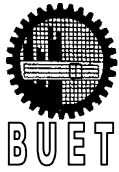


BANGLADESH UNIVERSITY OF ENGINEERING AND TECHNOLOGY, DHAKA -1000



DEPARTMENT OF CIVIL ENGINEERING

Committed to Quality Assurance for Better Bangladesh



APPROVED RATES FOR TESTING OF MATERIALS AND SERVICES

Rates include VAT (15%), Univ. (30%) & Dept. (2%) overheads and effective from 1st July 2011
Department of Civil Engineering reserves the right to change the rates at any time without any prior notice

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BRTC Office Time : Sat to Wed => 9:00 am - 5:00 pm & Thu => 9:00 am - 1:00 pm

Sl. No.	Name of Tests	Test Rate (Tk.)	Sl. No.	Name of Test	Test Rate (Tk.)
AGGREGATES			BITUMEN		
1	Sieve analysis (CA) / Gradation / FM / Particle Size	2,200	1	Specific gravity / Sp. Gr. / Density	1,600
2	Sieve analysis (Ballast)	2,600	2	Penetration / Grading	1,600
3	Sieve analysis (FA) / FM	1,200	3	Loss-on-heating	1,600
4	Wash sieve / Material Finer than #200 sieve / Silt Content	1,500	4	Flash & Fire points	1,600
5	Aggregate crushing value(ACV) / Compressive Strength	2,600	5	Solubility (100/= for Chem.)	1,500+100
6	Aggregate Impact value (AIV)	2,400	6	Ductility 100/= for Chem.)	1,500+100
7	Ten percent fine value (TFV)	4,000	7	Softening point (R&B) (100/= for Chem.)	1,500+100
8	Angularity number (Including sp. gr.)	2,600	8	Thin Film Oven	1,900
9	Elongation Index (EI) / Shape Test	2,100	9	Float test	1,600
10	Flakiness Index (FI)	2,600	10	Foaming Test	1,600
11	L.A. Abrasion of CA	2,900	11	Spot Test	1,600
12	L.A. Abrasion of Ballast (500/= for L.C.)	3,100+500	12	Viscosity, Saybolt Furol (S.F.)	3,400
13	Unit weight of aggregate (CA)	1,600	13	Viscosity (Kinematic)	4,600
14	Unit weight of aggregate (FA)	1,400	14	Viscosity (Absolute / Dynamic)	6,900
15	Soundness with Na ₂ SO ₄ (1600/= for chem.)	6,400+1,600	15	Ash Content / Inorganic Matter	3,400
16	Soundness with Mg ₂ SO ₄ (3300/= for chem.)	6,700+3,300	16	Any test on residue from Loss-on-heating test	3,000
17	Absorption and Specific Gravity / Density (for Ballast)	2,600	17	Any test on residue from Thin Film Oven test	3,400
18	Clay lump & friable particles	2,100	18	Coating & Stripping test with/without Anti-Stripping Agent/Dose	2,400
19	Organic impurities	1,500	19	Ashphalt Concrete Mix Design (Marshall)	30,500
20	Coal & lignite (400/= for chemicals)	1,700+400	20	Particle Charge Test of Bitumen Emulsion	2,100
21	Mica Content	3,200	PAVEMENT		
22	Effect of organic impurities (1100/= for chem)	7,600+1,100	21	Bitumen content (3200/= for Chemical)	4,800+3,200
23	Salt content / Sulphate content / Salinity	1,600	22	Water Content	4,000
24	Foreign material content / Deleterious substance	8,400	23	Theoretical Max. Sp. Gr.	2,600
25	Bulking of sand	3,000	24	Density	1400
26	Void Ratio / Porosity / Moh. Hardness	2,600	25	Marshall Stability and Flow Test	2,400
27	Co-efficient of Sand (d ₁₀)	2,400	26	Distillation	5,500
28	CBR of Base or Sub-base material	24,400	27	In-Situ per core cutting	4200 + **
29	Standard Proctor test of aggregate (MDD)	9,800	28		
30	Modified Proctor or Vibrating Hammer	14,600	29		

