

Out of Stock - Item is not available at this time - Gold nanoparticles - Particle size (30 nm diameter)

Art. ID	NIST-8012
Unit	2 x 5 mL ampoules
Deliverydetails	No Dangerous Good /not restricted

Description

This Reference Material (RM) is intended primarily to evaluate and qualify methodology and/or instrument performance related to the physical/dimensional characterization of nanoscale particles used in pre-clinical biomedical research. The RM may also be useful in the development and evaluation of in vitro assays designed to assess the biological response (e.g., cytotoxicity, hemolysis) of nanomaterials, and for use in interlaboratory test comparisons. NIST-RM 8012 consists of nominally 5 mL of citrate-stabilized Au nanoparticles in an aqueous suspension, supplied in hermetically sealed pre-scored glass ampoules sterilized by gamma irradiation. A unit consists of two 5 mL ampoules. The suspension contains primary particles (monomers) and a small percentage of clusters of primary particles. /// Sample value(s) - please ask for current certificate.

Text/Information	Analyte/Parameter	CAS number	Concentration/Value	Unit	Method	Source
dry, deposited on substrate	Particle size		24,9 ± 1,1	nm	Atomic Force Microscopy	
dry, deposited on substrate	Particle size		26,9 ± 0,1	nm	Scanning Electron Microscopy	
dry, deposited on substrate	Particle size		27,6 ± 2,1	nm	Transmission Electron Microscopy	
dry, aerosol	Particle size		28,4 ± 1,1	nm	Differential Mobility Analysis	
liquid suspension	Particle size		28,6 ± 0,9	nm	Dynamic Light Scattering: 173° scattering angle (backscatter)	
liquid suspension	Particle size		26,5 ± 3,6	nm	Dynamic Light Scattering: 90° scattering angle	

liquid suspension	Particle size	24,9 ± 1,2	nm	Small-Angle X-ray Scattering
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