



Flexement

Duram Flexement is a versatile waterproofing additive for cement. When adding Flexement to a cement mix, the result is a waterproof and flexible mixture that can be used to waterproof a wide variety of structures. Flexement can also be used to improve the bonding and adhesion of screeds and skimcoats.

Colour: Milky Liquid

PRODUCT USES

You can use Duram Flexement to:

- Create a waterproof cement slurry.
- Waterproof and improve the adhesion qualities of mortar for screeds, plastering and concrete.
- Waterproof tiled areas when adding Flexement to tile adhesive and grouting.
- Fill cracks when mixed with cement.
- Bridge cracks when used with Duram Flexemesh.
- Improve the flexibility of cement and mortar mixes.
- Waterproof a wide variety of structures including flat roofs, balcony and veranda floors, retaining and foundation walls, shower floors and walls, flower boxes, fish ponds, water features, water troughs, dams, reservoirs, irrigation channels and furrows.

ADVANTAGES

- Strengthens and waterproofs all cementitious substrates.
- Improves the adhesion qualities of cement and resists substrate movement.
- Increases the flexibility of cement and mortar mixes.
- Withstands permanent immersion in water.
- Good abrasion resistance.
- Versatile and economical.
- Easy to use – simply mix with cement.
- UV stable.
- Non-toxic and environmentally friendly.

COVERAGE

- Waterproofing slurry with Duram Flexemesh membrane: 1 m² per litre per coat. Applied in a 4 coat application.
- Bonding / bagging slurry: 6 – 8m² per litre per coat. Applied in a 1 coat application.

SURFACE PREPARATION

- Ensure all substrates are thoroughly clean, sound, cured and free from any contaminants such as dirt, salt, algae and grease. Remove all loose material either mechanically, with a wire brush, with water or sand blasting.
- Repair damaged surfaces to a sound condition before coating.

MIXING & APPLICATION: WATERPROOFING SLURRY

- **Mixing:**
 - Referring to the mixing ratios table below, mix the Duram Flexement with the water first.
 - Then slowly add the required amount of Portland cement, stirring continuously to prevent the formation of lumps until a paste of uniform consistency is produced. A slow speed mixer (set at 400-600rpm) is recommended for quantities of 5 litres of Flexement or more.
 - To prevent settling, the mixture should be stirred periodically during use.

INGREDIENTS	MIXING RATIO		
Flexement	1 litre	5 litres	25 litres
Water	1 litre	5 litres	25 litres
Portland Cement	3,4 Kg	17 Kg	85 Kg
Produced Volume	3 litres	15 litres	75 litres

- **Application with Duram Flexemesh:**
 - Saturate the substrate thoroughly with clean water.
 - Apply a generous priming coat of the waterproofing slurry onto the damp surface.
 - Soak the Flexemesh membrane in the waterproofing slurry to obtain maximum saturation, and immediately lay it onto the primed substrate. The saturated membrane should overlap by 50mm on all joints.
 - Press out any air pockets and creases in the Flexemesh.
 - Apply 2 further coats of the waterproofing slurry, allowing to dry between coats.

MIXING & APPLICATION: BONDING & BAGGING SLURRY

- **Mixing:**
 - Mix the Duram Flexement and water in equal proportions by volume.
 - Separately, mix clean building sand with Portland cement in equal proportions by volume.
 - Then slowly add the sand/cement mixture to the diluted Flexement/water mixture. Continue mixing until a uniform, lump-free paste is obtained.
 - To prevent settling, the mixture should be stirred periodically during use.
- **Application:**
 - Saturate the substrate thoroughly with clean water.
 - Apply a generous coat of the slurry using a block brush onto the damp surface.
 - For Bonding: immediately apply the screed while the slurry is still wet.

MIXING & APPLICATION: SCREEDS & PLASTERING

- **Mixing:**
 - Replace 50% of the water specified in the cement instructions with Duram Flexement. Mix the water and Flexement together.
 - Separately, mix clean building/plastering sand with Portland cement according to your required proportions.
 - Then slowly add the diluted Flexement/water mixture to the sand/cement mixture. Continue mixing until a uniform, lump-free consistency is obtained.
- **Application:**
 - Apply screed or plaster as required.

MIXING & APPLICATION: TILE ADHESIVE & GROUTING

- **Mixing:**
 - Replace 50% of the water specified in the tile adhesive or grouting instructions with Duram Flexement. Mix the water and Flexement together.
 - Then slowly add the diluted Flexement/water mixture to the tile adhesive or grouting as per manufacturer's instructions until a uniform, lump-free consistency is obtained.
- **Application:**
 - Apply tile adhesive and grouting as per manufacturer's instructions.

MIXING & APPLICATION: CRACK & JOINT FILLER

- Mixing:
 - For maximum flexibility, replace all the water with undiluted Duram Flexement.
 - Mix the Flexement to the cement until a uniform, lump-free consistency is obtained.
- Application:
 - Apply the crack and joint filler as per manufacturer's instructions.

CURING

- Protect from direct sunlight and wind for 24 hours after application to prevent cracking.
- Where the application will be permanently immersed in water, allow 72 hours to cure. Flush well with fresh water before filling. A water test is recommended for sensitive fish.

CLEANING

- Remove uncured Duram Flexement mixture from tools with water. Cured material can only be removed mechanically.

IMPORTANT

- Ambient temperatures must be between 5°C and 35°C during application.
- Do not apply if rain is imminent.
- Keep container closed when not in use.
- Use only with Duram Flexemesh – do not use with Duram Duramesh membrane.

SAFETY PRECAUTIONS

- Use in well ventilated areas.
- Safety goggles and protective gloves are recommended.
- Remove contaminated clothing immediately.
- Keep out of reach of children.
- Not for internal consumption, do not ingest.
- Skin contact: Wash thoroughly with soap and water.
- Eye contact: Flush immediately with water for 10 to 15 minutes and contact a doctor.
- Respiratory problems: Remove affected person to fresh air immediately and contact a doctor.

TECHNICAL DATA

Pack size	1 litre, 5 litre, 25 litre
Service temperature	20°C to 100°C
Substrate temperature	5°C to 35°C
U.V Resistance	Excellent
Abrasion Resistance	Excellent
Density	1,1 g/cm ³
Toxicity	Non-toxic when dry
Fire Hazard	Non-flammable
Cleaner	Water when wet
Shelf life	2 years in unopened container
Storage	Cool dry place

Technical details above are provided in good faith. We are an ISO 9001: 2008 registered company and our products are manufactured to the highest standards using raw materials of superior quality. Consequently we believe in the quality of our products and will willingly replace any product in the unlikely event of a quality related performance failure. Whilst we are confident in guaranteeing the quality of our products, we cannot however accept any liability for performance failure due to the incorrect application of our products. Correct application is critical to the successful performance of our products and as this process falls outside of our control we are unable to cover the application under our product performance warranty. Where there are doubts, it is recommended that the user conduct their own suitability tests before use. To retain sheen and colour consistency of your paint, always make sure that the batch numbers are the same on all paint containers that you purchase.

Updated: August 2011 (this supercedes all previous publications)