BRICKS (Bricks needed for ASTM = 5 nos., BS = 10 nos.)		
1	Absorption (ASTM / BS Standard)	1300 / 2500
2	Crushing strength(ASTM / BS Stand; 300/400/= capping mat.)	2400 / 4400
3	Size & shape (ASTM / BS Standard)	1900 / 1900
4	Unit Weight (ASTM / BS Standard); 200/300 for LC	2000 / 3900
5	Unit Wt. & Absorption (ASTM / BS Stand); 200/300 for LC	2900 / 5600
6	Efflorescence (needed 10 additional bricks)	2,400
7		
HOLLOW / SPECIAL BRICK BLOCKS / KERB (set of 3 nos.)		
8	Comp. strength of Hollow bricks, Paving / Concrete blocks etc.	2,300
9	Compressive strength of Road Kerb Stone	2,600
10	Absorption	1,300
11	Unit weight	1,800
12	Comp. strength of Hollow bricks, Paving block incl. unit wt.	3,800

R.C.C PIPES		
1	Pipes (dia upto 600mm)	4,100
2	Pipes (dia above 600mm and upto 900mm)	4,600
3	Pipes (dia above 900mm and upto 1200mm)	5,800
4	Pipes (dia above 1200mm and upto 1524mm)	7,600
5	In-situ pipe testing	5800 + *
Manhole Covers ^		
1	Load & wt. test on manhole covers (<18 inch or 450 mm Dia)	3,600
2	Load & wt. test on manhole covers (>18 inch or 450 mm Dia)	3,900
Miscellaneous		
1	Initial Rate of Absorption/Suction for Brick	2,100
2	Alkali-Silica Reactivity for Stone/Sand	10,500

Note: ^ Pipe specimens & Manhole covers have to be taken away by the Client, immediately after the test is performed.

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Sl. No.	Name of Tests	Test Rate (Tk.)
CEMENT CONCRETE		
1	Concrete cylinders (100x200mm), for a set of 3 nos.	1,300
2	Concrete cylinders (150x300mm), for a set of 3 nos.	2,500
3	Cubes (< 200mm) , for a set of 3 nos.	2,100
4	Cubes (200mm - 300mm), for a set of 3 nos.	2,500
5	Cubes (>300mm), each core cutting & testing (300/= for fuel)	4,700+300
6	Concrete Spun, for a set of 3 nos.	2,100
7	Concrete beam in flexure, for a set of 3 nos.	5,300
8	Concrete slab in flexure, for a set of 3 nos.	7,400
Concrete Mix Designs		
9	Con. cylinders casting & testing, for a set of 6 nos.	12,300
10	Concrete mix design without admixture	39,000
11	Concrete mix design using admixture	44,000
Destructive and NDT Tests		
12	In-Situ per core cutting & testing (without scanning)	4700 + **
13	In-Situ per core cutting & testing (with scanning)	7900 + **
14	In-Situ Hammer Test - per spot / location (min. 3 tests)	1900 + *
15	In-Situ Winsor Pin Test - per spot / location (min. for 3 tests)	2100 + *
16	In-Situ Scanning test - per spot / location (for 2 scans)	8100 + **
17	In-Lab Block/Kerb per core cutting & testing (300/= LC)	4,700+300
18	In-Lab Supplied Core Testing (for 3 cores)	1,600

