# **ALEXPLAST G40**



# **Super Plasticizing Admixture**

# **Description**

**ALEXPLAST G40** is a synthetic super Plasticizer high water reducing and retarding admixture for concrete.

It contains a powerful super plasticizer that aggressively disperses cement particles which enabling the mixing water to perform more efficiently so it facilitate concrete transported and casted with little vibration.

# <u>Uses</u>

- Ready mixed concrete.
- To produce high workability concrete.
- Pumped concrete.
- Casting in hot climates.
- To reduce permeability.
- In precast and prestressed concrete.

## **Advantages**

- Aids pumping by reducing line friction.
- Increase density and reduces porosity resulting in improved water penetration resistance.
- Increase cohesion, minimizes segregation and bleeding and gives improved surface finish.
- High quality surface finish.
- Eliminate shrinkage.
- Improve physical properties for concrete.
- Produce water proofing concrete.
- Chloride free.

- Non toxic as it is water based.
- Compatible with ALEXCHEM additives (Contact our technical office).
- •Compatible with all type of ordinary and sulphate resistant cement.

## **Standards**

ALEXPLAST G40 complies with ASTM C494 Types A and G

# **Properties**

Colour	Dark Brown liquid		
Specific gravity	1.19	20°C	
Chloride content	Nil		
Water Reduction	Reduction up to 20% can be reached depending on materials used and mix design		
Compatibility	Can be used with all types of Portland cements		
Durability	When ALEXPLAST G40 is used for water reduction the increase in density and reduction of permeability improved durability and reduces porosity hence increase water proofing properties also resist salts which attack concrete.		

Typical strength gain achieved when using ALEXPLAST G40							
Mix G40 Dose	G40	W/C	Slump mm	Compressive strength N/mm2			
	Dose			1 day	7 days	28 days	
Control		0.56	190	6.5	25	36	
ALEXPLAST G40	0.50%	0.38	190	9.50	32	42	
ALEXPLAST G40	1%	0.38	190	12	33	48	

Typical results for slump improvement when using ALEXPLAST G40							
Test	Dosage	W/C	Slump mm				
Control		0.46	45				
ALEXPLAST G40	0.67%	0.40	180				
ALEXPLAST G40	1%	0.40	Collapse				

# **Guide to Application**

### **Application**

**ALEXPLAST G40** should be added to the mixing water prior to addition to the dry mix

# **Coverage:**

Approximately 0.5-2.0 % by the weight of used cement.

The dosage depends on mix design cement type, quality and size of used material and ambient temperature.

A site trial should be carried out to confirm the mix design.

#### Over dose:

Over dose increase the setting time.

# Packing:

Is supplied in 20 lit, 210 lit drums, 1000 lit bulks.

#### Shelf life:

Up to 12 month when stored as Recommended

## Storage:

Should be stored in shaded areas and is kept within the range 2 °C to 50 °C

# **Safety precaution**

• Avoid contact with eyes, mouth skin, and follow by washing soap and water And any eye contamination should be washed thoroughly with plenty of water and immediate medical treatment sought.

#### **Guarantee:**

All precaution is taken in manufacture of each product to comply with the standard of each material.

The data sheet for each product for information only and may be corrected and no liability is accepted for it. The results may have variation because the method of their use condition under which they are applied cannot be anticipated.

#### **Technical Service:**

For any technical advice for using the **ALEXCHEM** contact the technical office.

## **HEAD OFFICE:**

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