

**GOVERNMENT OF GOA  
QUALITY CONTROL LABORATORY  
WATER RESOURCES DEPARTMENT**

**Test Report No.:** WRD/Q.C./F.6-4/Aggr-T- 329,330/Lab/77/2023-24      **Dated:-**26/05/2023.

**Laboratory:** Bicholim-Goa

**Sand –T:-** 5394.      **Cement-T:-** 1450.

**Sub Div:** V (QC)/WRD/Bicholim Goa.

**Sub:-** Construction of Protection wall to the Kalti River Passing through Survey No. 196/10 & 196/8 at Gadowada Querim in V.P. Querim Sattari Taluka.

**Ref to requisition No:-** F.50/SDIV/WDVI/WRD/2022-23/19.      **Dated :-** 19/05/2023

**Qty. Received:** 1 bags each      **Date of Receipt:-** 24/05/2023      **Tested on:-** 24 & 25/05/2023.      **Ref to Specification:** CPWD 2009, Vol. I&IS:4031-4-1968

**Sample:**Sand,20mm,      **O.S. NO:-** 1298,1299,1321,1300/RK .      **Lab. Sample No :-** 7203 to 7206      **Tested by:-** Mrs. R.R. Kadam A.E.

12.5mm size Aggr, and Cement

**R E P O R T 01 OF 01**

Sr. No.	Description of sample	Tested for	Results	Max. /Min. value permissible	Remarks
1.	<b>20.00 mm Size Aggregate:</b>	Particle size distribution:	It is single sized aggregate of 20 mm nominal size.	(Qty. rep. – --m <sup>3</sup> )	
2.	<b>12.5 mm Size Aggregate:</b>	Particle size distribution:	It is not single sized aggregate of 12.5 mm nominal size.	(Qty. rep. – -- m <sup>3</sup> )	
<b>REMARK:</b> After blending 20 mm aggregate with 12.5 mm aggregates at the ratio of <b>1:1</b> by weight; it is satisfying the required criteria for graded aggregate of 20 mm nominal size.					
3.	<b>Coarse Sand:</b> (L.S.No.7205)	i) Silt & Clay by S.A. method ii) Silt by sedimentation iii) Fineness Modulus iv) Grading Zone	: - 4.80 % : - 4.25 % : - 2.75 % : - II		
<b>REMARK:</b> The observed results are within the permissible limits of the Coarse sand.					
4.	<b>Cement:</b> JK Cement, bearing IS:269 Ordinary Portland cement, Manuf. date: W-M-Invisible,Y-2023 CM/L = 0003401033 Qty. rep. –.	i) Fineness of Cement ii) Consistency of cement iii) Initial Setting Time iv) Final Setting Time	: - 1.28 % : - 31.00 % : - 155 minutes : - 290 minutes	----- (It should not be more than 10%) (It should be in the neighborhood of 35%) ---- (It should not be less than 30 minutes) -- (It should not be more than 600 minutes)	
To be used for - <b>REMARK:</b> The observed results are within the permissible limit for Ordinary Portland cement.					

Copy to:1. The Assistant Engineer, SDIV, WDVI, WRD, Bicholim– Goa.

2. Copy Submitted to The Superintending Engineer, CPO, WRD, Porvorim – Goa for kind information.

3. Copy Submitted to The Executive Engineer, WDVI, WRD, Bicholim– Goa.

4. Q.C. Lab file      5. Bill File.

**Assistant Engineer**