

PENTHRITE, PETN, NP

Pentaerythritoltetranitrate, Pentrite, Pentrit, Nitrpenta, Tetranitrate de pentaerythrite, Niperyt, pentaeritritoltetra nitrate, TEN, Pentaeritritoltetra nitrate, C₅H₈N₄O₁₂ (Mr 316.1)

Class 1.1D, UN 0150

Density, g/cm ³ :	1,78
Detonation velocity, m/s:	8370
Oxygen balance, % (m/m):	-10,1
Heat of explosion kJ/kg:	6318
Impact sensitivity, N/m:	3
Friction sensitivity N:	60

Technical specification

1. Color and appearance	white crystal, without mechanical impurities					
2. Melting point, °C	139					
3. Nitrogen, % (m/m), min.	17,5					
4. Insoluble in acetone, % (m/m), max	0,1					
5. Sandy materials	not allowed					
6. Acidity and alkalinity, % (m/m), max	0,005 as HNO ₃ and Na ₂ CO ₃ respectively					
7. Ash content, % (m/m), max	0,05					
8. Abel's test at 80° C, min	30 minutes					
9. Moisture, % (m/m)	15-25 (For transportation needs)					
10. Bulk density, g/dm ³	min 700, max 1000					
11. Particle size % (m/m), passes through DIN sieves size, mm						
	Grade 1	Grade 2	Grade 3	Grade 4	Grade 5	Grade 6
0.800 mm	min 98	min 99	-	-	-	min 98
0,630 mm	-	-	-	min 95	min 100	min 90
0,500 mm	-	80-95	-	-	-	-
0,300 mm	-	-	-	-	-	max 20
0,250 mm	-	10-20	-	-	-	-
0.150 mm	max 10	max 4	min 95	-	5-20	max 1
0.075 mm	-	-	65-80	max 30	-	-
0.063 mm	max 1	max 1	-	-	-	-

NOTE: According to Customer's request the penthrite of various granulometric compositions can be delivered.