Sl. No.	Name of Tests	Test Rate (Tk.)
CALIBRATION		
1	Pressure gauge / Dial Gauge	3,400
2	Hydraulic Jack with pressure gauge (Regular)	15,800
3	Hydraulic Jack with pressure gauge (Large) + 800 kg	21,000
4	Deflection dial	2,400
5	Proving ring (< 100 kN)	2,900
6	Proving ring (100 kN to 500 kN)	3,700
7	Proving ring (> 500 kN)	4,800
8	Dynamometer	6,700
9	Compression / Tension Testing Machine (with one dial)	6,200
10	Calibration of Concrete Mix Batching Plant	200,000
Balance and Weight		
11	Electronic Balance upto 20kg / Platform Scale / Balance	6,200
12	CA measuring potable fara / Measuring cub	3,200
13	Schmidt Hammer (Rebound)	7,900
14	Weight < 2kg / Load Cell	6,200
Cement Testing Apparatus		
15	Mixture Machine (Mortar cube & setting)	6,200
16	Blaine Apparatus	6,200
17	Vibration Machine	6,200
18	Joisting Table	6,200
19	Vicat Apparatus	4,800
20	Cement Autoclave Machine	6,200
21		
Survey Equipment		
22	Theodolite	9,900
23	Level	7,600
24		
Miscellaneous Equipment / Devices		
25	Verneer Scale/ Micro meter	1,300
26	Steel Scale	1,300
27	Thermometer	2,100
28	Sieve	2,400
29	Tacheometer	9,900
Outside Laboratory / In-situ Calibration		
30	Compression / Tension Testing Machine (with one dial)	6200 + **
31	Portable Weighing Bridge	10,500

Sl. No.	Name of Tests	Test Rate (Tk.)
CEMENT (ASTM / AASHTO)		
1	Comp. strength, 3, 7 & 28 days (600/= Ottawa Sand)	5,400+600
2	Setting time	1,900
3	Fineness	1,300
4	Setting time (only)	2,300
5	Normal Consistency (only)	1,200
6	Density / Sp.Gr.	2,500
Chemical Tests of Cement		
6	Loss on ignition (Ordinary Portland Cement)	2,000
7	Loss on ignition (Compsite Blended Cement)	6,500+400
8	Sulfur Trioxide (SO3)	5,200+300
9	Insoluble Residue	4,000+300
10	Sulfur Trioxide (SO3)+ Insoluble Residue	7,900+500
11	Silica (SiO2)	7,800+300
12	Ferric Oxide (Fe2O3)	7,900+800
13	Silica+ Alumina (SiO2 + Al2O3)	23,500+1,600
14	Alumina or Aluminium Oxide (Al2O3)	19,600+1,300
15	Aluminium Oxide (Al2O3) + Ferric Oxide (Fe2O3)	19,600+1,300
16	Aluminium Oxide(Al2O3)+Ferric Oxide(Fe2O3)+Silica(SiO2)	23,500+1,600
17	Calcium Oxide (CaO)	17,000+1,100
18	Calcium Oxide + Silica (CaO+SiO2)	21,000+1,300
19	Magnesium Oxide (MgO)	22,400+1,900
20	Calcium Oxide (CaO) + Magnesium Oxide (MgO)	22,400+1,900
21	Calcium Oxide(CaO)+Mag. Oxide(MgO)+Silica(SiO2)	30,100+2,200
22	Calcium Oxide (CaO)+Mag. Oxide (MgO)+ Al2O3	37,900+2,500
23	Cal.Oxide(CaO)+Mag.Oxide(MgO)+Fer.Oxide(Fe2O3)	30,300+2,700
24	Cal. Oxide(CaO)+Mag. Oxide(MgO)+Fe2O3+Al2O3	32,900+3,300
25	Cal.Oxide(CaO)+Mag.Oxide(MgO)+Fe2O3+Al2O3+SiO2	36,900+3,600
26	Tricalcium Aluminate (C3A)	19,600+1,300
27	Tricalcium Silicate (C3S)	33,900+2,100
28	Dicalcium Silicate (C2S)	33,900+2,100
29	Sodium Oxide (Na2O)	5,300+500
30	Potassium Oxide (K2O)	5,300+500
31	Total Alkali	10,700+1,000
32	Water soluble Sodium Oxide (Na2O)	5,900+500
33	Water soluble Potassium Oxide (K2O)	5,900+500
34	Water soluble Alkali	11,800+1,000
35	Test on Admixture (Mineral) for Cement/Concrete	ask at the counter
Durability / Soundness		
1	Expansion of Mortar ASTM C1038	5,300
2	Sulfate Resistance ASTM C1012	9,500+1,000

