

PIOFLOW HF

High flow cement-based, non-metallic non-shrink grout

DESCRIPTION

PIOFLOW HF is high flow, non-oxidized cement-based grout which requires only the addition of water to produce non-shrink & waterproofing flowable mortar. **PIOFLOW HF** contains selected Portland cements, special aggregates, shrinkage compensating materials and modifiers that permit it to be applied in an ordinary gaps of thickness range of 20-100 mm by pouring.

USAGES

- Grouting under machines and equipment
- Filling voids and holes between new and old concrete
- Grouting beneath steel structures support, pre-cast supports & other similar works
- Anchor different kind of fixings such as bolts, crane rails, stanchion bases, masts, and fence posts
- Bridges bearing, Rail fixation & other similar applications

TECHNICAL DATA

PIOFLOW HF	Typical values	
<i>Compressive Strength</i> (ASTM C942)	Fluid	Flowable
Day 3 (N/mm ²)	35	40
Day 7 (N/mm ²)	42	53
Day 28 (N/mm ²)	51	60
<i>Flexural Strength</i> (BS 6319)		
Day 28 (N/mm ²)	13	14
<i>Setting Time (I-F)</i> (ASTM C953)	4 – 6 hours	
<i>Expansion</i> (ASTMC940-10a)	0.05%	
<i>Specific Gravity @20°C</i> (wet)	2.1 – 2.2	
<i>Pot Life @25°C</i>	30 min	
<i>Fresh Wet Density</i>	2230±50	

STANDARDS

PIOFLOW HF is formulated to comply with:

ASTM C-1107: "Packaged Dry, Hydraulic – Cement Grout (Non-shrink)" Grade A as well as CRD C- 621.

ADVANTAGES

- Requires only addition of water on site at application time
- Non-metallic, shrinkage compensated, fiber reinforced contains micro silica to enhance strength and durability
- Flowable consistency self-compacting enables it to flow in narrow confined holes
- High mechanical & high heat resistance properties
- Low permeability ensuring durability
- Non-toxic and does not contain any harmful ingredient
- Chloride-free and nitrate-free
- High bond strength to concrete and steel
- Can be applied by pouring or pumping
- Formulated for the Middle East climate

USAGE INSTRUCTIONS

1. Surface preparation

All surfaces shall be sound, clean and free from dust, oil & grease or any contaminants that may affect the bond between the product and substrate. Absorbent surfaces shall be saturated thoroughly but no standing water.

2. Mixing

The exact amount of water shall be put in a clean vessel (or mixer) and gradually add the powder while mixing. Continue mixing till homogenous consistency free from lumps is achieved. It is recommended to use an electric drill of maximum 400 – 500 rpm. It is not recommended to mix more than that you can place within 60 minutes, do not retemper to restore workability.

PIOFLOW HF	Fluid	Flowable
Water L / 25Kg	4.25	3.75
Yield (liters)	13.2	13.0

STORAGE & SHELF LIFE

PIOFLOW HF shall be stored in normal conditions away from extreme temperatures, and any source of moisture. Shelf – life is 12-months.

3. Placement

Pour the mixed materials onto the prepared substrate continuously from one side avoiding air pocket entrapment (allow the air to escape). If base plate grouting is being carried out, voids should be eliminated by removing rodding, strapping.

4. Curing

PIOFLOW HF is cement-based grout, ACI recommendations should be followed during mixing, placement or curing. After placement, the grout shall be cured properly for 3-days (at least) or curing compound **ENECURE WB** can be used. Protect the placed grout from extreme temperatures.

PACKAGING

PIOFLOW HF is supplied in 25 kg bags.

HEALTH & SAFETY

PIOFLOW HF Is non-toxic and non-hazardous, if material comes in contact with skin; cleaning with water and soap is recommended.

For Ecology: Do not dispose directly to water or soil, re-use it if possible or mix with water and wait until it hardens then bury it in landfill in accordance with national regulation.

TECHNICAL SERVICE

The technical service department of Arkaz is available to assist in the correct and best use of our products, these resources and advice are at your disposal entirely without obligation.

Please contact:
concretedoctor@arkaz.com

LEGAL DISCLAIMER

The information given is based on data and knowledge considered to be true and accurate and is offered for the user's consideration, investigation and verification. Since the conditions of use are beyond our control, we do not warrant the results to be obtained. Please read all statements, recommendations or suggestions in conjunction with our conditions of sale including those limiting warranties and remedies which apply to all goods supplied by us. No statement, recommendation or suggestion is intended for any use which would violate or infringe statutory obligations or any rights belonging to a third party.

These products may be covered by patents or patents pending.



Copyright 2021
Printed in K.S.A. Version 2.0
13-March-2020