

ZI CONE

OUTLINE

Cone Crusher ZI series is developed to incorporate all the successful features of the previous CYBAS series and achieve the increased performance with the same size body.

The crushing plates of ZI CONE consist of a combination of a mantle and concave with grooves and special mild inserts (MSI). This arrangement leads to compound crushing consisting of not only compression crushing, but also crushing by bending and shearing actions. Synergy achieved by means of the compound crushing and high density inter-particle crushing in the lower part of the crushing chamber results in a crushing with large capacity with a smaller energy.

Allowing easy operation and maintenance in addition to the aforementioned features, the ZI CONE is a up-to-date crusher with advanced performance and high cost-efficiency.

FEATURES

High Crushing Capacity

The use of high capacity crushing chamber coupled with the effect of combined crushing has resulted in a remarkable improvement in crushing capacity.

High Set Under Ratio

The bisector line of the crushing chamber is almost vertical at the inlet. Its angle of inclination changes gradually until it reaches a specific angle at the outlet. As a result, the choke point is located at the lower part of the crushing chamber. Accordingly the density of the feed material is increased as it proceeds from the inlet towards the outlet. This causes inter-particle crushing due to high density in the crushing chamber. As a result, product having a roundish cubic shape can be produced, with high set under ratios.

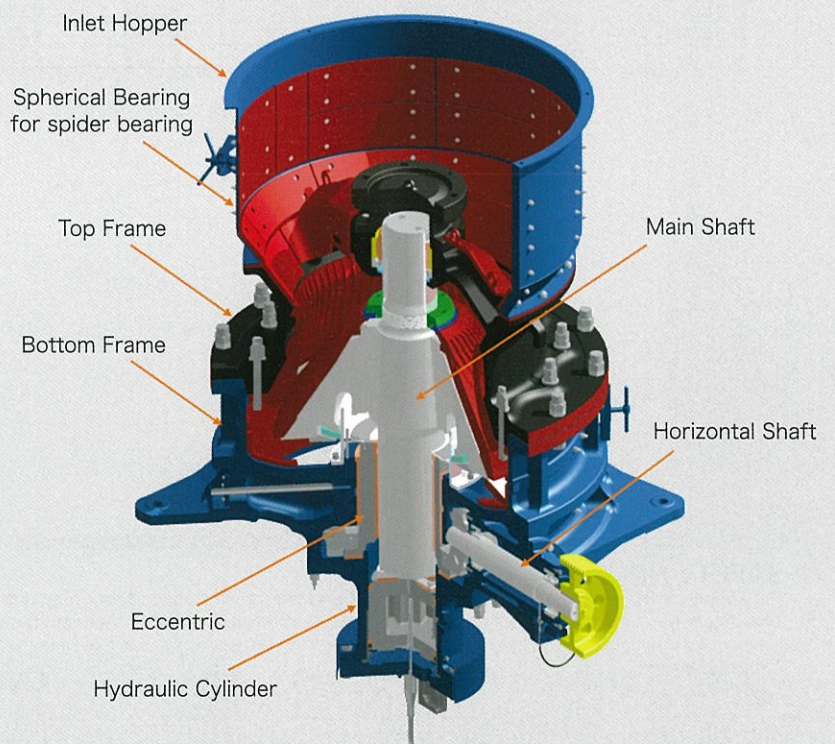
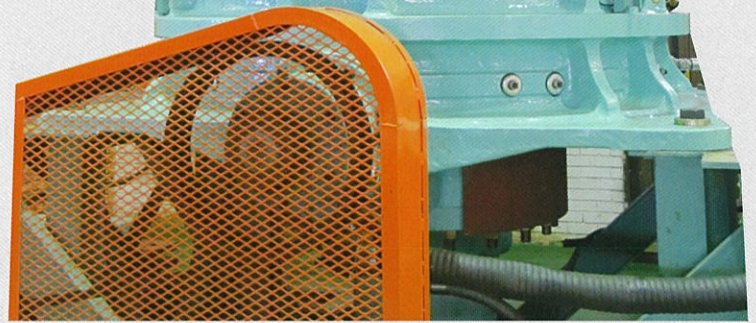
Lower Energy Cost

The ZI CONE performs combined crushing by bending, shearing and compressing actions of the grooved crushing plates compared to conventional smooth crushing plates which perform simple crushing by compression only. This leads to more effective use of the installed power which in turn leads to considerable energy savings.

