- e. Use premium paint only for all interior and exterior concrete surfaces. The contractor shall also follow the painting schedule and paint finishes as specified below:
 - For interior and exterior concrete surfaces including:
 - Primer (1st Coat): Boysen Permacoat Flat latex one (1) coat
 - Putty: Boysen Masonry putty #7311- two (2) coats, full
 - Top Coat (2nd & 3rd): Boysen Permacoat Semi-gloss flat latex two (2) coats
 - Ceiling surfaces:
 - Primer (1st Coat): Boysen Permacoat Flat Latex one (1) coat
 - Putty: Boysen Spot Putty #7311 two (2) coats
 - Top Coat (2nd & 3rd Coat): Boysen Permacoat Flat Latex two (2) coats
 - Wall Color Top Coat (Tulle White B7501)
 - Lobby/Hallways, Pantry, Powder Room, Control Rooms, Powder Room, Display Area, Storages, Utility/Janitorial Rooms, Kitchen, Office
 - Wall Color Top Coat (White Room BSG106)
 - Director's Office, Waiting Area, Conference Room, Extension Service Office, Extension Coordinator's Office
 - Wall Color Top Coat (Shaded Ice BSG12)
 - Function Halls
 - Wall Color Top Coat (Gray Tropics BSG26)
 - Rooms 201, 202, 205
 - Wall Color Top Coat (Coast Light BSG105)
 - Room 203, 204
 - Wall Color Top Coat (Tulle White B7501)
 - Fiber Cement Board Ceiling
 - Wall Color Top Coat (Winter Morning B707, Blue Royale T-5411)
 - Exterior Wall

XXV.B Painting Works (Metal)

- a. Metal shall be clean, dry and free from mill scale and rust. Remove all grease and oil from surfaces.
- b. Wash unprimed galvanized metal with etching solution and allow it to dry.
- c. Where required to prime coat surface with Red Lead Primer same shall be approved by the Engineer.
- d. Use premium paint only for all painting works. The contractor shall also follow the painting schedule and paint finishes as specified below:
 - For all metal surfaces:
 - Primer (1st & 2nd Coat): Boysen Red Oxide Primer #4310 two (2) coats
 - Top Coat: Boysen Quick Drying Enamel White B600 two (2) coats

XXV.C Painting Works (Wood)

- a. Woodworks shall be hand-sanded smooth and dusted clean.
- All knotholes pitch pockets or sappy portions shall be sealed with natural wood filler. Nail holes, cracks or defects shall be carefully puttied after the first coat, matching the color of paint.
- Interior woodworks shall be sandpapered between coats.
- d. Cracks, holes of imperfections in plaster shall be filled with patching compound and smoothed off to match adjoining surfaces.
- e. Use premium paint only for all woodworks. The contractor shall also follow the painting schedule and paint finishes as specified below:
 - For all wooden surfaces:
 - Primer (1st Coat): Flat wall enamel #800 one (1) coat
 - Putty: Glazing putty two (2) coats
 - Top Coat (2nd & 3rd): Semi-gloss/ gloss enamel White B600 two (2) coats

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PART D. PLUMBING/ SANITARY WORKS

XXVI. Plumbing & Sanitary Works

All works shall be done under the direct supervision of a licensed Master Plumber and in strict accordance with these specifications and of the methods as prescribed by the national Plumbing Code of the Philippines.

- 1. All Materials delivered on site shall be brand new and have an Approved Material Inspection Report from the Project Monitoring Committee.
- 2. Provide proper support and hangers for all pipes (see details on plan).
- 3. Complete water leak testing of plumbing works shall be done before closing or installation of ceiling panels.
- 4. Pipe sleeve shall not be located within the distance 2 times depth of beam from face of support.
- 5. Pipe fitters and Installers Shall have competency Certificate (NCII).
- 6. Provide proper pipe sleeves on all pipes crossing along Structural and Architectural members (see structural details and pipe sleeves details on plan).
- 7. Provide correctly located opening of proper sizes where required in walls and floors for pass of pipes.
- 8. Care shall be taken as not to weaken the structural integrity of the building.
- 9. Relocation or modification of pipes required proper execution and provide shop drawings approved by Monitoring/Planning Engineer.
- 10. All plumbing works shall be done by experienced plumber/pipe fitters/installers and shall be supervised by a duly Registered Master Plumber.

XXVI.A Cold Water Line

- a. All pipes and fittings shall be clean before joining.
- b. All cold waterline pipes and fittings shall be PPR-PN10 (Neltex).
- Use PPR fusing machine in joining pipes and fittings.
- d. Provide air chamber for each fixture.
- e. Provide and install One (1) Set of Water meter located as per plan.
- f. Provide heavy duty type brass Gate Valves, Stainless Steel flush valves for urinals, and Stainless-Steel angle valves for sanitary fixtures located as per plan.
- g. Provide and install one (1) set of Stainless-Steel Grade 304 Horizontal Water Tank (1000L) with support.
- h. Provide and install 25mmØ Brass Float Valve on supply pipe connected to water tank.
- Provide and install 1Hp Water Pump with 42gals. Pressure Tank, Pressure gauge, Pressure Switch and accessories (1HP,230V, 16.84Amps).
- j. Provide and install one set of Water Meter.

