

# MRT CRT Separator Diamond Cutting Technology





## The CRT Separator using the diamond cutting technology is a high capacity disassembling system for Cathode Ray Tubes.

Like any other product in the MRT portfolio, the CRT Separator operates very safely, efficiently and in accordance with the strictest environmental regulations. The system is an automatic, reliable and cost effective solution with a capacity of more than 45 CRT units per hour. The high accuracy on the cut which separates the cathode ray tube into panel and funnel glass fractions gives the possibility to add more recycled glass into the glass melt for energy- and raw material savings.

After the vacuum is released the implosion tape and the electronic gun are removed. The screen-size is measured and the cutting position is identified. This can either be done manually with a laser pointer or with an automatic vision system.

When the separation is completed the glass is conveyed to the vacuum cleaning station, where the shadow mask and fluorescent powder are removed.

To achieve sub pressure in the cutting chamber the process is enclosed. The ventilation system controls and collects the dust from the cutting process.

*The CRTs are fed into the machine free from housing, electronics and stickers.*



## TECHNICAL DATA

### PERFORMANCE

Capacity: up to 45 pcs/hour  
(20 inch monitor) Material Fractions: funnel glass, panel glass, shadow mask, rare earth powders and glass dust.  
Material Collection: Glass dust/powder in cyclone, other material in boxes/containers (customer specs)  
Operational temperature range: + 10°C - + 50°C

### DIMENSIONS

CRT size: 14-32 inches  
Measurements:  
Length: 8 000 mm  
Width: 8 500 mm  
Height: 3 770 mm  
Standard configuration between entry and exit point.  
Length and width may vary depending on customer demands for layout.

### CONSUMPTION

Estimated utility  
Electrical connection: 400V 50Hz  
Electrical consumption: approx. 10 kW  
Compressed air: 500 l/min,  
supply pressure: 6 bar, dry

### MAIN COMPONENTS

Turntables with suction pad, conveyors, size-measuring unit, cutting station, ventilation system (fan and dust filters), glass dust cyclone.

### OPTION Vision system

*We reserve the right to change technical data without notice.*



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