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**Product Description**

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**Typical Applications**

- Electronics
- Large generators
- Rotor conductors
- Transformers & motors
- Switchgears
- Vacuum engineering
- Cables
- Electrical instruments

**Key features:**

- Excellent electrical conductivity
- Outstanding thermal conductivity
- Not susceptible to hydrogen embrittlement when heated in reduced atmosphere
- Highest electrical conductivity for commercially pure copper
- Excellent formability and joining qualities

**Related material specifications**

- BS2874 / BS1433: C103
- BS EN13601: CW008A
- C10200
- Cu-OF

**Fabrication Properties**

- Machining: Poor
- Cold working: Excellent
- Electroplating: Excellent
- Soft soldering: Excellent
- Hot-Dip Tinning: Excellent
- Resistance Tinning: Excellent
- Gas Shield: Good
- Arc Welding: Fair

**Chemical Composition (weight %)**

<table>
<thead>
<tr>
<th>Weight (%)</th>
<th>Cu</th>
<th>Pb</th>
<th>Bi</th>
<th>Imps</th>
</tr>
</thead>
<tbody>
<tr>
<td>Min</td>
<td>99.95</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Max</td>
<td>0.005</td>
<td>0.001</td>
<td>0.03</td>
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</tr>
</tbody>
</table>

**Physical Properties**

- Melting Point: 1083°C
- Density: 8.9 g/cm³
- Specific heat: 385J/Kg °K
- Thermal conductivity (RT): 393W/m°K
- Thermal expansion coefficient (20-200°C): 17.3 x10⁻⁶
- Electrical conductivity: 100-101.5% IACS
- Electrical Resistivity: 0.01724 ohm mm²/m

**Formability**

Excellent

**Technical Assistance**

Our knowledgeable staff backed up by our resident team of qualified metallurgists and engineers, will be pleased to assist further on any technical topic.

www.smithmetal.com  sales@smithmetal.com