

SWX-262

Gamma Putty

GAMMA SHIELDING CLAYS AND PUTTIES



SWX-262 Gamma Putty is a malleable gamma shielding clay that contains no lead. Gamma Putty contains high-density bismuth that is uniformly distributed throughout the binder material to insure there are no gamma streaming paths. The additive is elemental bismuth, 90% by weight, and the material will not dry out to form a powder. It is supplied in chunks that are readily pliable by hand and holds its shape after placement.

Typical applications include temporary gamma shielding during reactor maintenance, shielding for cable tray penetrations, industrial radiographic film masking. Disposable gloves are recommended when handling as the putty is quite sticky.



1-Inch of Gamma Putty provides 0.4-inch of lead equivalent



It is non-hardening and it will not dry out to form a powder



Reusable and lead-free



Provided in 10 lb. (4.5 kg) cans



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Specifications

Composition Data

Hydrogen atom density/ cm ³ :	3.3 x 10 ²²
Natural isotope distribution:	99.98% ¹ H
Bismuth atom density/ cm ³ :	9.9 x 10 ²¹
Weight percent of bismuth:	90%
Total Density	3.8 g/cm ³ (238 lbs/ ft ³)

Radiation Properties

Macroscopic thermal neutron cross section:	0.01 cm ⁻¹
Lead equivalent thickness (inch):	0.39
Attenuation Factors for 1-inch	
200 keV	1.9 x 10 ⁴
500 keV	4.7
1.0 MeV	2.0
Attenuation Factors for 2-inch	
Ir-192	30
Cs-137	8.4
Co-60	3.0
Gamma resistance:	5 x 10 ⁸ rad
Neutron resistance:	2.5 x 10 ¹⁷ n / cm ²

Physical Properties

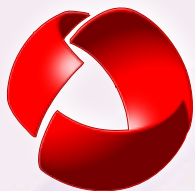
State	Putty
Color	Gray
Odor	No significant odor
Machinability:	Poor

Thermal Properties

Recommended Temperature Limit:	110 °F (45 °C)
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Chemical Properties

Chemical Name & Synonyms:	Borated poly putty
Trade Name & Synonyms:	SWX-262 Gamma Putty



A Division of Bladewerx LLC

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