IS 269:2015

CM/L 2023022

ACC

ACC Limited

Wadi Cement Works

WORK TEST CERTIFICATE

IS / ISO 9001

QMS

53 Grade Ordinary Portland Cement

Despatched during Week No.	6	From	5-Feb-2022	To	11-Feb-2022
Test Certificate No.	**6**	Reference No.		**WCW/IMS/QA/FM/17**	
Dated	**12-Mar-2022**				

S.N.	Parameters	Results Obtained	Requirement as per IS 269 : 2015 (Variety: OPC 53)
1	**Chemical Composition**		
	Lime Saturation Factor (CaO – 0.7 *SO3) / (2.8* SiO2 + 1.2* Al2O3 + 0.65* Fe2O3)	0.91	Not greater than 1.02 and not less than 0.80
	Ratio of % Alumina to that of Iron Oxide Al2O3 / Fe2O3	1.22	Not less than 0.66
	Insoluble Residue (% by mass)	0.99	Not more than 5.0 %
	Magnesia (% by mass)	0.87	Not more than 6.0 %
	Sulphuric Anhydride (% by mass)	2.91	Not More than 3.5 %
	Total loss on Ignition (%)	2.07	Not More than 4.0 %
	Chloride Content (%)	0.010	Not more than 0.1 % for general purpose & not more than 0.05 % for pre-stressed structures
	Physical Analysis		
2	**Fineness**		
	Blaine's Specific Surface Area (m2 / kg)	305	Not Less than 225
3	**Compressive Strength (MPa)**		
	72 ± 1h (3 Days)	36.6	Not less than 27.0
	168 ± 2h (7 Days)	47.0	Not less than 37.0
	672 ± 4h (28 Days) *	60.1	Not less than 53.0
4	**Setting Time (Minutes)**		
	Initial	125	Not less than 30
	Final	180	Not more than 600
5	**Soundness**		
	Le-Chatelier Expansion (mm)	2.00	Not more than 10.0
	Auto-Clave Expansion (%)	0.060	Not more than 0.8
6	Normal Consistency (%)	27.75	
	Temp. During Testing (0C)	27.00	(27 ± 2)0C

The above cement complies with the requirements of IS 269 : 2015 (Variety: OPC 53) for 53 Grade Ordinary Portland Cement

Manager (QA)

DGM QC