



DASTAN, PALSANA, DIST. SURAT (GUJ.)
TEST CERTIFICATE FOR PORTLAND POZZOLANA CEMENT
 LICENCE NO. CM/L-7200051895

Week No : 19 (07.05.2018 to 13.05.2018)

Date of Issue : 19.06.2018

Sr. No	Particulars	IS Clause	Test Method	Requirement of IS:1489 (Part-I)	Results Obtained
Chemical Requirements					
1	Loss on ignition(% by mass)	6	IS : 4032 - 1985	Not more than 5.0	1.72
2	Magnesia(% by mass)		IS : 4032 - 1985	Not more than 6.0	2.39
3	Sulphuric Anhydride (SO ₃)(% by mass)		IS : 4032 - 1985	Not more than 3.5	2.89
4	Insoluble Residue(% by mass)		IS : 4032 - 1985	$\frac{4(100-x)}{x+100}$ (x=where x is the declare % age of Fly Ash)	22.96
5	Chloride(% by mass)		IS : 4032 - 1985	Not more than 0.1	0.016
6	Declared % of Fly Ash (\leq)		-	-	Not less than 15% and Not more than 35%
Physical Requirements					
1	Fineness (m ² /kg)	7	IS : 4031 (Part-2) - 1999	Not less than 300	386
2	Normal Consistency (%)		IS : 4031 (Part-4) - 1988	-	34.50
3	Soundness : a) Le-chatelier expansion (mm) b) Autoclave test expansion (%)		IS : 4031 (Part-3) - 1988	Not more than 10 Not more than 0.8	0.5 0.048
4	Setting Time : a) Initial setting time (minutes) b) Final setting time (minutes)		IS : 4031 (Part-5) - 1988	Not less than 30 Not more than 600	135 185
5	Compressive Strength : a) 72 \pm 1 Hours (3 Days) (MPa) b) 168 \pm 2 Hours (7 Days) (MPa) c) 672 \pm 4 Hours (28 Days) (MPa)		IS : 4031 (Part-6) - 1988	Not less than 16 Not less than 22 Not less than 33	30.0 40.2 51.0
6	Drying Shrinkage (%)		IS : 4031 (Part-10) - 1988	Not more than 0.15	0.048

REMARKS : The test results complies with the requirements of IS: 1489(Part-I) (PPC) for All Chemical requirements and Physical requirements including Compressive Strength up to **28-days** . Test Protocol IS : 4032 and IS : 4031 .

R.A. Alad

Officer

[Signature]

Authorized Signatory