High Performance Explosive

Leading worldwide specialist in the field of high explosives, EURENCO offers its customers a complete range of high explosives and compositions thanks to high-tech manufacturing capabilities. EURENCO produces RDX by the Woolwich or Bachmann process. Used in a wide range of compositions, RDX represents the best solution for both performance and cost. EURENCO also produces a unique quality of Insensitive RDX (I-RDX®), which brings a significant advantage by reducing shock sensitivity level of RDX-based compositions.

Application and user’s advantages

Available in all standard grain sizes, RDX and I-RDX® are used in a variety of military and civil applications:
- Melt-cast and pressed explosive ammunition
- Cast PBX charges for insensitive munitions
- Boosters
- LOVA composite propellants
- Pyrotechnics (cap-relay, cutting cords, detonators)
**Product Description**

- Chemical names: Hexogen, RDX, Cyclonite, Hexahydro-1,3,5-trinitro-1,3,5-triazine
- CAS number: 121-82-4
- Chemical formula: $C_3H_6N_6O_6$

- RDX qualities according to MIL-DTL-398 D specifications:
  - Standard particle sizes: Class 1 to class 5
  - Specific grades available on request.

- RDX-based compositions available according to NATO standard or customer tailored specifications:
  - Melt-cast compositions (RDX-TNT, Comp B,...)
  - Pressed compositions (RDX-wax, RDX-binder, Comp A3, Comp A4, Comp A5, Hexal, PBXN-7,...)
  - Premix of plasticized compositions for Cast PBX (CXM7,...)

**Product Characteristics**

- Crystal density: 1.82 g/cm$^3$
- Heat of combustion: $-2092.0 \pm 2.1$ kJ/mol solid phase
- Detonation velocity, confined: 8 750 m/s (1.76 g/cm$^3$)
- Volume of detonation gases: 900 l/kg
- Impact sensitivity: 7.5 J
- Friction sensitivity: 120 N
- Critical diameter of steel sleeve test: 8 mm

EURENCO conducts a policy of continual improvement and therefore reserves the right to change any of the data contained herein without notice. Before using these data, please contact EURENCO to know about the last technical update.

March 2010 - Les Créations Philippe Toumire - Crédit photos : Eurenco - BAE Systems - Didier Charre - Michel Riehl