

## Sika ViscoCrete® -20HE

### High Performance Superplasticiser Concrete Admixture

<b>Product Description</b>	<p>Sika ViscoCrete® -20HE is a third generation superplasticizer for concrete and mortar.</p> <p>It meets the requirements for super plasticizers according to ASTM-C- 494 Types G and F and BS EN 934 part 2: 2001.</p>
<b>Uses</b>	<p>Sika ViscoCrete® -20HE is especially suitable for the production of concrete mixes which require high early strength development, powerful water reduction and excellent flowability</p> <p>Sika ViscoCrete® -20HE is mainly used for the following applications:</p> <ul style="list-style-type: none"> <li>■ Precast Concrete</li> <li>■ Fast track concrete</li> <li>■ Concrete with highest water reduction (Up to 30%).</li> <li>■ In situ concrete requiring fast stripping time</li> <li>■ Self Compacting Concrete (SCC)</li> </ul>
<b>Characteristics / Advantages</b>	<p>Sika ViscoCrete® -20HE as a powerful superplasticiser acts by different mechanisms.</p> <p>Through surface adsorption and sterical separation effect on the cement particles, In parallel to the hydration process, the following properties are obtained:</p> <ul style="list-style-type: none"> <li>■ Strong self compacting behaviour. Therefore suitable for the production of self compacting concrete.</li> <li>■ Pronounced increase in the early strength development, resulting in very economic stripping times for precast and in situ concrete.</li> <li>■ Extremely powerful water reduction (resulting in high density and strengths).</li> <li>■ Excellent flowability (resulting in highly reduced placing and compacting efforts).</li> <li>■ Reduced energy cost for steam cured precast elements.</li> <li>■ Improved shrinkage and creep behaviour.</li> <li>■ Reduced rate of carbonation of the concrete.</li> <li>■ Improved Water Impermeability.</li> </ul> <p>Sika ViscoCrete® -20HE does not contain chloride or other ingredients promoting corrosion of steel reinforcement. It is therefore suitable to be used without any restrictions for reinforced and prestressed concrete production.</p>
<b>Technical Data</b>	
<b>Base</b>	Aqueous solution of modified polycarboxylates
<b>Appearance / Colour</b>	Light brownish liquid, clear to slightly cloudy
<b>Density</b>	1.08 kg/lit
<b>pH Value</b>	4.3 +/- 0.5
<b>Packaging</b>	<p>5 and 20 kg pails</p> <p>220 kg drums</p> <p>Bulk Tanks packing available upon request</p>
<b>Storage / Shelf Life</b>	12 months from date of production if stored properly in unopened and undamaged, original sealed packaging, in dry temperatures between +5°C and +35°C. Protected from direct sunlight and frost.



## Application Details

**Dosage / consumption** Recommended dosage  
 ■ For medium workability: 0.2 – 0.8% litre by weight of cement  
 For concrete of high workability, very low water/cement ratio and for self compaction concrete: 1.0 – 2.0% litre by weight of cement.

**Compatibility** Sika ViscoCrete® -20HE may be combined with following Sika products among other:

- Sika Pump®
- Sika® Ferrogard® -901
- Sikafume®
- SikaRapid®
- Sika Retader® and Sika Retardol® 25

Please conduct trials before combining products.

## Safety Instructions

**Safety Precautions** In contact with skin, wash off with soap and water.  
 In contact with eyes or mucous membrane, rinse immediately with clean warm water and seek medical attention without delay.

**Ecology** Residues of material must be removed according to local regulations. Fully cured material can be disposed of as household waste under agreement with the responsible local authorities.

**Transport** Non-hazardous

**Toxicity** Non-Toxic under relevant health and safety codes.

## Legal notes

The information, and, in particular, the recommendations relating to the application and end-use of Sika products, are given in good faith based on Sika's current knowledge and experience of the products when properly stored, handled and applied under normal conditions in accordance with Sika's recommendations. In practice, the differences in materials, substrates and actual site conditions are such that no warranty in respect of merchantability or of fitness for a particular purpose, nor any liability arising out of any legal relationship whatsoever, can be inferred either from this information, or from any written recommendations, or from any other advice offered. The user of the product must test the product's suitability for the intended application and purpose. Sika reserves the right to change the properties of its products. The proprietary rights of third parties must be observed. All orders are accepted subject to our current terms of sale and delivery. Users must always refer to the most recent issue of the local Product Data Sheet for the product concerned, copies of which will be supplied on request.

