

FLUIDING M

Concrete plasticizer and set retarder, based on polycarboxylates
In compliance with: EN 934-2: T10

FIELD OF APPLICATION

Preparation of economical concrete mixtures with optimum ratio between components and concrete performance;
Preparation of "standard" concrete mixtures intended for the execution of various works in constructions (foundation and other underground structures, industrial floors, RC columns, beams and floor structures, concrete pavement structures, hydraulic structures, retaining walls, etc.).
Preparation of concrete mixtures used for transport and application with pump;
Concreting of structural elements with heavily reinforced concrete sections;
Concreting at high ambient temperatures;
Concreting of massive concrete sections where there is risk of crack formations caused by exothermic processes in concrete;
Preparation of cementitious injection grouts;

PROPERTIES

- Enables water reduction of up to 15%;
- Enables longer transport and application of concrete (up to 90 minutes)
- Improves the workability of concrete without further addition of water;
- Improves application of fresh concrete under high ambient temperatures;
- Increases water-tightness of concrete;
- Improves physical and mechanical properties of concrete (increased final strength properties)

TECHNICAL FEATURES

PROPERTY	METHOD	DECLARED VALUE
Appearance	Visual	Dark brown liquid
Density (at 20°C)	ISO 758	(1.05±0.02) g/cm ³
Chloride content	EN 480-10	≤0,1%
Alkali content	EN 480-12	≤4,5%
pH value (at 20°C)	ISO 4316	4,0±1,0

DOSAGE AND PERFORMANCE:

The optimum dosage of Fluiding M ranges between 0,3 and 1,0% of the amount of cement in the concrete mixture. Water reduction of 15% is achieved when applying the recommended dosage (Diagram 1). Thus, the final strength properties of the concrete are increased respectively (Diagram 2).

The optimum dosage of Fluiding M is best determined by conducting laboratory or industrial testing.

For reference concrete, according to EN 480 – 1 by using CEM I 52.5 N

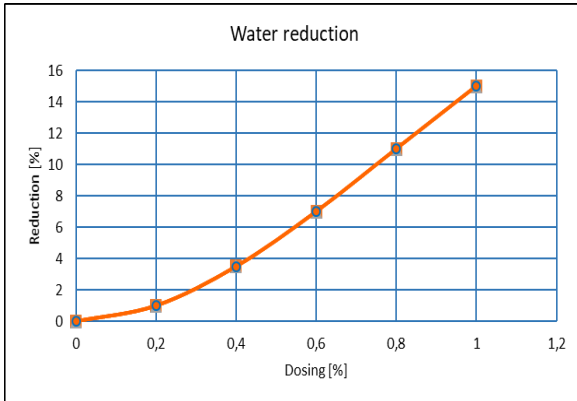


Diagram 1

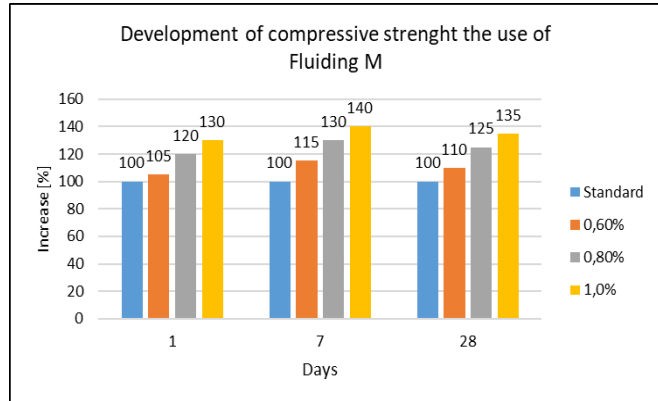


Diagram 2

Under high ambient temperatures, or in the case when production, transport and placement of concrete takes more than 90 minutes, it is recommended to add additional set retarding admixture Usporovac D2 – to the concrete mixture.

Dosing of admixtures is carried out manually or automatically during the manufacturing of the concrete. Best effects are achieved when Fluiding M is added together with the last 20-30 % of water, in the mixture of aggregate, cement and 80% of water. It is recommended that the mixing of fresh concrete with addition of Fluiding M admixture should not be shorter than 90 seconds.

Effects of overdose: Overdose of Fluiding M can lead to segregation of fresh concrete and delayed set time.

COMPATIBILITY

Fluiding M is compatible with number of admixtures from ADING's production program, such as set accelerators, set-retarders, admixtures for winter concreting, waterproofing admixtures, air-entraining admixtures. If two or more admixtures are used in the concrete mixture, it is necessary to make preliminary tests. Different admixtures are dosed separately i.e. they are not mixed together, prior to the application in the concrete mixture. Fluiding M is compatible with all types of Portland cement, including sulphate-resistant cements. Fluiding M I not compatible and should not be used in combination with the admixtures that contain poly-naphthalene sulphonate, such as: Superfluid, Superfluid M1, Superfluid M1M, Superfluid T and Hidrofob Fluid.

PACKAGING

Plastic cans: 20 kg
Drums: 200 kg
Containers: 1000 kg

STORAGE

In the original packaging at temperature between 5°C and 35°C. Shelf life: 12 months.

CE MARKING

CE 2032	
ADING AD Skopje, Novoselski pat (ul 1409) br.11 1060 Skopje, North Macedonia 08 GAAB001/6 EN 934-2:2009+A1:2012 FLUIDING M Set retarding/water reducing/plasticizing admixture for concrete EN 934-2:T10	
Chloride ion content	≤ 0,1% by mass
Alkali content	≤ 4,5% by mass
Corrosion behaviour	Contains components only from EN 934-1:2008, Annex A.1

Health hazards: Fluiding M does not contain toxic materials. Nevertheless, avoid contact of the product with skin and eyes and avoid swallowing. In case of contact with skin or eyes, clean it immediately with running water. If swallowed, ask for medical assistance. Additional information are provided in the Safety Data Sheet of the product.

Fire: Fluiding M is a non-flammable liquid. Additional information are provided in the Safety Data Sheet of the product.

Cleaning and disposal: Loose residues of Fluiding M should be cleaned with water. Old and used packaging should be disposed in accordance with local rules and regulations for that type of waste. Additional information are provided in the Safety Data Sheet of the product.