

# ALLIED

# AC GROUT

### PRODUCT

Allied

Allied AC Grout consists of a carefully blended combination of Portland cement, non-metallic aggregate, expanding agents and admixtures. The addition of mixing water only is required. The grout has a slight expansion prior to final set when used in normal working temperatures ranging from 10°C to 24°C. It is designed for use in dry pack, plastic or flowable consistencies. AC Grout contains no admixtures which could aggravate corrosion of reinforced steel or prestressing cables.

#### USES

AC Grout is designed for use in application such as the following:

- Grouting under columns, base plates and machinery not subjected to heavy impact or dynamic loadings or vibrations.
- Grouting prestressed or post-tensioned tendons, anchor bolts or cables.
- Grout of post-tensioned structural sections.
- Grout jacking of concrete slabs.
- Repairs to concrete structures.
- Void backfilling in tunnel work.
- Underpinning of buildings.
- Anchoring posts, signs, parking meters, railings, columns and other fixtures in concrete, rock or masonry.
- Piling grout.

Typical Properties	Test Method	Flowable	Dry Pack
		ASTM Flow Table 150%	Forms a ball.
Compressive strength	CRD – C621		
MPa (lb/in <sup>2</sup> )	CAN <sup>3</sup> – A23.2		
1 Day		14 (2000)	45 (6500)
7 Days		31 (4500)	55 (8000)
28 Days		45 (6500)	62 (9000)
90 Days		52 (7500)	70 (11,000)
Expansion (before final set)	CAN <sup>3</sup> – A23.2	4.0 Max	4.0 Max
% Volume (unconfined)	ASTM C827		

#### **PROCEDURES**

 Add the grout to clean water with continuous mixing to achieve the required consistency. Approximate water requirements are: Dry pack – 2.5 to 3L of water per 25kg bag. Plastic – 3.5L of water per 25kg bag. Flowable – 4.6L of water per 25kg bag.

Important: DO NOT exceed 5L of water per 25kg bag of grout.

Water and mix temperature should be 10°C to 18°C (50°F to 65°F).

- 2. For plastic or flowable consistencies, the grout is best mixed in a high-speed shear mixer, but hand mixing may be used. Use of rotating drum mixers is not recommended.
- 3. After initial mixing, allow grout to stand for five (5) minutes; then remix. Do not add additional water after the shaking period. This requirement may be omitted with certain continuous mixing grout equipment.
- 4. Placing should be completed within 1 hour of beginning mixing.
- 5. Moist curing for at least 1 day is recommended. The grout should be protected from temperatures below 5°C (41°F) or above 35°C (95°F) for at least 72 hours after placing.
- 6. AC Grout can be extended by adding clean pea gravel at a rate of up to 1:1 by weight. It is preferable to extend AC Grout with pea gravel on deep pours.

## CAUTION

- 1. This product should not be used for heavy-duty precision grouting of machinery based plates, crane rails and situations where it will be subjected to severe dynamic or cyclic loading or vibrations. The grout can be used under such conditions only if adequate neoprene pads or equivalent vibration and impact absorbing materials are included in the design detail.
- 2. Base place or machinery should be firmly bolted down to vertically confine the grout during the placement and usage.
- 3. Pours with thickness in excess of 75mm (3 inches) should only be made after consultation with manufacturer's representatives.
- 4. The ideal temperature for grouting is between 10°C (50°F) and 24°C (75°F). Cooler temperatures will retard the rate of strength gain, especially in flowable mixes. Foundation and bed-plate temperatures should be kept above 5°C (41°F) and below 35°C (95°F) for at least 72 hours after grouting.

## YIELD

One 25kg bag mixed with 4.6L of water to achieve flowable consistency yields .014 cubic meters (.5 cubic feet).

## PACKAGING

22.7kg (50lb) bags.