PRECAUTIONS

- Always use fresh, cement and sharp clean, well-graded aggregate
- It is used with OPC/PPC grade of cement
- Keep mixing time to a minimum see above recommendations
- Always add cement into latex and not latex into cement
- Don't apply coating over loose and debond surfaces
- Don't use hard water for mixing with polymer / cement

PACKING

1, 5, 26, 50 & 100 kg.

HEALTH AND SAFETY

Keep out of reach of children. Keep in a cool place. If in contact with eyes, rinse with plenty of water and seek medical attention if irritation develops. If in contact with skin, wash immediately with plenty of soap and water.

TECHNICAL INFORMATION

| Appearance | Milky white Pourable Liquid |
|---|---|
| % Total Solids | 45 ± 1.5 |
| PH at 25°C | 9.5 ± 0.5 |
| Brookfield Viscosity LVF (CPS) SP.1, 12 RPM at 25°C | 30 Max |
| Specific Gravity | 1.020 ± 0.005 |
| Storage | Store between temp of +5°C and 40°C. Keep containers closed |
| | when not in use. Protect from direct sunlight and freezing. |
| Shelf-Life | 6 months in ideal storage conditions |

APPLICATION PROPERTIES

| Pot Life (1.0: 1.5) | 35-45 Minutes |
|-------------------------------------|---------------|
| Permeability to water (IS2645-1975) | Passes |
| Adhesion | Excellent |



SEAL 'N' SAFE™

SBR LATEX FOR REPAIRS AND WATERPROOFING

- Excellent bonding between old and new substrate
- Acts as protective coat for steel rebar
- Useful for improving Flexural, Tensile and Bond strength and for water proofing of concrete/mortar

ApcoBuild Seal 'N' Safe is a milky white specialty Styrene Butadiene Latex, used for repair mortar for RCC members and floor; waterproofing coating.

It is manufactured by employing state-of-the art emulsion polymerization technology ensuring product consistency.



REGISTERED OFFICE AND FACTORY

Plot No. 3/1, MIDC Industrial Area, Taloja: 410208, Dist: Raigad, Maharashtra.

Tel.: +91-(022) 27403500, Fax: +91-(022) 27412052, Email ID: apcobuild@apcotex.com, Website: www.apcobuild.co.in



ADVANTAGES

- Increases Flexural strength, Tensile strength and Bond strength
- Improves workability of cementitious mixes at low water-cement ratio
- Reduces shrinkage and water permeability
- Excellent bonding between old and new concrete
- Improves adhesion to most substrate such as concrete, stone, bricks, non oily woods, glass, ceramic tiles etc.
- Improves abrasion resistance
- Allows trapped water vapors to escape and prevents blistering and adhesion failures
- Prevents salt penetration into the concrete thus resisting sulphate and chloride attack
- Acts as anti-corrosive for steel rebar
- Increases durability of waterproofing coating even in continuous contact with water
- Imparts resistant to fungal and microbial growth
- Allows easy cleaning of tools and equipment used for application.

APPLICATION METHOD

RCC REPAIR

Surface Preparation

- 1. All substrate should be clean and free of dust, laitance, plaster, oil, paint, corrosion deposit, and any other deleterious materials.
- 2. Corroded reinforcing steel should be exposed around its full circumference. Mechanically clean reinforcing steel to remove all corrosion products. Wash reinforcing steel with clean water and allow drying. It is always preferable to clean the steel to a bright condition. Use of emery cloth, grit or sand blasting is recommended.

- 1. Brush apply a primer coat of 1.0:1.5, Ratio (ApcoBuild Seal 'N' Safe: cement) over freshly cleaned and dry reinforcing steel.
- 2. Whilst primer is still wet, carefully apply and compact ApcoBuild Seal 'N' Safe mix prepared as per following proportions at a thickness up to 15-20 mm. Built up the required thickness in subsequent layers of 15-20 mm each over the final coat. Final layer can be finished with trowel to get smooth finish.

| Cement | 50 kgs |
|-------------------------|---|
| Sand | 125-150 kgs |
| ApcoBuild Seal 'N' Safe | 5.5-8.5 kgs |
| Water | Just sufficient to attained desired consistency |

BONDING AGENT

Surface preparation is the most important step before application to achieve desired results and avoid failure.

