax or email to:-

Make PMU (IAF)  
Room No 490 (E),  
Air HQ (Vayu Bhavan)  
New Delhi – 110106  
Telefax: (011) 23013225  
Email: [makeind.iaf@gov.in](mailto:makeind.iaf@gov.in)

4. Estimated time lines are as follows:-

(a)	Time period for response from industry	<b>Six weeks</b> (may extend)
(b)	Interaction with vendors and feasibility study	Eight weeks
(c)	If project found feasible, internal approvals and issue of EoI	Eight weeks (may extend)

5. **Brief of Equipment.** Brief of the equipment at Para 1 & 2 above is attached as Appendix A.
6. **Questionnaire.** A generic format for examination of the project and response by the vendors is placed at Appendix B.

Appendix A  
(Refer Para 5 of  
Brief Indigenous Precision Range  
Extension Kit (iPREK))

### **BRIEF OF CASE**

1. **Name of Proposal** - Indigenous Precision Range Extension Kit (iPREK).

2. **Operational Necessity**. Range extension kits provide simple means to convert existing dumb bombs into Long Range Glide Bombs. The proposal is to convert existing GP 500 Kg bomb into long range glide weapons through an Indigenous Precision Range Extension Kits (iPREK).

3. **Broad Technical Specifications**.

- (a) Range - > 80 Km
- (b) Terminal guidance through EO/IR seeker.
- (c) Scene matching capability.
- (d) Capability to work in GNSS denied environment with inertial guidance.
- (e) Capable of strap-on on existing GP 500 and HSLD 250 bombs.
- (f) Accurate delivery to the target (CEP < 05 m, desirable < 03 m).
- (g) Capability to define impact angle and attack direction through mission planning.
- (h) Capability to define en-route navigation.
- (i) Ease of maintenance & handling.

Note: - Industry may propose additional features during discussions for feasibility of case.

4. **Quantity**. - Prototype quantities to be proposed by Industry for evaluation & trials. Procurement of Qty – upto 500 or more is envisaged.

5. **Broad Timelines**. The prototype development is expected to be completed within two years of Project Sanction Order.

Appendix B  
(Refer Para 5 of  
Brief Indigenous Precision Range  
Extension Kit (iPREK))

**QUESTIONNAIRE: INDIGENOUS PRECISION RANGE EXTENSION KIT**

1. Whether the company/Association of Persons (AoP) is eligible as per provisions of DAP 2020 (Eligibility of Participation: Indian vendors only).
2. Vendor to provide an assessment of its capability (Financial and Technical)? Provide necessary documentation for verification.
3. Indicate how much Indigenous Content (IC) can be ensured? (Minimum requirement of MoD is 50%).
4. Does the vendor envisage the feasibility of achieving future exports?
5. Whether the vendor's proposal would be eligible for Make-II subcategory of Chapter III of DAP 2020?
6. Whether R&D or ToT through foreign collaboration is proposed by the vendor? (Provide indicative information)
7. Estimated cost of development for indigenous R&D.
8. Estimated tentative time period of completion of R&D or ToT.
9. Rough Cost of equipment for manufacture in India with minimum order quantities.
10. Please indicate plan/status for certification of the equipment.
11. Please provide relevant and applicable technical details. Indicative of information on weight, parts etc.