



STEEL  
CONSTRUCTION

ANGLES & FLATS  
BEAMS & PIPES  
PLATES  
SURFACE TREATMENT  
SOFTWARE & AUTOMATION

**RB** SERIES  
Shotblasting systems





# RB SERIES

Shotblasting systems

## RB G SERIES

Roller conveyors are predominantly used to clean metal plates and profiles in a continuous through feed process. Ficep offers a variety of roller conveyors for different uses and work speeds.

The RB G range is mainly designed for the treatment of metal plates or profiles in the steel construction or steel preparation industries. The machines can be delivered as standalone units or integrated into an automatic material handling system for sawing or drilling.

The RB G range is offered with through feed widths from 23-5/8" to 118". The blasting wheels are positioned perpendicular to the flow direction of the roller conveyor. The RB 1500 is fitted with 4 shot blast wheels. The RB 2000 can be provided with either 4 or 6 wheels. The larger systems such as the RB 2500 and RB 3000, can be supplied with either 6 or 8 shot blast wheels. The 6-wheel version is used for treating plates or smaller profiles, whereas the 8-wheel version is mainly recommended for blasting profiles.



- 01 Light barrier
- 02 Shot blast wheel
- 03 Abrasive control unit
- 04 Abrasive silo
- 05 Abrasive reclaimer
- 06 Impact separator
- 07 Bucket elevator
- 08 Fan for Air-Shoc Filter
- 09 Pre-separator
- 10 Safety filter
- 11 Dust bag
- 12 Abrasive removal unit





### Characteristics for RB HD

- 01 Light barrier
- 02 Turbine wheel
- 03 Abrasive control unit
- 04 Abrasive silo
- 05 Abrasive reclaimer
- 06 Impact separator
- 07 Bucket elevator
- 08 Fan for Air-Shoc Filter
- 09 Pre-separator
- 10 Safety filter
- 11 Dust bag
- 12 Abrasive removal unit

## RB HD SERIES

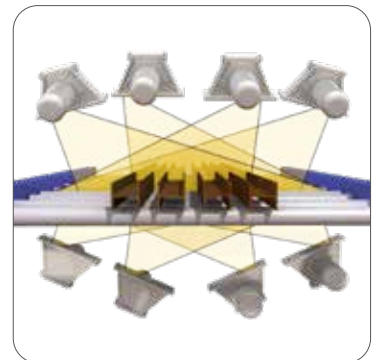
The RB HD range generates the highest performance statistics of this machine type for blasting plates and profiles. The main difference of this machine to others offered in the marketplace is the angled arrangement of the shot blast wheels on the top of the machine. This arrangement reduces the build-up of abrasive on the sections. By using this method a significantly larger percentage of the blasting energy is used on the main task, i.e. de-rusting and scale removal from plates and profiles, and avoids creating mass piles of abrasive.

In practise, the RB HD roller conveyor machine with angled wheels blasts between 5% and 20% faster than a roller conveyor with shot blast wheels that are installed straight. The RB HD roller conveyors are used where higher throughput and longer

maintenance intervals are required.

With these features, this machine is particularly useful for integration into fully automatic production lines. The RB HD roller conveyor range can be delivered with widths from 59" - 118". All of the machines in this range are suitable for shot blasting plates as well as profiles..

RB HD roller conveyors are principally furnished with the latest version of the TITAN shot blast wheel. There are of course many options available for these roller conveyors, such as automatic blast wheel shut off for products that do not cover the full width of the machine, blasting pattern adjustment of the external blast wheels or automatic separation of drilling and sawing chips.





### SHOT BLAST WHEEL

The RB-GL is equipped with four Roto-Jet blast wheels offering excellent blasting performance and unbeatable service life due to the main blast components made of hardened tool steel.



### SHOT BLAST WHEEL TITAN 5.3 ETA

RB-G & RB-HD lines are equipped with up to eight Roto-Jet TITAN 5.3 ETA blast wheels offering excellent blasting performance and unbeatable service life due to the main blast components made of hardened tool steel.



### SHOTBLAST CABINET

The shotblast cabinet is completely manufactured from manganese, an extremely hard material which can deal with shotblasting from 35 on the Rockwell C scale to more than 50 on the same scale. In the hot spot area, additional 3/8" thick manganese plates are installed.



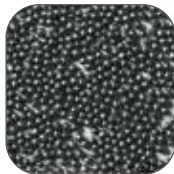
### ABRASIVE REMOVAL UNIT

Rotating brushes remove the shot left on the workpiece after the blasting process, which is moved to a rotating screw conveyor to recycle the shot back into circulation.



### CARTRIDGE FILTER UNIT

Rust and shot dust generated during the blasting process are addressed by a cartridge filter unit designed in solid steel sheet and mounted on top of the cabinet. The filters clean the cartridges automatically and continuously using an air pressure pulse.



### ABRASIVE SHOT BLAST

During its circular movement inside the machine, the blast shot is continuously cleaned of contamination. For a good blasting result, a balanced mix of new and used blast shot is imperative.



### LOADING AND UNLOADING

Blasting machines can be integrated into a drilling and sawing line thanks to cross transfers and auxiliary rollerways, to have a fully automatic system.

RB G SERIES Shotblasting systems	RB1500G 4/11	RB2000G 6/11	RB2500G 6/11	RB2500G 8/11	RB3000G 6/15	RB3000G 8/15
Machine entrance size [inch]	63" x 21-5/8"	84-5/8" x 21-5/8"	104" x 21-5/8"	104" x 21-5/8"	124" x 21-5/8"	124" x 21-5/8"
Wheels [no.]	4	6	6	8	6	8
Installed driving capacity [max HP]	15	20	25	20	25	20
Turbines diameter [inch]	15"	15"	15"	15"	15"	15"
Blades width [inch]	2-1/2"	2-1/2"	2-1/2"	2-1/2"	2-1/2"	2-1/2"
Plates width [max inch]	59"	78-3/4"	98-3/8"	98-3/8"	118"	118"
Beam size [max inch]	39-3/8"	39-3/8"	39-3/8"	39-3/8"	39-3/8"	39-3/8"

RB GL SERIES Shotblasting systems	RB1500 4/11
Machine entrance size [inch]	59"x31-1/2"
Wheels [no.]	4
Installed driving capacity [max HP]	15
Turbines diameter [inch]	15"
Blades width [inch]	2-1/2"
Plates width [max inch]	59"
Beam size [max inch]	39-3/8"

RB HD SERIES Shotblasting systems	RB1500HD 4/18,5	RB2500HD 8/18,5	RB3000HD 8/18,5
Machine entrance size [inch]	63" x 21-5/8"	104" x 21-5/8"	124" x 21-5/8"
Wheels [no.]	4	8	8
Installed driving capacity [max HP]	25	40	40
Turbines diameter [inch]	15"	15"	15"
Blades width [inch]	2-1/2"	2-1/2"	2-1/2"
Plates width [max inch]	59"	98-3/8"	118"
Beam size [max inch]	39-3/8"	39-3/8"	39-3/8"

TECH SPECS

Please review FICEP's terms and conditions of sale and system specifications that are in our formal proposal. The manufacturer reserves the right to change specifications and features from those indicated in this brochure. Current specifications and features are part of the formal quotation. The capabilities stated are subject to the ASTM A6/A6M standard as it relates to mill tolerances for straightness, thickness and surface conditions.



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