National Bureau of Standards L. M. Branscomb, Director

## **Certificate**

## STANDARD REFERENCE MATERIAL 83c Arsenic Trioxide

Purity on Basis of Effective Reducing Power . . . 99.99 percent

This lot of arsenic trioxide was prepared to ensure material of high purity and uniformity. It conforms to the American Chemical Society specification for reagent grade material.

The assay, for the present, is based on a direct comparison with the potassium dichromate standard 136b. The value is compatible with the previous assenic trioxide standard 83b, with the potassium dichromate standard 136b, and with high purity normal uranium metal, using the 1961 table of Atomic Weights based on Carbon 12. The estimated experimental error is about 0.02 percent, and work is in progress on additional standardization procedures.

The sample as issued does not lose over 0.002 percent in weight on drying up to 24 hours at 105 °C. The assay value for the present, is based on the material as issued.

Washington, D. C. 20234 February 6, 1962 (Reprinted April 16, 1970)

Harry C. Allen, Jr., Chief Analytical and Inorganic Chemistry Division