- 1. Surface to which ApcoBuild Seal 'N' Safe mixes are to be applied should be clean, sound and free of deleterious materials. All latencies, oil, dirt, debris, paint and unsound concrete must be removed.
- 2. The surface must be prepared mechanically using wire brush or shot blaster. Finally vacuum cleaned off all loose
- 3. Allow the concrete surface to dry. Do not place bond coat on standing water.

Application

- 1. Mix ApcoBuild Seal 'N' Safe latex and cement in the ratio of 1.0:1.5 by weight to get a smooth brushable coat. Paste thus prepared is ready for use as a bonding material.
- 2. Immediately apply single coat with brush. Allow this coat to become tacky and then apply fresh concrete or mortar

Avoid the bond coat to get dried up completely. However, in case of complete drying, apply second coat.

WATERPROOFING

Surface Preparation

- 1. For Waterproofing of existing slab, the mother concrete slab must be stripped off its old treatment completely. Mechanical methods must be adopted to prepare the surface and vacuum suck to clean off all loose particles &
- 2. Mother slab must be sound / mechanically surface prepared / grouted for internal cracks
- 3. Surface cracks must be suitably treated with Polymer Modified Mortar (PMM)
- 4. The slab must be thoroughly wetted with water to a state where it is saturated. But, extra care must be taken to see that there is no stagnant or standing water. Any such water must be mopped off. Ensure a saturated surface dry condition, where the slab is thoroughly wet but dry to touch before further treatment

- 1. Mix ApcoBuild Seal 'N' Safe latex and cement in the ratio of 1.0:1.5 by weight to get a smooth creamy paste. Apply first coat when the surface is in touch to dry condition and allow it to dry for 4-5 hours
- 2. Apply second coat right angle to first coat with same latex cement ratio then allow the film to air cure for at least 72
- 3. For Horizontal application, 15-20 mm Cement-Sand Mortar screed in 1:3 shall be laid over this coating, which protect the film from damage and allows further work.

FLOOR SCREED

Surface Preparation

- 1. All surfaces must be clean and structurally sound. Oil and grease must be removed.
- 2. Profiling of the floor is essential. Cut the floor to get rectangle shape and sufficient depth for filling. Under no circumstances depth of filling should not be less than 12 mm. Edges can be cut to an angle less than 90 degree for better results
- 3. For best results the surface of the concrete should be mechanically scarified or scrabbled although other methods including sandblasting and acid etching may be employed. It is essential that the surface is thoroughly brushed and residues washed away.

Application

- 1. Cement Slurry modified with ApcoBuild Seal 'N' Safe can be used as Bonding coat (0.90:1.5 Proportion)
- 2. Make the floor screed mortar as specified below
- 3. Place the mix material on the repair area immediately when the bond coat is tacky with a trowel to a required thickness.
- 4. If the thickness is more than 25 mm, it should be filled in two layers with a bond coat. The area of a patch should be restricted to 20-22 sqft. For a larger application area, it should be divided into small areas of 15-20 sqft. and then
- 5. Allow final layer to set for 24 hrs and cure with sprinkle water for 3 days.
- 6. Light traffic can be allowed after 24 hrs.

| Cement | 50 kgs |
|-------------------------|---|
| Sand | 125-150 kgs |
| ApcoBuild Seal 'N' Safe | 8.0-9.0 kgs |
| Water | Just sufficient to attain desired consistency |

COVERAGE

| APPLICATION AREA | COVERAGE* |
|--------------------|---------------------------------------|
| Bond Coat | 55-60 sq feet per kgs for single coat |
| Waterproofing coat | 25-30 sft per kgs for double coat |
| Repair Mortar | 7-8 sft per kgs for 10 mm thickness |

*Note: Coverage may be varying depending upon substrate condition.