RD GROUP

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INCITIVE


## R.D. MINING EQUIPMENTS PVT. LTD.

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# RD JAW CRUSHER


*Powerhouse*

www.rdgroupindia.com

# RD JAW CRUSHER

*Powering up your crushing performance*

RD JAW Crushers have been developed to crush any feed materials into desired end products efficiently, reliably, and economically.

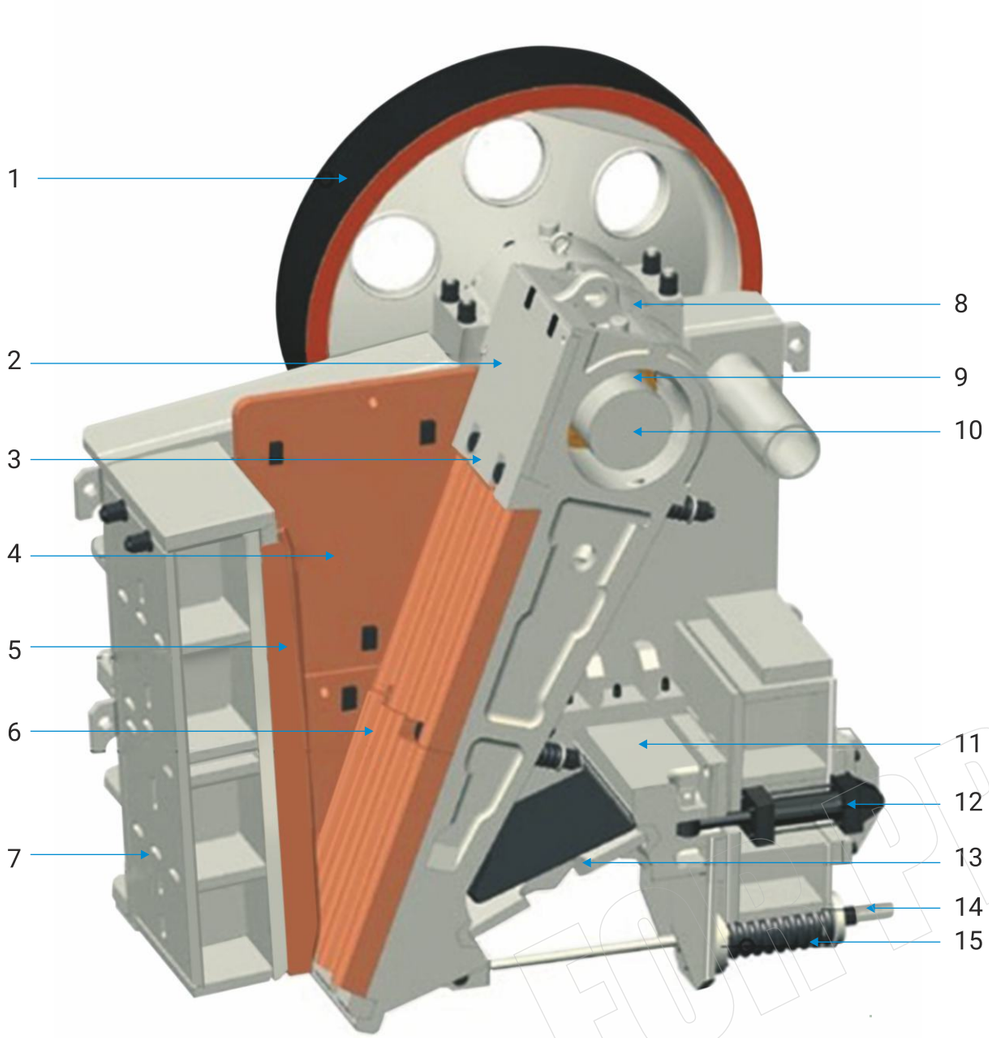
With hydraulically adjusted CSS, single toggle mechanism, and a choice of several different crushing jaw plate, and with optimized nip angle along with wide range of feed openings, each model is versatile, user-friendly and highly productive.