Sl. No.	Name of Tests	Test Rate (Tk.)
ROD (set of 3 nos.)		
Any grade of Rebar		
1	Tension test incl. wt. & elongation (upto 25mm)	1,600
2	Tension test incl. wt. & elongation (above 25mm & upto 32mm)	2,400
3	Bend test (upto 25mm)	700
4	Bend test (above 25mm)	800
5	Rebend test (upto 25mm)	900
6	Rebend test (above 25mm)	1,000
7	Stress-strain curves (Mod.of Elasticity)	5,500
8	Deformation Measurement	1,300
Bolt, Angle & Plate (set of 3 nos.)		
9	Bolt, Tension test upto 30mm	1,900
10	Bolt, Tension test above 30mm (LC 500/=)	2,800+500
11	Bolt, Shear test upto 20mm	1,500
12	Bolt, Shear test above 20mm (LC 500/=)	1,500+500
13	Angle / Plate, Tension test upto 16mm (LC 900/=)	1,900+900
14	Angle / Plate, Tension test above 16mm (LC 2000/=)	2,000+2,000

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ROD (Miscellaneous)			Sl. No.	Name of SOIL Tests	Test Rate (Tk.)
1	Hooks/Shaft, Tension test ; for a set of 3 no.(LC 900/=)	2,500+900	Index & Physical properties		
2	H.T. Wire, Tension test; for a set of 3 nos.	3,200	1	Sp. gr.	1,500
3	Strand / Cable, Tension test, for a set of 3 nos.	8,700	2	Unit weight (wet & dry)	1400
4	Fibre Glass Stainers / Pipes, Tension test, for a set of 3 nos.	3,000	3	Void ratio (Sp. Gr. & Unit Wt.)	2,400
5	Fibre Glass, Compression test, for 1 sample	1,300	4	Moisture content	600
6	Timber , Compression test, for 1 sample (LC 1000/=)	8,200+1,000	5	Linear Shrinkage	1,300
7	Timber, Flexure test, for 1 sample (LC 1000/=)	4,600+1,000	6	Skrinkage limit	1,100
8	Hardness test (Rockwell), for a set of 3 nos. (LC 500/=)	1,100+500	7	Liquid limit and Plastic limit	2,100
9	Impact test, for a set of 3 nos. (LC 1000/=)	1,400+1,000	8	Grain size analysis by wash sieving	1,600
10	Spring test, for per specimen	2,000	9	Hydrometer, sieve analysis & sp. gr.	3,700
11	Bond / Weld Test or Rop lapping test	1,500	10	Organic matter content	2,400
12	Sheet Pile, Wt. per m, Dim.; (LC 1000/=)	4,800+1,000	11	Loss on ignition	2,000
13	Sheet Pile, Section Modulus / Moment of Inertia.; (LC 2000/=)	8,000+2,000	12	Sand equivalent test	3,000
14	Aluminium Column, Compression test	5,300+1,000	Compaction and density tests		
15	MS Box Welding, Compressive Strength; (LC 3000/=)	3,900+3,000	13	Max. and Min. density of cohesionless soil	4,300
16	Scaffolding / Steel Props / Jog	8,100	14	Standard Proctor Compaction test	4,300
17	Dog Spike	3,400	15	Modified Proctor Compaction test	4,800
18	Steel Sleeper; (LC 800/=)	3,500+800	Permeability and seepage characteristics		
19	Prestressing Anchorage System; (LC 5000/=)	70,000+5,000	16	Permeability of cohesionless soil by 1-dimensional consolidn	10,500
20			17	Permeability of cohesionless soil (falling head)	5,000
TILES (set of 5 nos.)			18	Permeability of cohesionless soil (constant head)	10,000
1	Size & shape	1,400	Consolidation and swelling characteristics		
2	Absorption (with flexural needs additional 5 nos.)	1,400	19	One dimensional consolidation (e - log p, Cc,Cr,Cv)	10,500
3	Flexural / Modulus of Rupture	1,800	20	Swelling Index / Swelling Pressure	10,500
4	Warpe	1,300	Strength and deformation characteristics		
5	Acid Resistance (Vitriol)	6200	21	Unconfined compression test	2,600
RUBBER / PLASTIC / PVC MATERIALS			22	Lab. California Bearing Ratio (CBR) of soils	12,200
1	Tension, for a set of 5 samples	2,200	Direct shear tests		
2	Hardness, for 1 sample	1,300	23	Consolidated Drained test	4,800
3	Flexural, for a set of 5 samples	2,600	24	Consolidated quick test	4,300
4	Compression, for 1 sample	2,600	25	Unconsolidated quick test	3,000
