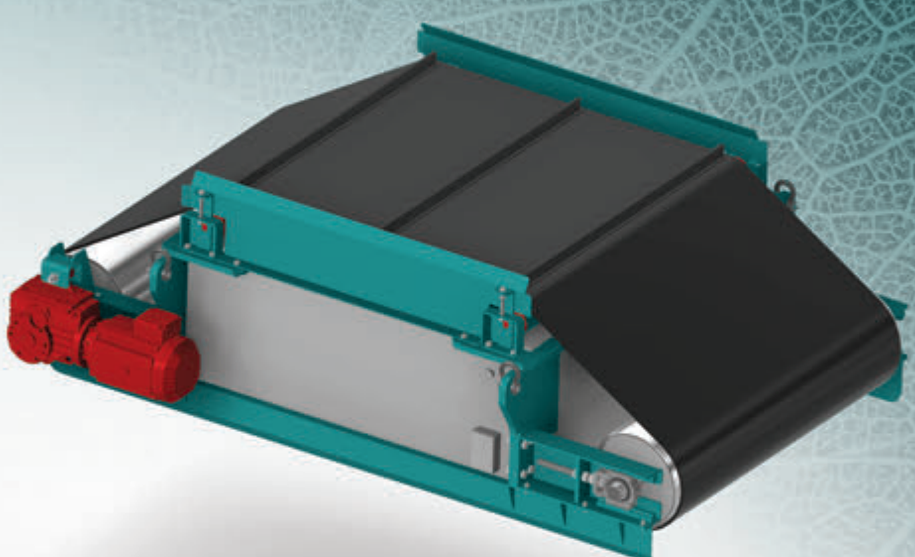
SIGMA®

SIGMASA.pl

# ELECTROMAGNETIC SEPARATOR

## SEM 120-140 / SEM 140-160

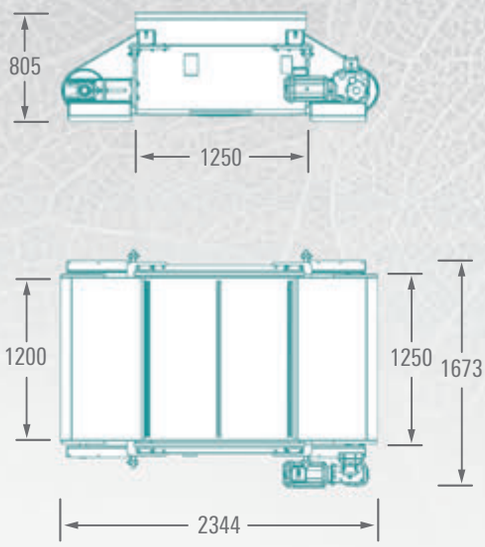


Electromagnetic separator SEM is dynamic system designed to collect and separate ferrous and magnetic materials from input material (fraction) transported on belt conveyor. The principle of device's operation is to place certain working area of belt conveyor under intensive magnetic field generated by electromagnet block. As result, steel materials transported on conveyor belt are captured (collected) in middle area of electromagnetic separator and moved by separator's belt towards its end, where magnetic field generated by electromagnet is lower. When magnetic attraction disappears, steel material automatically falls on other conveyor or into the container.

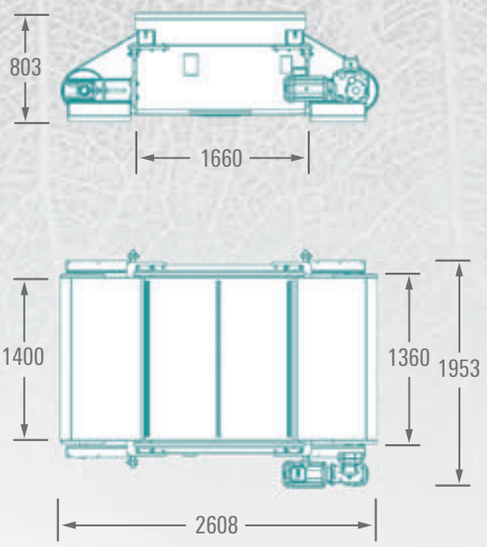
## ELECTROMAGNETIC SEPARATOR

### DIAGRAM

SEM 120-140




SEM 140-160




| TECHNICAL CHARACTERISTICS | SEM 120-140 | SEM 140-160 |
|---|---|---|
| SIZE OF ELECTROMAGNET BLOCK (length; width; height) [mm] | 1250; 1250; 495 | 1660; 1360; 505 |
| TOTAL ELECTROMAGNET'S POWER DEMAND [kW] | 6.1 | 8 |
| POWER OF BELT'S DRIVE RESPONSIBLE FOR COLLECTION OF CAPTURED ELEMENTS [kW] | 3 | 4 |
| TOTAL WEIGHT OF DEVICE [kg] | ~ 3100 | ~ 3100 |
| MAXIMUM SUSPENSION HEIGHT OF SEPARATOR ABOVE BELT [mm] | 490 | 560 |

## POSSIBLE OPTIONS TO INSTALL THE SEPARATOR

LONGITUDINALLY over the chute, parallel to the direction of the conveyor belt run
– configuration recommended for conveyors of max. belt width
B = 1200 mm (SEM 120-140) / B = 1400 mm (SEM 140-160)

TRANSVERSELY over conveyor belt route, perpendicular to the direction of the conveyor belt run, or in the same way above conveyor's chute
– configuration recommended for conveyors of max. belt width
B = 1400 mm (SEM 120-140) / B = 1600 mm (SEM 140-160)

! **Technical parameters of our devices are being selected according to experience of SIGMA engineers and individual customer's requirements.**