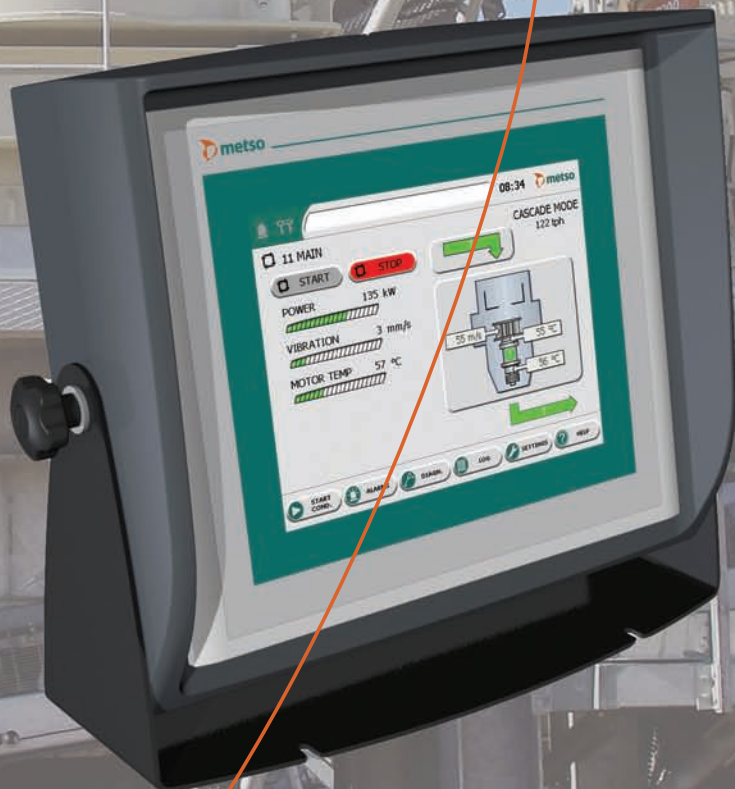
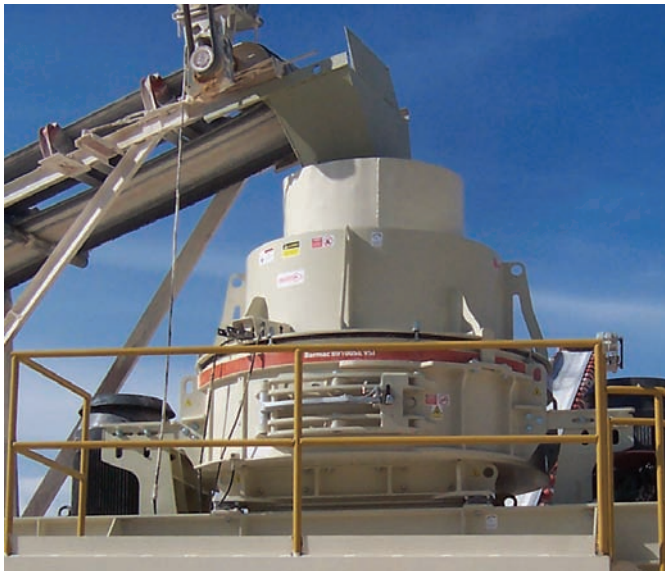


# Crusher automation Nordberg IC3000 VSI crusher automation





Barmac VSI crushers process a diverse range of materials in applications across the globe.



The Nordberg IC3000 automation system monitors and regulates crushing load, which minimizes the risk of inconsistent product.

# Nordberg IC3000 - maximizing the potential of your VSI crusher

Experience has proven that the key to profits in the aggregate production and minerals processing industries lie in the ability to produce consistent products of high quality.

As in other industries, automation plays a critical role in achieving that consistency. When a Metso Barmac VSI crusher is combined with a Nordberg IC3000

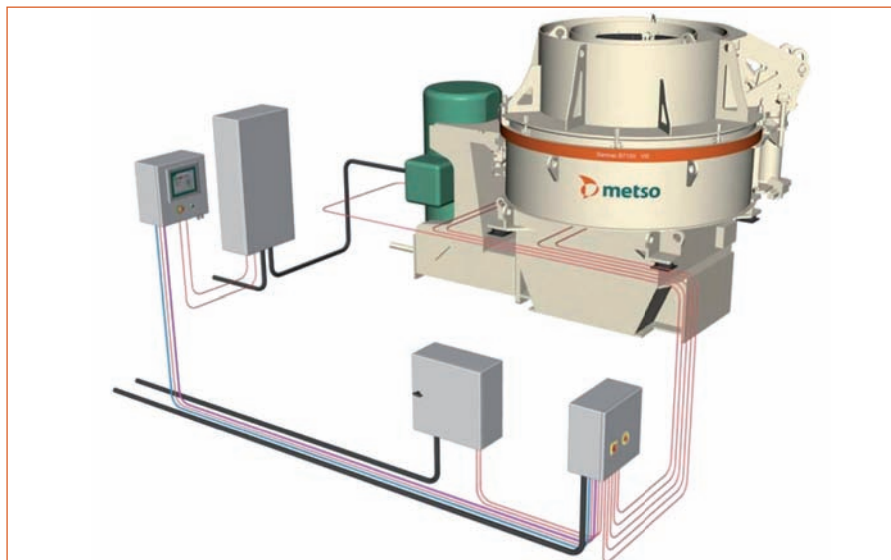
automation system, crushing load is monitored and regulated, minimizing the risk of inconsistent product. Of course this also results in greater crushing efficiency and, ultimately, improved product quality and cost-efficiency.

