

# **Tenacity™ No. 4A Flux Powder**

Tenacity<sup>™</sup> No.4A Flux Powder is a medium temperature brazing flux suitable for use with silver brazing filler metals. It has a working range of 600-850°C and is suitable for use with silver brazing filler metals that melt below 800°C.

It is useful for brazing larger assemblies in steel or copper wherever prolonged heating may cause general-purpose fluxes to become exhausted. It also finds applications in silversmithing.

Conforms to:	EN 1045: FH10
Working range:	600-850°C

### **Directions for Use**

Tenacity<sup>™</sup> No. 4A Flux Powder should be mixed with water and a few drops of liquid detergent to form a thick paste. Paste should then be brushed onto the joint surfaces before assembly. Further flux should then be applied externally either side of the joint mouth.

It is good practice to mechanically clean and degrease the joint surface before applying flux. Heat slowly and evenly to the brazing temperature, without local overheating. Use the flux as a temperature guide - it will become clear or opaque as brazing temperature is approached. If blackening of the flux occurs this is often a sign of insufficient flux, overheating or flux exhaustion.

#### Flux Residue Removal

The flux residues of this product are corrosive and should be removed after brazing. They are only partially soluble in water. Immersion in a warm (>40°C) 10% sodium hydroxide solution for 30 minutes followed by brushing in a stream of water is recommended for removing them. The residues are hard and will also respond well to mechanical removal methods such as grit blasting.

#### **Product Availability**

0.5kg Plastic Pots 5kg Plastic Pots

#### Tenacity<sup>™</sup> is a Johnson Matthey trademark.

Johnson Matthey Plc cannot anticipate all conditions under which this information and our products or the products of other manufacturers in combination with our products will be used. This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is given in good faith, being based on the latest information available to Johnson Matthey Plc and is, to the best of Johnson Matthey Plc's knowledge and belief, accurate and reliable at the time of preparation. However, no representation, warranty or guarantee is made as to the accuracy or completeness of the information and Johnson Matthey Plc assumes no responsibility therefore and disclaims any liability for any loss, damage or injury howsoever arising (including in respect of any claim brought by any third party) incurred using this information. The product is supplied on the condition that the user accepts responsibility to satisfy himself as to the suitability and completeness of such information for his own particular use. Freedom from patent or any other proprietary rights of any third party must not be assumed. The text and images on this document are Copyright and property of Johnson Matthey.

This datasheet may only be reproduced as information, for use with or for resale of Johnson Matthey products. The JM logo©, Johnson Matthey name© and product names referred to in this document are trademarks of Johnson Matthey. Easy-flo® and Silver-flo® are registered to JM in the EU. Sil-fos™ is registered to JM in the UK and certain other countries but is marketed as Mattiphos™ in Germany and the USA.

## JM 🔀 Johnson Matthey

Metal Joining York Way, Royston, Hertfordshire, SG8 5HJ, UK Fax: +44 (0) 1763 253168 email: mj@matthey.com