

NIST TRACEABLE  
SODA-LIME GLASS MICROSPHERES

# Image Analysis Standards

## 50-250 $\mu\text{m}$

Part Number: IA015

Batch Number: 4

Nominal Weight: 5.0g x 10 bottles

*Certificate of Analysis*

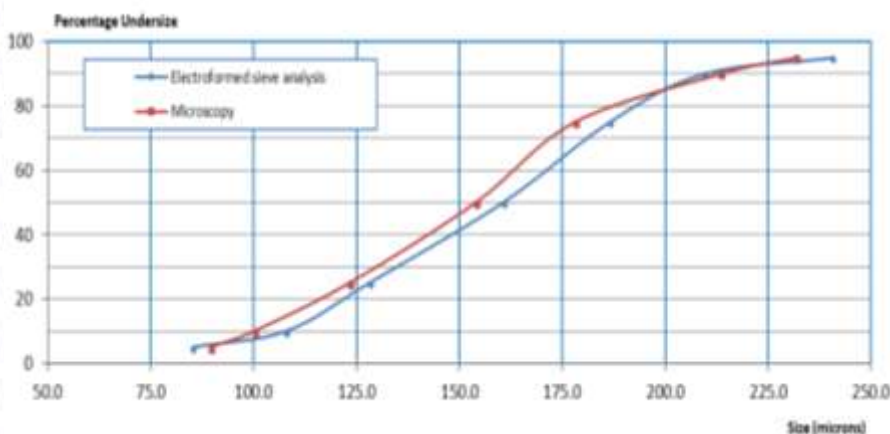


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NIST TRACEABLE

### IMAGE ANALYSIS STANDARD



Issued by:



Dr G R Rideal  
Founder & Senior Analyst

**Notes:**

- 1) Calibration results within 5% of the standard are acceptable.
- 2) Traceability graticules: NIST test no. 821/263573-00, NPL ref no. 0804038/970127/106-66.
- 3) For a summary of the analytical methods see – Rideal G R, Dodds J A & Pons M-N, Leschonski K, Lloyd P J, and Mercus H G, The Development of New Reference Standards for Particle Size Instrument Calibration, World Congress on Particle Technology 3, (ICHEM) July 1998, Brighton, UK. Full details available from www.WhitehouseScientific.com.

**Table Summary**

Percentile	5	10	25	50	75	90	95
<b>Electroformed Sieving</b>							
Mean Size - $\mu\text{m}$	85.1	107.9	128.1	160.6	186.5	209.4	240.5
Uncertainty - $\mu\text{m}$	2.3	3.0	0.5	1.1	0.3	2.4	3.6
<b>Microscopy</b>							
Mean Size - $\mu\text{m}$	89.4	100.1	123.3	154.0	178.0	213.4	231.7
Uncertainty - $\mu\text{m}$	9.3	7.2	7.1	2.9	4.0	3.6	2.5
<b>Final Mean Size - <math>\mu\text{m}</math></b>							
	<b>86.2</b>	<b>105.9</b>	<b>126.9</b>	<b>158.9</b>	<b>184.4</b>	<b>210.4</b>	<b>238.3</b>
Uncertainty - $\mu\text{m}$ (95% confidence)	6.5	8.3	5.6	6.1	7.8	4.6	8.7

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