XXVI.B Plumbing & Sanitary Piping

- a. All pipes and fittings shall be clean before joining.
- b. All PVC pipes and fittings shall be series 1000 (Moldex) it includes Waste Pipe, Soil Pipe, Vent Pipe and storm drain pipes.
- c. Provide P-traps on lavatory, Urinals, and floor drains located as per plan.
- d. Provide cast iron cover for all floor cleanouts.
- e. All cleanouts shall be accessible for maintenance purposes.
- f. Use 150mmØ PVC pipe (3.8mm thk. Moldex) storm drain pipe. Storm drain pipe outlets shall be connected to nearest campus drainage.
- g. Vent pipe Shall Be extended 300mm to above roof level and provide vent cap / insect screen.
- h. Provide pipe casing (plaster) for all pipe riser down spouts and exposed pipes.

XXVI.C Plumbing Fixtures

The Contractor shall provide and install the following plumbing fixtures as summarized below:

- a. One (1) set of stainless-steel kitchen sink (Double Bowl Sink).
- b. One (1) set of stainless-steel kitchen sink (Single Bowl Sink).
- c. Two (2) sets Kitchen Faucet 360 Degree Rotation 304 Stainless Steel Kitchen Faucet Mixers Sink Tap Wall Kitchen Faucet Modern Mixer Y40528 (Frap)
- d. One (1) set Wall Hung Lavatory (HCG-LF90S Short Pedestal)
- e. Four (4) sets Wall Hung Lavatory (HCG-LF80S Short Pedestal)
- f. Twelve (12) sets Under Counter Lavatory (HCG-L4057)



- g. Seventeen (17) sets Lavatory Faucet
- h. One (1) Set of Water Closet (HCG-C3032T Hilton Model) located at director's office.
- i. Eight (8) sets of Water Closet (HCG-C3343R Brizo Model).
- j. Eight (8) sets of Water Closet (HCG-C415 Selene Model)
- k. Seventeen (17) Handheld Bidet (Hygienic Spray American Standard).
- I. Six (6) sets of Urinal with stainless steel Urinal Flash Valve
- m. Sixty-one (61) sets of stainless-steel 50mmØ floor drains with P-trap located as per plan.
- n. Seventeen (17) sets of stainless-steel 75mmØ scupper drain located as per plan.
- o. Seven (7) Sets of Heavy Stainless-steel faucets located as per plan.
- p. Three (3) Sets of Heavy-duty brass faucets for hose Bibb located as per plan.
- q. Nineteen (19) sets of One-way Angle Valve Stainless (1/2"x1/2") for lavatory, and kitchen sink.
- r. Seventeen (17) sets of Two-way Angle Valve Stainless (1/2"x1/2") for water closets.
- s. Eight (8) sets of American Standard ISS In-wall Bath & Shower Mono including shower valve and faucet.
- t. Eight (8) sets of stainless-steel towel bar.
- u. Eight (8) sets of ceramic soap holder.
- v. Seventeen (17) sets of Stainless Steel Tissue Holder.
- w. One (1) 1 1/4" x 60 cm stainless steel grab bar at PWD CR, Ground Floor.
- x. Connection of water Supply from the main water line (VIWAD) and processing of necessary documents is included in scope of work.
- y. Provide Air Chamber for all plumbing fixtures.
- z. Provide proper ventilation on all fixtures (see plan). Vent Stack shall be extended 300mm at roof deck (See Detail).
- aa. Provide and install the following as specified (see details):

SPECIFICATION	QTY/ LOCATION	FIXTURE
One (1) set of stainless-steel G-304 kitchen sink (Double Bowl Sink) with Kitchen Faucet 360 Degree Rotation 304 Stainless Steel Kitchen Faucet Mixers Sink Tap Wall Kitchen Faucet Modern Mixer Y40528 (Frap)	1 set – Second Floor Kitchen	
One (1) set of stainless-steel G-304 kitchen sink (Single Bowl Sink) with Kitchen Faucet 360 Degree Rotation 304 Stainless Steel Kitchen Faucet Mixers Sink Tap Wall Kitchen Faucet Modern Mixer Y40528 (Frap)	1 set – Ground Floor Pantry	Body material: Stainless steel
Wall Hung Lavatory (HCG-LF90S Short Pedestal)	1 set – Director's office C.R.	



Wall Hung Lavatory (HCG-LF80S Short Pedestal)	4 sets - Room 201 to 204	
Undercounter Lavatory (HCG-L4057)	12 - sets Powder Room, Ground floor and second floor male / female C.R., Room 205-206 Male / Female C.R.	
Water Closet (HCG-C3032T Hilton Model) located at director's office	1 set – Director's office C.R.	
Water Closet (HCG-C3343R Brizo Model)	8 sets – Comfort rooms at second floor	
Water Closet (HCG-C415 Selene Model)	8 sets – Bedrooms' C.R.	
Handheld Bidet Spray (Hygienic Spray - American Standard)	17 sets – for all Water Closets	
Urinal (Pozzi PSK – 5090 (d2006) Antiva White (680 x 240 x 340 mm)	6 sets – Men's CR	

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