Large Reduction Ratio

Having a large feed opening than that of conventional crushers and sharp grooved design of inlet, the ZI CONE can nip and crush large lumps of material smoothly and simultaneously without allowing them to slip down. Besides, the crushing chamber is designed in such a way that the groove arrangement ensures that the even wear from the inlet to the outlet. Different to the conventional cone crushers, the feed opening will not become smaller with the progress of wear in the crushing plates during their life.

("CYBAS" is a trademark registered in Japan for Japanese market)



EARTHTECNICA

EARTHTECNICA has inherited all of crusher business formerly handled by Kawasaki Heavy Industries and Kobe Steel.

SPECIFICATIONS

CAPACITY

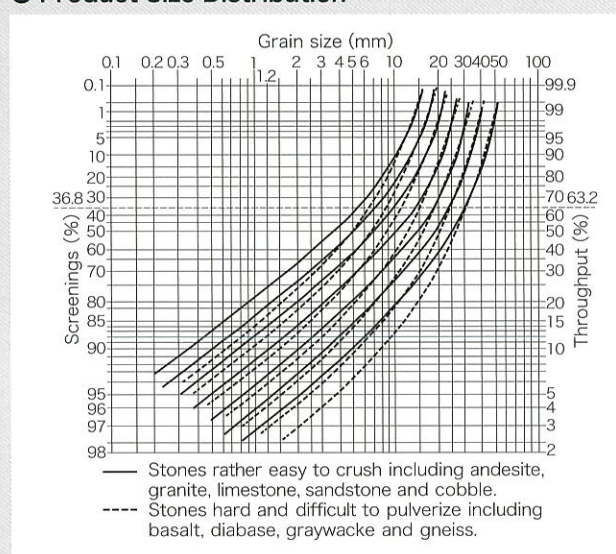
| Model | Max Motorsize (kW) | Nominal Capacity Range (mt/h) | | | | | | | | | | Approx. Weights(kg) | | |
|---------|--------------------|-------------------------------|---------|---------|---------|----------|----------|----------|-----------|-----------|-----------|---------------------|---------------------------------------|--------|
| | | Gap Setting (C.S.S.) (mm) | | | | | | | | | | Crusher Complete | Heaviest Lifting Item for Maintenance | |
| | | 10 | 13 | 15 | 18 | 20 | 25 | 30 | 35 | 40 | 45 | | | 50 |
| ZI-1000 | 150 | 97-141 | 114-181 | 123-198 | 141-221 | 148-240 | 181-275 | 203-322 | 224-358 | 273-392 | | | 10,600 | 2,800 |
| ZI-1200 | 220 | 140-200 | 164-259 | 176-283 | 203-316 | 214-343 | 261-394 | 293-460 | 322-512 | 398-560 | | | 16,800 | 4,300 |
| ZI-1350 | 280 | 176-218 | 208-302 | 226-358 | 249-399 | 267-433 | 313-497 | 366-581 | 403-647 | 485-708 | | | 24,900 | 6,600 |
| ZI-1500 | 315 | | 261-319 | 283-411 | 316-470 | 333-500 | 398-586 | 460-671 | 512-762 | 554-834 | 671-905 | | 32,600 | 8,300 |
| ZI-1650 | 400 | | 321-388 | 348-504 | 388-609 | 408-654 | 571-824 | 635-956 | 695-1090 | 746-1182 | 891-1272 | | 44,900 | 11,400 |
| ZI-1800 | 450 | | 369-459 | 400-582 | 447-710 | 470-763 | 550-893 | 657-1003 | 731-1116 | 800-1272 | 858-1380 | 1040-1485 | 61,000 | 15,000 |
| ZI-2100 | 750 | | 515-629 | 559-809 | 623-981 | 656-1053 | 768-1233 | 916-1384 | 1020-1540 | 1116-1756 | 1198-1905 | 1437-2050 | 93,900 | 23,500 |

