

Information

Soft PVC recyclates + agglomerates



Contents

1. The path from recyclable materials to a sustainable resource
2. Preparation
3. Soft PVC recyclates and agglomerates

The path from recyclable materials to a sustainable resource

The recirculation of cleanly sorted plastic recyclables (formerly plastic waste) into the production process is referred to as mechanical recycling. The designation “plastic” is made based on the international, standardized coding system that distinguishes the types of plastic, for example:



Soft PVC recyclable materials are the core competence of Caretta

The plastic waste material must be collected directly at the point of origin and subjected to mechanical processing. Collection through dealers implies the risk of contamination (e.g. through outdoor storage) and mixing with other plastics.

Plastics exchanges offer deals over thousands of tons of plastic, but after careful evaluation, they are not usable due to mixing, pollution and various foreign objects, or need to be first cleaned and sorted in a very elaborate and time-consuming manner.

Cleanly sorted thermoplastic production waste must first be prepared prior to being recycled. Alternative processes are, for example, shredding, crushing, dedusting or agglomeration. Only afterwards is a renewed industrial use at all possible.

Caretta has chosen the path of a direct partnership with the German plastics processors' associations and industry, and together found a way to recycle plastic waste materials up to **100%** again.

Sustainability has a high priority at **Caretta** and is implemented in an integrated, holistic approach.

Caretta®

PVC weich Recyclate + Agglomerate



Detailed view of HEMAWE
Caretta's unit that separates PVC
regrind and textiles



Detailed view of the material
handling conveyor technology
used and the extraction of fabric
fluff

Caretta operates on the principles of a responsible and sustainable environmental philosophy.

Caretta has specialized in the treatment of soft PVC recycling materials, especially in the treatment of PVC laminates (PVC laminated with non-woven, woven fabric or textile). These soft PVC recyclable materials are made from virgin material to satisfy the high standards of the automotive industry, for example. The development of a processed separation between PVC and non-woven mats, woven fabrics or textiles was and is a strategic task for **Caretta**.

Processing PVC waste materials with non-woven mats, fabrics or textile lamination is done using a fully automatic separation unit.

The soft PVC recyclable materials with lamination that are collected and pressed by the production units are shredded, crushed, dedusted sifted and shaken (separation of non-woven mats, woven fabrics or textiles from the PVC) and subsequently agglomerated (to bind still-free fibers in the agglomerate).

Caretta[®]

PVC weich Recyclate + Agglomerate



View of the unit's components, especially the screening and separating technique for cleaning the material from fabric remnants.



Crucial to a clean separation is the interplay between screening and extraction units, which can only achieve optimal results based on years of experience. Standard solutions are adapted to the existing input materials and then optimized.

Our sustainable soft PVC raw materials conform to the requirements of the REACH list. We are registered at ECHA in Helsinki with submissions no. KG 646570-41, EZ 649543-03 and HZ 648778-84.

We produce two soft PVC recyclates with a hardness of approx. 64 - 70 shore:

- soft PVC recyclate: shredded and screened
- soft PVC recyclate: shredded, screened and agglomerated.

Delivery: ex works in BIG BAGs

Content: per Big Bag or octabin approx. 850 - 1000 KG

We use our soft PVC recyclate to manufacture films. You can find our product information at: www.caretta-folie.de