The RD Jaw Crushers have a wide field of use as they can easily be matched to changes in production through the proper selection of Jaw Crusher. Our Jaw crushers are ideal for any type of crushing ie gabbro, basalt, granite sandstone quartz etc, and the compact and easy-to- service design also makes them a perfect choice for any installations.

If your aggregate or mining business demands big capacities, superior power and high feed opening, you will find a RD Jaw crusher powering up for your needs. The RD Jaw Crushers also provide you with unlimited possibilities in smooth process adaptation and full crushing process automation.

## RANGE :

- RDJC 4436
- RDJC 4236
- RDJC 4432
- RDJC 4232
- RDJC 3628
- RDJC 3624
- RDJC 3022
- RDJC 3608
- RDJC 3015
- RDJC 2415
- RDJC 2412
- RDJC 2410
- RDJC 4208
- RDJC 4204

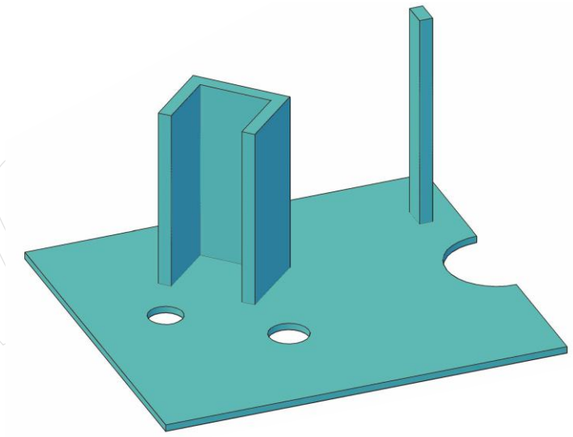



1 Fly Wheel
2 Movable Jaw Guard Plate
3 Movable Jaw Pressing Block
4 Cheek Plate
5 Fixed Jaw Plate
6 Swing Jaw Plate
7 Main Frame
8 Movable Jaw
9 Bearing
10 Eccentric Shaft
11 Adjustment Seat
12 Hydraulic Device
13 Toggle Plate
14 Tension Rod
15 Tension Rod Spring

## ROBUST DESIGN

- The RD Jaw Crusher is a single toggle jaw crusher, delineated by focusing on detail, in every aspect ie designing and manufacturing.
- We have consolidated the best of the orthodox practices and applied the benefits of the latest technology.
- The frame consists of two side plates of rolled steel, plus welded at front frame end and moving jaw which give a high rigidity/weight ratio. Big-radius transition areas reduce stress concentrations and welds are done at low-stress areas.
- The advantage of a welded frame is that it is equally strong in all direction. And boasts of excellent rigidity against shock-loads. Thus minimizing the risk of failure on the main-frame, as with a bolted construction.

FEA Analysis



## VERSATILE RANGE OF JAW PLATES

- RD Jaw Crusher's wear parts are caliberated to give high performance and lowest operating costs. Highest quality material and impeccable design ensure best quality parts.
- Optimizing in applications that are ensured through the available range of alternative jaw plate designs.
- All jaw plates are reversible.
- High grade M7 range of Jaw plates are used in the Jaw Crusher

C : Corrugated

ST : Sharp Teeth

HD : Heavy Duty

WT : Wide Teeth

CC : Coarse Corrugated

## LOWEST PER TON COST WITH HIGHEST PERFORMANCE

All our jaw crushers are of the single toggle type, with a deep, symmetrical crushing chamber and easy setting adjustment.

Each model has a large feed opening for its size and an optimized nip angle, giving smooth material flow, high reduction efficiency and high capacity.

Behind the simple design are many advanced features that ensure easy operation and maintenance, long life & a low cost per ton.

## SUPERCHARGED PERFORMANCE

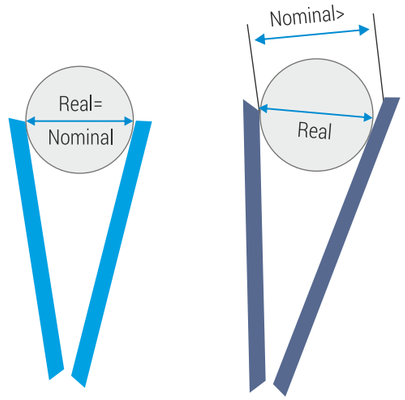
- **High capacity**
- **High reduction**
- **Low jaw plate wearing pattern**
- **Large feed acceptance capability**

These four factors are directly proportional and the RD jaw crusher provides an optimum balance. The design of the deep symmetrical crushing chamber maximizes feed size, capacity and reduction.

