

Bagheran Cement CO.
Quality Control Test Report



Portland Cement Type 1-325				Acc to : ISIRI 389
Chemical Analysis				Chemical Requirements
Test Parameters		Unit	Results	ISIRI 389
Silicon Dioxide	SiO_2	%	22.05	—
Aluminium Oxide	Al_2O_3	%	5.23	—
Ferric Oxide	Fe_2O_3	%	3.37	—
Calcium Oxide	CaO	%	63.14	—
Magnesium Oxide	MgO	%	1.70	Max-5.0
Sulfur Trioxide	SO_3	%	2.27	Max-3.0
Potassium Oxide	K_2O	%	0.43	—
Sodium Oxide	Na_2O	%	0.57	—
Chloride	CL	%	0.025	—
Loss on Ignition	LOI	%	1.03	Max-3.0
Free Cao	F.CaO	%	0.7	—
Insoluble Residue	IR	%	0.55	Max-0.75
Tricalcium Silicate	C3S	%	43.15	—
Dicalcium Silicate	C2S	%	30.68	—
Tricalcium Aluminate	C3A	%	8.16	—
Calcium Alumino Ferrite	C4AF	%	10.25	—
Physical Properties				Physical Requirements
Test Parameters		Unit	Results	ISIRI 389
Fineness	Blaine	Cm^2/gr	2900	Min-2800
Setting Time	Initial	min	140	Min-45
	Final	min	190	Max -360
Soundness	Autoclave Exp	%	0.07	Max -0.8
	Le chatelire	mm	0.7	—
Compressive Strength	2 Days	kg/cm^2	—	—
	3 Days	kg/cm^2	160	Min-120
	7Days	kg/cm^2	290	Min-200
	28 Days	kg/cm^2	375	Min-325; Max -525

Lab. Manager;