

DELLITE[®] 43B

Dellite[®] 43B is a nanoclay deriving from a naturally occurring montmorillonite especially purified and modified with a quaternary ammonium salt (dimethyl benzylhydrogenated tallow ammonium).

Dellite[®] 43B is an additive for polymer application, used to improve various physical and thermo-mechanical properties.

Applications

- Polyolefins
- Polyester
- Polystyrene
- Ethylene Vinyl Acetate
- Polyamides
- Epoxy and acrylic resins
- Rubbers and Elastomers
- (...)

Advantages of Dellite[®] 43B in Polymeric Systems

- Oxygen, CO₂ and water vapour barrier
- Thermal stability
- Stiffness
- Melt fracture reduction
- Solvent/Chemical resistance
- Weight reduction
- Fiberglass reduction
- Rheology control
- UV transmission
- Flame retardant and Antidropping
- (...)

Chemical and physical data

		DELLITE [®] 43B
Colour		off white
Moisture	[%]	4 (max)
Loss of ignition	[weight %]	35 – 38
Particle size (dry)	[µm]	7-9 (medium)
Particle size after dispersion	[nm]	1x500 (medium)
Modifier		dimethyl benzylhydrogenated tallow ammonium
Specific weight	[g/cm ³]	1.6
Bulk density	[g/cm ³]	0.40

Incorporation

- Thermoplastic Systems
According to the application the incorporation of Dellite[®] 43B into a thermoplastic system is usually carried out as follows:
 - a) Adding up to 50% of Dellite[®] 43B in a masterbatch and diluting the master in the final compound
 - b) Adding directly the Dellite[®] 43B to the compound.

- **Thermoset Systems**

The incorporation of Dellite[®] 43B into a thermoset system may be obtained using the following methods:

- a) Mixing the desired amount of Dellite[®] with the resin. Then the curing agent and other additives may be added.
- b) Mixing the desired amount of Dellite[®] with the curing agent. Then the resin and other additives may be added.
- c) Resin, curing agent and additives are mixed and then Dellite[®] 43B is added.

Dosage

The typical levels of use are included in the range 1-5% based on total system weight .

Storage Stability and Packing

Product does not deteriorate in a significant way in a twelve months period.

Storage is advisable in a dry sheltered place in closed bags.

Packing is 25kg net paper bags on wood pallets of 1200kg each. Different packing is possible if required.

Information given in this bulletin is based on the state of our knowledge at the date of publication and are believed to be accurate, but do not constitute any engagement or warranty from our part. Buyers and users should make their own assessments under their own conditions and for their own requirements. Information may be changed without any notice. For mandatory characteristics and performance please refer to our Sale Specifications.