

**Technical Data Sheet**  
 Edition 4, 2012  
 Identification no.  
 02 02 01 01 001 0 000063  
 Version no. 0010  
**Sikagrout® 215 M**

## Sikagrout® 215 M

### Non-Shrink Cementitious Grout for Marine Structure and Concrete Repair

<b>Description</b>	A non-shrink grout, specially developed for marine environment structure and concrete repair. With an additional special blend of fibre, silica fume and appropriate superplastizer, Sika Grout 215 M compensates shrinkage in both plastic and hardened states.  Complies to ASTM C-1107
<b>Use</b>	For structural repair, specially in marine environmental such as honeycombing, spalling of column, beam, precast wall panel and structural members. Use for structural grouting of column and machine base plates, anchor rods, bearing plates, precast wall panel.
<b>Advantages</b>	<ul style="list-style-type: none"> <li>■ Easy to use .... just add water</li> <li>■ Adjustable consistency</li> <li>■ Excellent resistant to salt water and oil</li> <li>■ Non-Corrosive</li> <li>■ Non-Toxic</li> </ul>
<b>Consumption</b>	~ 1.880 kg/m <sup>3</sup> of mortar.
<b>Instruction for Use</b>	
<b>Surface Preparation</b>	Surface must be clean, sound and free from dust, oil, grease, cement laitance and any loose materials. For maximum bond, surface should be roughened. All surfaces must be well saturated with clean water prior to the application of Sika Grout 215 M. Prior to pouring, surface must be wetted to saturated surface dry.
<b>Mixing</b>	Put measured quantity of water (depend on the required consistency) into an empty pail. Slowly add the total contents of Sika Grout 215 M while mixing. Mix continuously for 4 minutes to achieve an even consistency. A mechanically powered low speed grout mixer should be used for the best result
<b>Placing</b>	Pour Sika Grout 215 M from one side only to avoid air entrapment. Do not vibrate. Use a suitable head box of 150–200 mm and the grout head at all times to ensure a continuous flow. Twenty five minutes is considered as the ideal placing time.
<b>Curing</b>	Cover all exposed grout for minimum 3 days with wet hessian, plastic sheeting or Sika Curing compound (Antisol).
<b>Limitation</b>	Minimum applications thickness : 10 mm. Recommended thickness of Sika Grout 215M in one pour is 20 mm to 50 mm. the application thickness exceeds 100 mm, special procedure must be taken to anticipate temperature rise. Iced water, add coarse aggregate to the mix (max. 50% by powder weight), or both of them may be used to eliminate temperature rise. Keep the materials and substrate temperature lower than 30° C. Variations in cement could cause shade differences in colour of the mortar. In the case of addition with coarse aggregate, it is advised to conduct trial mix to check influence of coarse aggregate addition on grout workability and strength. 8 to 10-mm size aggregate is found to be the most suitable size for this addition.



## Technical Data

<b>Form</b>	Powder		
<b>Color</b>	Grey		
<b>Flow Condition</b>	<b>Flowable</b> (Mod J cone : 9 -16 sec)	<b>Pourable</b> (Flow Table : 90-110%)	<b>Trowellable</b> (Flow Table : 50-70%)
<b>Water requirement</b> (Litres per 25 kg bag)	4.25	3.50	2.75
<b>Yield</b> (Litres per 25 kg bag)	13.30	12.70	12.00
<b>Mix Density</b>	Approx. 2.18 kg/l		
<b>Compressive Strength</b>			
<b>(ASTM C-109)</b>	<b>1 days</b>	280 kg/cm <sup>2</sup>	420 kg/cm <sup>2</sup>
	<b>3 days</b>	450 kg/cm <sup>2</sup>	580 kg/cm <sup>2</sup>
	<b>7 days</b>	620 kg/cm <sup>2</sup>	700 kg/cm <sup>2</sup>
	<b>28 days</b>	730 kg/cm <sup>2</sup>	830 kg/cm <sup>2</sup>
<b>Flexural Strength</b> (ASTM C-348) <b>28 days</b>	> 65 kg/cm <sup>2</sup>		
<b>Tensile Strength</b> (ASTM C-496) <b>28 days</b>	> 35 kg/cm <sup>2</sup>		
<b>Bond Strength</b>			
<b>to concrete</b>	<b>28 days</b>	>15 kg/cm <sup>2</sup> (concrete failure, over mechanically roughened concrete surface)	
<b>to grout</b>	<b>28 days</b>	>25 kg/cm <sup>2</sup> (over mechanically roughened grout surface)	
<b>Expansion (ASTM C-940)</b>	0.30 – 1.40 %		
<b>Initial Setting Time</b> (at 27°C)	4 – 8 hours		
<b>Shelf Life</b>	9 months when unopened and stored in dry condition		
<b>Packaging</b>	25 kg bag		
<b>Handling Precautions:</b>	<ul style="list-style-type: none"> <li>■ Avoid contact with skin and eyes</li> <li>■ Wear protective gloves and eye protection during work</li> <li>■ If skin contact occurs, wash skin thoroughly</li> <li>■ If in eyes, hold eyes open, flood with warm water and seek medical attention without delay.</li> </ul>		

## 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 product 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.

**PT. Sika Indonesia**  
 Jl. Raya Cibinong- Bekasi km. 20  
 Limusunggal- Cileungsi  
 BOGOR 16820 - Indonesia  
 Tel. +62 21 8230025  
 Fax +62 21 8230026  
 Website : [www.sika.co.id](http://www.sika.co.id)  
 e-mail: [sikacare@id.sika.com](mailto:sikacare@id.sika.com)

**Branches**  
**Surabaya :**  
 Komp. Pergudangan Meiko Abadi III Blok B-52 & B-53, Ds. Gemurung,  
 Gedangan, Sidoarjo 61254  
 Tel : 031- 8911333; Fax : 031-8916333  
**Medan :**  
 Jl. Serbaguna (Simp. Jalan Veteran), Kompleks Pergudangan Brayan  
 Trade Center No. 34, Medan 20239  
 Tel : 844 6697, 844 6997 ; Fax : (061) 844 6698  
**Batam :**  
 Jl. Laksamana Bintan, Komp. Bumi Riau Makmur Blok E No.3, Sungai Panas  
 Tel : (0778) 424928; Fax : (0778) 450189

