CARBOGRIND

High-performance, low-density ceramic grinding media Sizes: 0.6-3.0mm | Apparent density: 2.6-3.0 g/cm³

Features

- Superior strength and hardness
- Uniform size and shape
- Exceptionally low internal porosity
- Chemically inert and environmentally friendly

Benefits

- High grind efficiency
- Longer product life cycle
- Decreases product contamination
- Reduces equipment wear and maintenance costs



CARBOGRIND® high-performance, low-density ceramic grinding media was the first product developed in our grinding product series and has been used in global mining operations for over two decades. It is engineered to provide unmatched economic and performance advantages in fine and ultra-fine grinding of soft and intermediatedensity minerals. The proprietary blend of raw minerals from our own mines along with our sintering manufacturing process results in superior strength and wear resistance with a consistent particle size and shape.

Applications and markets

- Vertical mills
- Mining and industrial minerals
- Ideal for grinding fillers for paints and pigments

Chemical and physical properties

Typical sieve analysis (weight % retained)

Sieve size (mesh)	Microns	260-006	260-008	260-010	260-015	260-020	260-030	280-020	280-030	300-020	300-030
-5+6	-4000+3350	-	-	_	-	_	14	_	7	_	13
-6+7	-3350+2800	_	_	_	_	_	43	_	86	_	53
-7+8	-2800+2360	-	_	_	_	6	43	12	7	_	34
-8+10	-2360+2000	_	_	_	_	39		49	_	19	_
-10+12	-2000+1700	_	_	_	3	4	_	31	_	78	_
-12+14	-1700+1400	_	_	-	26	1	-	8	_	3	_
-14+16	-1400+1180	_	_	5	64	_		_	_	_	_
-16+20	-1180+850	_	7	93	7	_	-	_	_	_	_
-20+30	-850+600	4	90	2	_	_	_	_	_	_	_
-30+40	-600+425	90	3		_	_		_		_	_
-40+50	-425+300	6	_	_	-	_		_		_	_

Other sizes and densities available on request.



Typical additional properties

	260-006	260-008	260-010	260-015	260-020	260-030	280-020	280-030	300-020	300-030
Bulk density (g/cm³)	1.56	1.57	1.58	1.61	1.63	1.64	1.72	1.69	1.98	1.82
Apparent density (g/cm³)	≥ 2.6	≥ 2.6	≥ 2.6	≥ 2.6	≥ 2.6	≥ 2.6	≥ 2.8	≥ 2.8	≥ 3.0	≥ 3.0
Vickers hardness* (0.5 kg)	800	800	800	800	800	800	960	960	1125	1125
Mohs hardness	7+	7+	7+	7+	7+	7+	7+	7+	7+	7+
Median particle diameter (mm)	0.5	0.7	1.0	1.4	2.2	3.0	2.1	3.1	2.0	3.1
Sphericity	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9	0.9
Color			Ligl	nt gray			Br	own	Dark gra	y/charcoal

Chemical composition

	260	280	300	
Al ₂ O ₃	>45	>55	>65	
SiO ₂	>45	>35	>15	
TiO ₂ , Fe ₂ O ₃ , Other	<u>≤</u> 5	≤10	<u>≤</u> 20	

*Standard deviation as % of median
Data is subject to change due to continuous improvement of the product.

