GOVERNMENT OF GOA QUALITY CONTROL LABORATORY WATER RESOURCES DFEPARTMENT

<u>Test Report No.</u>: WRD/Q.C./F.6-4/ Aggr-T- 9440, 9441, Sand-T-4920, Cement-T-1104 /Lab/ **285** /2019-20 Dated:15/10/2019.

Laboratory: Bicholim-Goa

Sub Div V/ (QC), WD VIII, WRD, Bicholim-Goa

Sub: Providing Micro network system for DWC 18 BL of RBMC of TIP at village Dhargal in Pernem Taluka.

Ref to requisition No: SD IV/ WDVII / WRD/ F.10/19-20/112 Dated: 09/10/2019

<u>Oty. Received</u>: 1 bags each **<u>Date of Receipt</u>**: 11/10/2019 <u>**Tested on**</u>: 14 & 15/10/2019 <u>**Ref to Specification**</u>: CPWD 2002, Vol. I & IS: 4031-4, 1988

Sample: 20mm, 12.5mm size aggrt, Sand, JK cement 43 gradeO.S. No. : 1139/AF to 1142/AFLab. Sample No.: 6834 TO 6837Tested by: Mr. Anil R. Fadte , J.E.

Sr. No. Description of sample Tested for Results Max. /Min. value permissible Remarks 1. 20 mm Size Aggregate: Particle size distribution: It is single sized aggregate of 20 mm nominal size (Qty. rep. 25m ³) . 2. 12 mm Size Aggregate: Particle size distribution: It is single sized aggregate of 12.5 mm nominal size. (Qty. rep. 15m ³) 3. Sand: i) Silt & Clay by S.A. method : - 3.60% (Qty. rep. 15m ³) ii) Silt by sedimentation : - 4.76 % . . iii) Fineness Modulus : - 2.85 . . iv) Grading Zone : - II REMARK: The observed results are within the permissible limits of the coarse sand. 4. Cement: . i) Consistency of cement : 1.24 %				<u> </u>		
 2. <u>12 mm Size Aggregate</u>: Particle size distribution: It is single sized aggregate of 12.5 mm nominal size. (Qty. rep. 15m³) <u>REMARK</u>: After blending 20 mm aggregate with 12 mm aggregates at the ratio of <u>1.2</u> by weight; it is satisfying the required criteria for graded aggregate of 20 mm nominal size. 3. <u>Sand:</u> i) Silt & Clay by S.A. method :- 3.60% (Qty. rep. 15m³) ii) Silt by sedimentation :- 4.76% iii) Fineness Modulus :- 2.85 iv) Grading Zone :- II REMARK: The observed results are within the permissible limits of the coarse sand. 4. <u>Cement:</u> i) Fineness of Cement :1.24% (It should not be more than 10%) ii) Consistency of cement :1.24% (It should not be more than 10%) iii) Initial Setting Time :160 minutes (It should not be less than 30 minutes) iv) Final Setting Time :280 minutes (It should not be more than 600 minutes) CM/L =0003401033 Qty. repm³ To be used for – Not specified <u>REMARK: The observed results are within the permissible limit for tested Ordinary Portland cement.</u> Copy to: I. The Assistant Engineer, CPO, WRD, Porvorim – Goa for kind information. 3. Submitted to The Executive Engineer, W.D. VII, WRD, Dhargal-Pernem-Goa 	Sr. No.	Description of sample	Tested for	Results	Max. /Min. value permissible	Remarks
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