An optimized nip angle ensures that the material progresses smoothly down through the crushing chamber to enable high reduction, productivity and superb utilization of jaw plates.

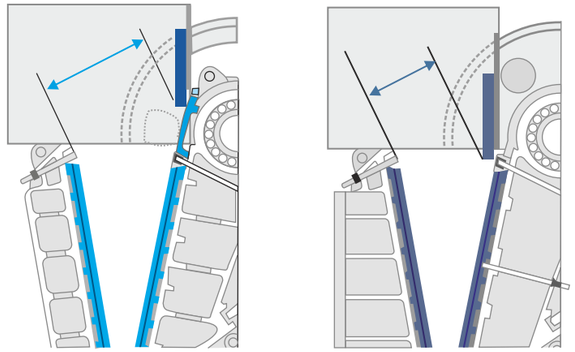
It is not just a large nominal feed opening that is necessary – the feed acceptance capability depends on a feed opening which is effective and active (see illustration). All crushers in the range have an almost square feed opening so that they can accept the max boulder size without blockages.. Big Boulders entering the crusher fall straight into the active region of the crushing chamber, so there is no need for a stationary cross-wall in the feed area.

### Effective feed opening




RD JAW Competitor

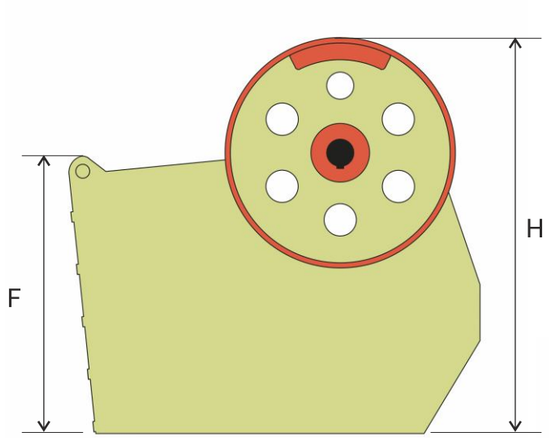
### Active feed opening

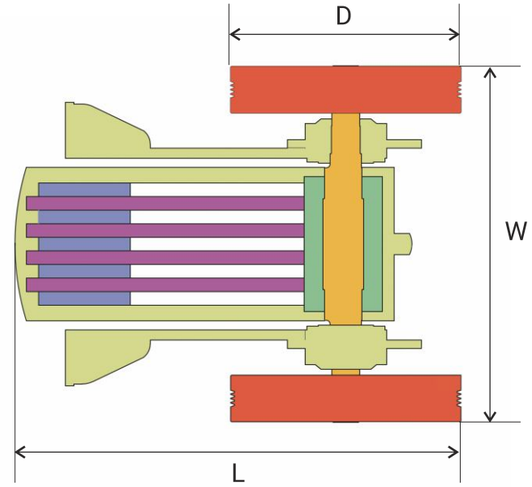


RD JAW Competitor

| Jaw Crusher | | Average Capacity in Tons/hr, with Jaw Setting (Closed setting) | | | | | | | | | | | HP | RPM |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Inches | | 1″ | 1½″ | 2″ | 2½″ | 3″ | 3½″ | 4″ | 5″ | 6″ | 7″ | 8″ | | |
| MM | | 25 | 38 | 50 | 63 | 75 | 90 | 100 | 125 | 150 | 175 | 200 | | |
| 24″ X 12″ | 610 X 305 | 28 | 33 | 43 | 48 | 55 | 62 | - | - | - | - | - | 50 | 280 |
| 24″ X 15″ | 610 X 381 | - | 40 | 45 | 53 | 60 | 70 | - | - | - | - | - | 50 | 280 |
| 30″ X 15″ | 762 X 381 | - | - | 50 | 63 | 70 | 80 | 88 | - | - | - | - | 50 | 280 |
| 30″ X 20″ | 762 X 508 | - | - | - | 68 | 72 | 80 | 90 | - | - | - | - | 60 | 280 |
| 36″ X 24″ | 914 X 610 | - | - | - | - | - | 80 | 90 | 125 | 140 | 175 | 200 | 100 | 280 |
| 36″ X 28″ | 914 X 711 | - | - | - | - | - | 115 | 140 | 165 | 190 | 215 | 240 | 100 | 280 |
| 42″ X 32″ | 1067 X 813 | - | - | - | - | - | 125 | 150 | 175 | 200 | 250 | 275 | 125 | 280 |
| 44″ X 32″ | 1118 X 813 | - | - | - | - | - | - | 165 | 190 | 230 | 280 | 330 | 150 | 280 |
| 42″ X 36″ | 1067 X 914 | - | - | - | - | - | - | 175 | 200 | 250 | 300 | 350 | 150 | 280 |
| 44″ X 36″ | 118 X 914 | - | - | - | - | - | - | 200 | 225 | 275 | 330 | 375 | 200 | 280 |

