## 7 Inch Millennium™, HMX, 39 Gram Shaped Charge

<table>
<thead>
<tr>
<th>Part No.: 101207997</th>
<th>PROPER SHIPPING NAME</th>
</tr>
</thead>
<tbody>
<tr>
<td>CE Certificate No.: CE0519, ENB/B/036</td>
<td>UN0440, CHARGES, SHAPED, 1.4D, PG II</td>
</tr>
<tr>
<td>DOT EX No.: EX1996080028</td>
<td></td>
</tr>
</tbody>
</table>

### Technical Drawing
![Diagram of 7 Inch Millennium™, HMX, 39 Gram Shaped Charge](image)

### Technical Information

### APPLICATION:

Shaped charge for oilfield use

### PERFORATING SYSTEM

**SPECIFICATION:**
- Diameter: 7 inch (177.8 mm) OD
- Collapse rating: 11,000 psi (758.6 bar)
- Tensile rating: 698,500 lb (316,800 kg)

### EXPLOSIVES:

- **Booster:** Pure HMX, 1g
- **Main load:** Desensitized HMX, 38 g
- Density: > 1.5 g/cm³

### TEMPERATURE LIMITS:

- 400 F / 204 C 1 h
- 338 F / 170 C 24 h
- 310 F / 154 C 100 h

### PERFORMANCE:

- **API 19B Section 1 data:**
  - Hole Diameter: 0.42 in (10.7 mm)
  - Penetration: 38.7 in (983 mm)

- **Manufacturing quality control data:**
  - Hole Diameter: 0.43 in (10.9 mm)
  - Penetration: 50.47 in (1282 mm)

### SHELF LIFE:

10 years when stored unopened in original packaging. Storage temperature:
- 0 C / 32 F min
- 54 C / 130 F max

### DISPOSAL:

Dispose of product not suitable for oilfield use according to applicable laws and regulations.

---

**Jet Research Center, a division of Halliburton Energy Services, Inc.**
8432 South I-35W
Alvarado, Texas 76009-9775
USA
Tel.: +1 817.761.2000

**Part No.: 101207997**

**CE Certificate No.: CE0519, ENB/B/036**

**DOT EX No.: EX1996080028**

**Product Designation:** HES-APRV-004