5	Compression stiffness, for 1 sample	3,700	Triaxial shear tests		
6	Water Stopper - Tension, Dim., Elongation; LC 500/=	4,100+500	26	Consolidated Drained compression test	23,200
7	Water Stopper - Sp. Gr. / Hardness	3,200	27	Con. undrained compression test with pore pressure	17,400
Soil Boring (Including relevant tests & report)			28	Con. undrained compression test without pore pressure	11,700
	Soil Boring per bore		29	Uncon. undrained compression test without pore press	8,100
	Within Dhaka City - depth upto 60'-0"	50,000	30	Con. undrained extension test without pore pressure	14,000
	Within Dhaka City - depth upto 100'-0"	Consultation with teacher is required	31	Cyclic Triaxial Test	Pl consult teacher
	Outside Dhaka City - depth upto 60'-0"		32	Bentonite	9,500
	Outside Dhaka City - depth upto 100'-0"		Geotechnical Tests (Field)		
<i>(Notes: Minimum 3 borings for a particular site; Guidelines : upto 3 katha - 3 nos; 3 - 5 katha - 5 nos; 6 - 10 katha - 8 nos)</i>			33	Field CBR (6 spots+2 Proctor/max-min density + 2 sieve/Hydrometer)	50,000 + **
36	Field density per spots (In addition proctor/max-min density and sieve/Hydrometer tests are needed to be done - please consult with respective Teacher) Min total fees: within Dhaka City - Tk.50,000/-** and outside Dhaka City - Tk.75,000/-**	4,000+**	34	Filed CBR per spot with field density (in addition Proctor/max-min density and sieve/Hydrometer tests are needed to be done - please consult with respective Teacher) Min total fees: within Dhaka City - Tk.50,000/-** & outside Dhaka City - Tk.75,000/-**	6,000+ **
			35	Field density(8 spots+2 Proctor/max-min density+2 sieve/Hydrometer)	50,000 + **
GEOTEXTILES / BAGS (for a set of 3 no. samples)					
1	Apparent/Effective Opening Size (AOS/EOS)/Pore Size (3 specimen)	3,000	9	Trapezoidal Tearing Strength	3,000
2	Burst Test Index	2,200	10	Unit Weight / Mass (3 specimen)	1,500
3	Index Puncture Resistance or CBR Puncture (10 specimen)	2,200	11	Ver. Permeability Under 2 kN/m2 and 200 kN/m2	6,200
4	Cone Penetration Test	2,200	12	Vertical Permeability Under 2 kN/m2 Pressure	3,700
5	Grab Tensile strength & elongation (5 specimen x 2-dir)	3,000	13	Water Permeability by Permittivity	3,000
6	Hor. Water Permeability Under 2kN/m2 pressure	4,300	14	Horizontal Water Permeability Test	4,000+300
7	Seam Strength (6 specimen)	3,000	15	Strip/Wide-Width Tensile strength & elong) (5 specimen x 2-dir)	3,000
8	Thickness (10 specimen)	800	1	Grab Test (Long. & X-dir. & Top & Bot. seam) of Geo Bag	10,400
ELASTOMERIC BEARINGS					
1	Vulcanized rubber and thermoplastic elastomer in tension and elongation at break, ASTM D412 (set of 3)	3,800+600	8	Test for rubber durability-deterioration in an air oven, ASTM D573 (set of 3)	3,700
2	Short duration compression test on plain and steel laminated elastomeric bearings for bridges, ASTM D4014 (set of 1)	4,300	9	Test for determining the adhesion on rigid substrates, ASTM D429 (set of 1)	3,000
3	Long duration compression test on plain and steel laminated elastomeric bearings for bridges, ASTM D4014 (set of 1)	8,600	10	Dimensional test (external and internal) giving number & thickness of steel plates, elastomer parallelism,	1,900
4	Determination of shear modulus, ASTM D4014 (set of 3)	5,600+600	11	Ash content	3,000
5	Test for compression set, ASTM D395 (set of 4)	5,000+600	12	Heat Resistance test at 100 C for 72 hours	3,700
6	Dimension Test	1,900	13	After ageing	4,300+3,200
7	Determination of durometer hardness, ASTM D2240 (set of 1)	1,900	14		

