

Evaporation Materials: Iodides, Nitrides, Sulfides, Selenides

Our evaporation materials are available as granules with size from 1mm, pellets with diameter from 5mm, targets with size up to 1,000mm. They are suitable for both electron- and ion-beam evaporation as well as ion beam sputtering. The parameters in the table below are approximate and depend on the sinter and application conditions.

material	ZrI ₄ zirconium iodide	Si ₃ N ₄ silicon nitride	Sb ₂ S ₃ antimony trisulfide	ZnS zinc sulfide	ZnSe zinc selenide
density colour transmission	4.9g/cm ³ yellow -	3.4g/cm ³ dark 300nm...4µm	4.6g/cm ³ dark gray 600nm...12.5µm	4.1g/cm ³ white-yellow 400nm...15µm	5.3g/cm ³ white-yellow 600nm...15µm

refractive index and transmission

wavelength					
140nm	-	-	-	-	-
150nm	-	-	-	-	-
190nm	-	-	-	-	-
300nm	-	2.18	-	-	-
400nm	-	2.10	-	2.55	-
600nm	-	2.04	3.19	2.36	2.56
800nm	-	2.02	3.12	2.31	2.50
1µm	-	2.01	3.05	2.29	2.49
2µm	-	1.98	2.94	2.27	2.45
4µm	-	1.90	2.85	2.25	2.43
7µm	-	-	2.72	2.23	2.42
8µm	-	-	2.61	2.22	2.42
10µm	-	-	2.43	2.20	2.41
12.5µm	-	-	2.35	2.16	2.38
15µm	-	-	-	2.10	2.36
standard form and size (other forms and sizes are available by request)	dia 18 x 10mm granules 1-6mm	granules 1-6mm			
price	730 EUR/kg	280 EUR/kg	by request	86 EUR/kg	630 EUR/kg

recommended crystalline quartz deposition monitors:

- with aluminium as electrode material (choice 1)
- with silver as electrode material (choice 2)