

\* Fly Ash Content in Cement is

(%)





## Portland Pozzolana Cement

**WORK TEST CERTIFICATE** 

Despatched during Week No.		24	From	11-06	5-2019	То	17-06-2019
Test Certificate No.		24	Reference	e No.		WCW/IMS/QA/FM/09	
Dated		16-07-2019	riciciono				
S.N.	Pa	rameters		Results Obtained	Requirement as per IS 1489 (Part I) : 2015		
1	Chemical Composition						
	Loss on Ignition (% by mass)			1.90	Not More than 5.0 %		
	Magnesia (% by mass)			1.00	Not more than 6.0 %		
	Sulphuric Anhydride SO3 (% by mass)			2.60	Not More than 3.5 %		
	Chloride Content (% by mass)			0.02	Not more than 0.1 % for general purpose & not more than 0.05 % for pre-stressed structures		
	Insoluble Residue (% by mass)			28.80	Not More than [X + 4.0 (100-X) / 100] & Not less than (0.6 X), Where "X" is the declared Pozzolana content in cement		
	Physical Analysis			l			
2	Fineness						
	Blaine's Specific Surface Area (m² / kg)			338	Not Less than 300		
3	Compressive Strength (MPa)						
	72 ± 1h (3 Days)			28.7	Not less than 16.0		
	168 ± 2h (7 Days)			38.8	Not less than 22.0		
	672 ± 4h (28 Days) *			57.4	Not less than 33.0		
4	Setting Time (Minutes)						
	Initial			155	Not less than 30		
	Final			225	Not more than 600		
5	Soundness						
	Le-Chatelier Expansion (mm)			0.50	Not more than 10.0		
	Auto-Clave Expansion (%)			0.060	Not more than 0.8		
6	Drying Shrinkage (%)*	<u>/</u> %)*			Not more than 0.15		
7	Normal Consistency (%)			30.40			
	Temp. During Testing (°C)			27.00	(27 ± 2) <sup>0</sup> C		

The above cement complies with the requirements of IS 1489 (Part I): 2015 for Portland Pozzolana Cement.

Manager (QA)

34.00