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Sl. No.	Name of Tests	Test Rate (Tk.)	Sl. No.	Name of Tests	Test Rate (Tk.)
WATER TESTS			Miscellaneous Water Quality Parameters		
Routine Drinking Water Parameters (Package)			1	pH	150+150
1	pH	5,000 + 1,800 = 6,800	2	Color (True or Apparent)	100+100
2	Color (True or Apparent)		3	Color Scanning at Specific Wavelength/UV-VIS Range	600+100
3	Turbidity		4	Turbidity	150+50
4	Total Hardness		5	Carbon-di-Oxide (CO ₂) / Acidity	150+50
5	Chloride (Cl)		6	P-Alkalinity/ M-Alkalinity/T-Alkalinity	150+50
6	Total Dissolved Solids (TDS)		7	Carbonate (CO ₃) or Bi-carbonate (HCO ₃) + pH	350+150
7	Manganese (Mn)		8	Total Hardness	450+150
8	Arsenic (As)		9	Ca - Hardness	1,200+400
9	Total Iron (Fe) - Phenanthroline Method		10	Mg - Hardness	1,200+400
10	Total Coliform(TC)/Thermotolerant Coliform (TTC)		11	Chloride (Cl)	450+150
11	Fecal Coliform (FC)		12	Fluoride (F)	400+100
Environmental Quality of Soil, Sludge and Solids			13	Ammonia-Nitrogen (NH ₃ - N)	500+300
1	pH	150+150	14	Nitrate - Nitrogen (NO ₃ - N)	350+150
2	Electrical Conductivity	450+150	15	Nitrite - Nitrogen (NO ₂ - N)	350+150
3	Organic Matter (Dry Combustion Method)	1,100+200	16	Total Nitrogen (TN)	3,500+1,500
4	Organic Matter (Wet Combustion Method)	1,900+500	17	Total Kjeldahl Nitrogen (TKN) / Organic Nitrogen	10,000+3,000
5	Water Soluble Cl / PO ₄ / SO ₄ (each)	1,000+500	18	Chlorine Content - Total Cl ₂	350+150
Metal Analysis Following T. Extraction and / or TCLP:			19	Chlorine Content - Free Cl ₂	350+150
6	Total Extraction Charges (each sample)	1,200+500	20	Iodine Content	350+150
7	Toxic Characteristics Leaching Procedure (TCLP)	2,500+2,500	21	Bromine Content	350+150
8	Ca/Cd/Co/Cr/Cu/Fe/Mg/Mn/Ni/Pb/Zn - using FLAAS +	900+300	22	Break Point Chlorination	4,800+1,200
	Aluminum (Al) - using GFAAS	3,000+500	23	Total Solids (TS)	600+100
	Arsenic (As) - using GFAAS	900+400	24	Total Suspended Solids (TSS)/Insoluble Solids/(TSS+TDS+TS)	1,300+200
	Mercury (Hg) - Cold Vapor Method	2,300+1,200	25	Total Dissolved Solids (TDS)	600+100
	Selenium (Se) - using GFAAS / Ba	1,700+800	26	Silica Content (SiO ₂)	500+300
	Na or K (each) - using FLAAS	1,100+400	27	Colloidal Silica	1,500+500
9	Mixed Liquor Suspended Solids (MLSS)	3,000+500	28	Electrical Conductivity (EC)	350+150
10	Mixed Liquor Volatile Solids (MLVSS)	3,000+500	29	Total Phosphorous (TP)	2,500+500
11	Pb or Cd release from Tableware (each)	1,000+400	30	Orthophosphate (PO ₄)	500+200
Air Quality Monitoring ++			31	Hydrogen Sulphide (H ₂ S) / Odor	500+100
Parameters (upon discussion)			32	Sulphate (SO ₄)	350+150
1	CO	For the rate please ask at the counter	33	Organic Matter ***	1,500+300
2	SO _x		34	Biochemical oxygen Demand (BOD) - 5 day	1,200+300
3	NO _x		35	Chemical Oxygen Demand (COD)	1,100+400
4	CH ₄		36	KMnO ₄ Value	900+300
5	SPM		37	Dissolved Oxygen (DO)	300+200
6	PM ₁₀		38	Boron (B)	1,300+1,200
7	PM _{2.5}		39	Manganese (Mn): UV - VIS	900+300
8	Engine Exhaust Monitoring (CO, NO _x , HC, CO ₂ , O ₂) - Min.**		40	Aluminum (Al) - using GFAAS	3,000+500
9	Total Dust in Air (Method AS/NZS 3580.10.1:2003) (each)		2,900+800	41	Arsenic (As) - using GFAAS
Noise Monitoring			42	Cyanide (Cn)	2,800+700
1	Minimum Fee *	15,000+5,000	43	Mercury(Hg)-Cold Vapor Method (Mini. 30 days required)	2,500+1,200
Sample Collection Charges +++			44	Selenium (Se) - using GFAAS / Ba	1,700+800
1	Sampling for Bacteriological Analysis **	6000 + **	45	Na or K (each) - using FLAAS	1,100+400
2	Sampling for Physical and Chemical Analysis **	6000 + **	46	Ca/Cd/Co/Cr/Cu/Fe/Mg/Mn/Ni/Pb/Zn - using FLAAS	900+300
Tubewell Design			47	Nickel (Ni) and/or Cobalt (Co) (for Drinking Water)	1,300+1,000
1	Tubewell Design (depth up to 600'), incl. 8 nos. sand test ^^	10,000+7,900	48	Total Iron (Fe) - Phenanthroline Method	500+100
2	Tubewell Design (depth above 600'), Incl. 11 nos. sand test ^^	10,000+11,600	49	Ferrous Iron (Fe ²⁺) / Ferric Iron (Fe ³⁺)	800+400
^^ For complete design, fees would be Tk. 13,000/= instead of 9,500; Drinking water package (without TC & FC) = 4,000+1,000 = Tk. 5,000/			50	Total Coliform(TC)/Thermotolerant Coliform (TTC)	550+250
			51	Fecal Coliform (FC)	550+250
			52	E. Coli	2,000+1,000
			53	Magnesium Density	2,400+600
			54	Sodium Absorption Ratio (SAR)	2,400+600
			55	Algae / Chlorophyll_a	7,500+2,500