However the benefits of applying the Nordberg IC3000 automation system to the crushing process is not limited to

load regulation. The Nordberg IC3000 also provides improved safety features for protection of operators and the crusher. Maintenance time is reduced with the integrated automatic lubrication system. This reduces risk to the crusher from damage due to under or over greasing.

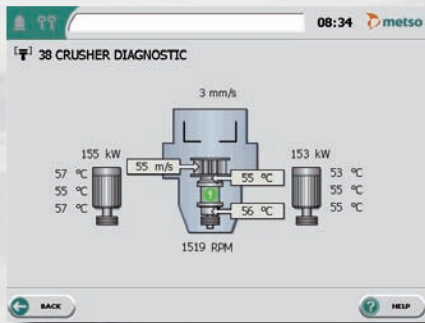
Today's customers are looking for suppliers who focus on solutions, not just products. With this in mind, Metso has developed the IC3000 automation system to provide increased flexibility and versatility, while supporting easy operation and maintenance. This allows seamless integration of your Metso Barmac VSI crusher with the rest of your Metso plant. Not only that, the IC3000 will also integrate with site level SCADA systems using industry standard communications protocols.

A Metso Barmac VSI crusher in combination with a Nordberg IC3000 automation system offers the ultimate in consistent, efficient and profitable crushing.



A complete Metso Barmac VSI crusher set up with an IC3000 automation unit

IC3000 operation features include lubrication control, crusher load monitoring and a safety system.



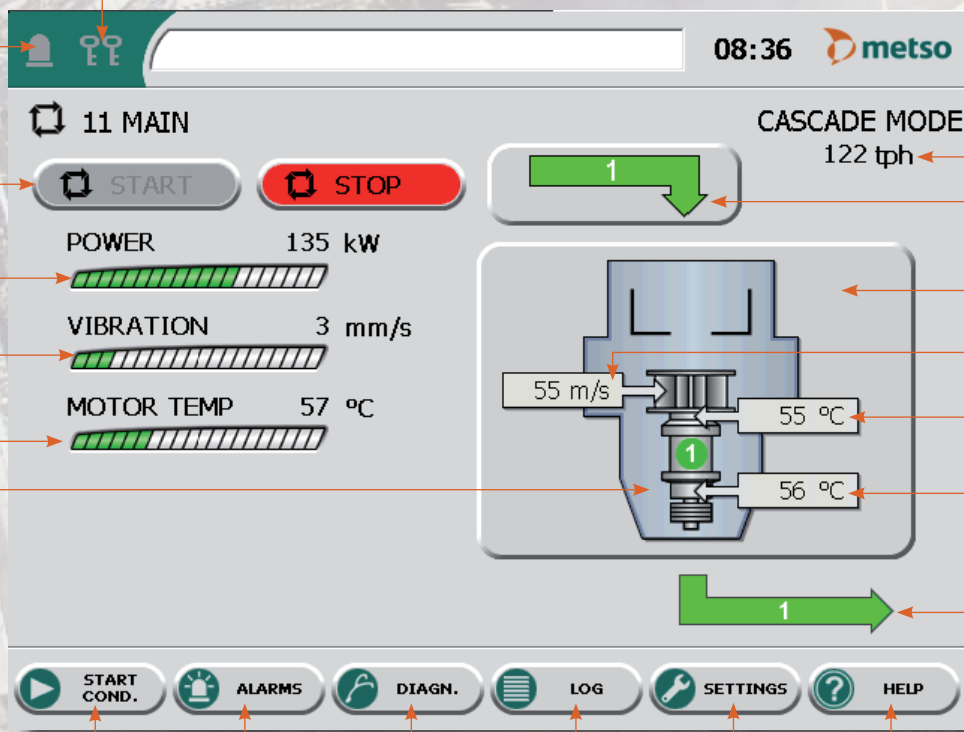
Crusher Diagnostic



Crushing log



- 20
- 19
- 7
- 8
- 9
- 10
- 17



- 12
- 13
- 11
- 14
- 15
- 16
- 18

- 1
- 2
- 3
- 4
- 5
- 6

- 1- Access to the «Starting conditions» menu
- 2- Access to the «Alarms» menu
- 3- Access to the «Diagnostic» menu
- 4- Access to the «Histories» menu
- 5- Access to the «Settings» menu
- 6- Access to the «Help» menu
- 7- Process start and stop
- 8- Crusher power graph
- 9- Crusher vibration graph
- 10- Motor temperature graph
- 11- Access to feeder menu
- 12- Active crushing mode
- 13- Crusher throughput
- 14- Access to crushing modes
- 15- Rotor tip speed
- 16- Bearing temperatures
- 17- Crusher running status
- 18- Discharge conveyor running status
- 19- Active alarm indication
- 20- User level

## Metso Mining and Construction Technology crushing equipment

### Our Nordberg, Barmac and Lokotrack brand ranges:

#### Unit crushers

- C Series jaw crushers
- Primary gyratory crushers
- GP Series cone crushers
- HP Series cone crushers
- MP Series cone crushers
- NP Series horizontal impact crushers
- B- and V-Series vertical impact crushers
- Laboratory crushers

#### Mobile equipment

- LT Series mobile crushing plants
- NW Series portable plants

#### Complete plants

- Complete plants for aggregate production
- Complete plants for recycling

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