Notes 1) The throughput capacity is applicable for the case where feed material having 1.6 mt/m³ unit volume weight (fine particles which is smaller than crusher gap setting is 10% or less of feed material amount) and having 100 MPa compressive strength is fed into circumference of crushing chamber evenly in quantity and size continuously.
 2) Above figures (throughput capacity) are the case where the standard eccentric throw is applied and where the above 1) material is fed. The throughput capacity will be changed depending on the type of material.
 3) The capacity will vary depending on feed size distribution, feed condition, crushing chamber type, moisture content, properties of feed material and so on.
 4) Materials and specifications are subject to change without manufacture's obligation.

● Max. Feed Size (mm)

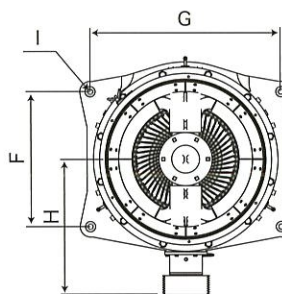
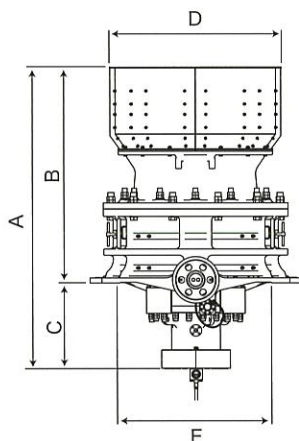
| | Type of Crushing Chamber | | | |
|---------|--------------------------|--------|---------------|---------------|
| | Fine | Medium | Medium-Coarse | Coarse-Coarse |
| ZI-1000 | 65 | 110 | 140 | 175 |
| ZI-1200 | 80 | 130 | 160 | 210 |
| ZI-1350 | 85 | 145 | 190 | 240 |
| ZI-1500 | 95 | 160 | 205 | 255 |
| ZI-1650 | 110 | 175 | 220 | 290 |
| ZI-1800 | 125 | 190 | 235 | 305 |
| ZI-2100 | 140 | 225 | 285 | 350 |

● Product Size Distribution



DIMENSIONS (mm)

| | A | B | C | D | E | F | G | H | I |
|---------|------|------|------|-------|-------|------|------|------|-----|
| ZI-1000 | 2575 | 1851 | 724 | φ1480 | φ1284 | 1100 | 1600 | 1118 | M36 |
| ZI-1200 | 3069 | 2193 | 876 | φ1776 | φ1506 | 1350 | 1920 | 1322 | M42 |
| ZI-1350 | 3436 | 2454 | 982 | φ1960 | φ1710 | 1530 | 2160 | 1532 | M48 |
| ZI-1500 | 3806 | 2749 | 1057 | φ2126 | φ1915 | 1700 | 2400 | 1707 | M56 |
| ZI-1650 | 4188 | 2988 | 1200 | φ2368 | φ2250 | 1950 | 2700 | 2041 | M64 |
| ZI-1800 | 4591 | 3269 | 1322 | φ2590 | φ2500 | 2200 | 3000 | 2235 | M64 |
| ZI-2100 | 5384 | 3844 | 1540 | φ3020 | φ2880 | 2500 | 3400 | 2460 | M80 |



SAFETY NOTE

Data is intended to describe ZI CONE CRUSHER and their performance fairly, may not apply to every machines.
 Specifications are subject to change without any obligation on the part of the manufacturer. Illustrated equipment and available colours may vary by user.

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