The capacity figures given in the table above are approximate and are intended only to give an indication of what the crushers can be expected to produce. They apply for the open-circuit crushing of dry blasted granite with a bulk density of 1600 kg/m3 (100 lbs/ft3) and a maximum size which can be fed into the crushing chamber without difficulty. The lower values apply for a feed from which the material finer than the crusher's CSS has been removed. The higher values apply for a feed which includes the fine material. The minimum CSS at which the crusher can be operated depends on the feed size distribution, the material's crushability (Wi), the degree of contamination and moisture in the feed, the type of jaw plates fitted and the condition of the manganese




| Css | CRUSHER MODELS | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | RDJC 4436 | RDJC 4236 | RDJC 4432 | RDJC 4232 | RDJC 3628 | RDJC 3624 | RDJC 3022 | RDJC 3015 | RDJC 2415 | RDJC 2412 | RDJC 2410 | RDJC 2010 | RDJC 4208 | RDJC 38X08 | RDJC 42X04 |
| Feed Size | 850 mm | 850 mm | 700 mm | 700 mm | 600 mm | 500 mm | 400 mm | 250 mm | 250 mm | 200 mm | 180 mm | 180 mm | 180 mm | 180 mm | 80 mm |
| Feed | | | | | | | | | | | | | | | |
| L | 2835 | 2725 | 2675 | 2490 | 2530 | 2445 | 2025 | 1690 | 1665 | 1655 | 1555 | 1535 | 1540 | 1485 | 1255 |
| W | 2410 | 2325 | 2375 | 2325 | 2100 | 2100 | 1785 | 1785 | 1615 | 1615 | 1615 | 1435 | 1050 | 1875 | 1985 |
| D | 1350 | 1350 | 1350 | 1350 | 1350 | 1350 | 1150 | 1150 | 1050 | 1050 | 1050 | 950 | 1150 | 1050 | 950 |
| H | 2675 | 2525 | 2455 | 2465 | 2300 | 2245 | 1850 | 1535 | 1515 | 1505 | 1555 | 1535 | 1540 | 1435 | 1255 |
| F | 2000 | 1800 | 1735 | 1550 | 1630 | 1555 | 1260 | 800 | 990 | 980 | 1030 | 1060 | 965 | 960 | 780 |
| Range | | | | | | | | | | | | | | | |
| Power | 150 | 100 | 150 | 100 | 75 | 75 | 60 | 50 | 50 | 50 | 50 | 40 | 50 | 50 | 40 |
| Wt | 24.6 T | 22 T | 22.5 T | 21.4 T | 17.2 T | 16.6 T | 10 T | 7.4 T | 6.6 T | 6.0 T | 4.7 T | 4.2 T | 7.6 T | 5.9 T | 5.3 T |

# 300 TPH WHEEL MOUNTED
# RD JAW CRUSHER