

A large industrial metal separator machine, labeled "SXS Metal Separator", is shown in a factory setting. The machine is grey and has a hopper at the bottom. It is surrounded by other industrial equipment, including a green machine and a yellow machine. The background shows a factory floor with various pipes and structures.

Metal separators allow economic processing of regenerated material

Regenerated Material Processing

Product:
GF

In the production of plastic parts for industrial electronics and automotive components, whether in small series with less than 500 parts per year or with annual production volumes of several million parts, the requirement for maximum process reliability has top priority. Environmental as well as economic considerations result in the use of industry-grade granulate (regenerated material, regrind) for plastic parts that in the end often are not visible, because a slight loss of optical properties is not important here.

The processing of regenerated material and regrind, however, is complicated by possible contaminations with foreign substances such as metal particles. Depending

on the production system this may cause unwanted machine downtimes due to damage or clogging. The apparent economic advantage thus is quickly lost if downtimes caused by contaminations cannot be avoided. Using metal separators is the most reliable method for removing metal particles.

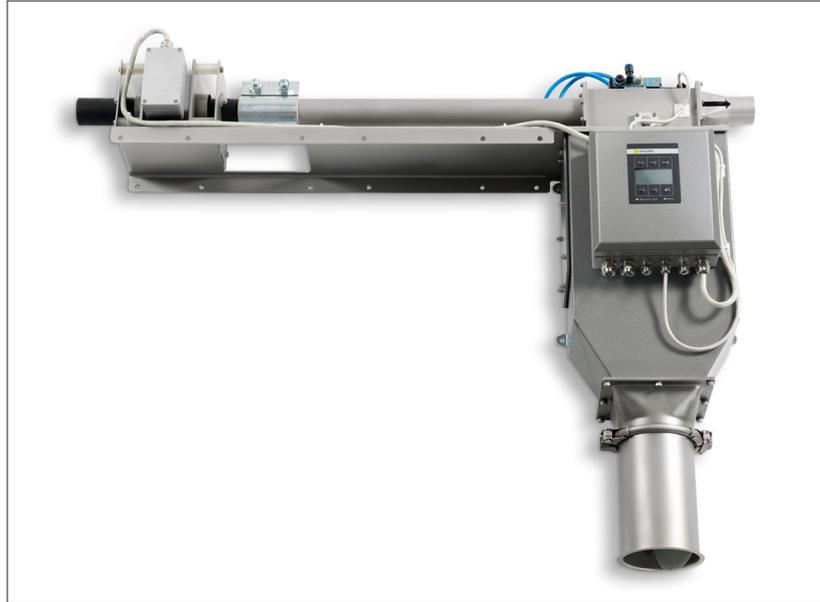


Regenerated plastic material (industry-grade material) containing metal contaminations. X-ray analysis (right picture) shows a metal particle that is completely embedded in the granulate.

Sesotec GmbH provides metal separators for the inspection and purification of plastic granulate (new material and industry-grade material). The metal separator of type GF, for example, is especially suited for installation in vacuum and pressure conveyor pipes. Once installed it ensures undisturbed production. Only the use of metal separators allows an economic processing of granulate mixed with regenerated material or regrind.

The GF metal separator removes metallic contaminations (steel, stainless steel, aluminium, etc.) from the pneumatically conveyed regenerated material. Installed directly in the vacuum conveying pipe of the material conveyor for the injection moulding machine, it reliably separates metallic contaminations, even such contaminations that are embedded in a granulate grain. With the "Easy Mount System" the metal separator can be installed in already existing vacuum conveying pipes

without any problems. Parts in contact with the product are made of stainless steel (1.4301). The outwardly sealed reject unit prevents any impairment of the function of the material conveyors due to outside air.



Installed in the conveying pipe the Sesotec GF metal separator removes metal contaminations from regenerated plastic material and thus eliminates the causes of machine downtimes and defective parts.

Product effects of the bulk material that are caused by moisture, colour pigments, or carbons, are automatically compensated, which guarantees a constant scanning sensitivity. With default settings the systems provide outstanding ease of operation. One advantage of the fast-acting "Quick-Flap-System" is the minimum loss of good material. Contaminated material is collected in a collection container and is thus available for detailed analyses.

Says Gerhard Kerschhackl, area sales manager of Sesotec Business Unit Plastics: "Sesotec metal separators are absolutely state-of-the-art, of outstanding quality, and they operate with highest reliability. Sesotec systems provide a rapid return on investment because they prevent the causes of downtimes and expensive

repair work and guarantee optimal machine running times and product quality. Customers from the plastics-processing industry who have once acquired a metal separator to protect their machines later in most cases also purchase additional systems."

Sesotec - an overview

The Sesotec group is one of the leading manufacturers of machines and systems for contaminant detection and material sorting. Product sales primarily focus on the food, plastics, and recycling industries. Sesotec's global presence includes subsidiaries in Great Britain, Singapore, China, USA, France, Italy (2), India, Canada, Thailand, a representative office in Turkey, and more than 60 partners all over the world.

www.sesotec.com