BENTONITE WATER POLLUTION



Bentonite is a type of clay that swells and gels when dispersed in water. It acts like a liquid when agitated or stirred and like a solid when left at rest.

As "mud" it is used as a lubricant when drilling or pipe pushing and as "slurry" it is used to fill and support the sides of excavations during the construction of diaphragm walls, cut-off walls, or piles.

The use of bentonite can lead to spillage around operational areas and around mixing, pumping and storage equipment.

Liquid bentonite is highly polluting and if it enters watercourses or drains can give rise to damage to plants and animals in watercourses. Pollution of watercourses by bentonite **may lead to prosecution**. If not correctly managed, bentonite in powder form can become airborne causing dust nuisance to local residents leading to legal action by the Local Authority.

DO

- Keep dry powder or granule containers closed to prevent dust or damage by rain or moisture.
- ✓ Ensure that bentonite does not spill onto the ground.
- ✓ Ensure that if spillages do occur they are promptly cleared up.
- ✓ Protect watercourses and drains from any spillage of liquid bentonite.
- Report immediately to your manager any incidents where bentonite is seen entering a watercourse or a drain, or is becoming airborne.
- ✓ Ask your manager what to do with waste bentonite.

DON'T

- ✗ DON'T leave containers or bags containing bentonite open to the air.
- X DON'T ignore spillages on the ground.
- X DON'T intentionally allow liquid or powdered bentonite to spill onto the ground.
- X DON'T pour bentonite into watercourses or drains.
- X DON'T give bentonite away to third parties without checking with your manager.



Issue 1 MTS-GD-E-002 Version 1