Notes :	
+ Plus Total Extraction Charge	= 12,000+500
++ Additional fee includes:	
Sampling Charge for Air Quality Monitoring (without PM _{2.5}) =	11,700
Sampling Charge for Air Quality Monitoring (with PM _{2.5}) =	17,400

+++ Sampling charge may vary depending on the area to be sampled
* Cost depends on the client's requirements
** Usual field visit fees apply in addition to above
*** Only for Solids / Sludge

Sl. No.	Name of Tests	Test Rate (Tk.)	Sl. No.	Name of Tests	Test Rate (Tk.)
GRP Board Sandwich Panel			Non-Asbestos Fibre-Cement Board		
1	Tensile Strength (5 nos. from each Sample)	3,500	1	Modulus of Rupture (6" X 12")	
2	Tensile Modulus (5 nos. from each Sample)	9,200	2	2 nos. Parallel to Fibre Lay from Same Sheet	4,800+800
3	Flexural Strength (127 mm x 12.7 mm x 3.2mm; 5 nos)	3,500		2 nos. Parpendicular to Fibre Lay from Same Sheet	
4	Flexural Modulus (100 mm x 10 mm x 4mm; 5 nos.)	9,200	2	Modulus of Elasticity (6" X 12")	
5	Impact Strength (5 nos. from each Sample)	3,500		2 nos. Parallel to Fibre Lay from Same Sheet	9,400+800
6	Water Absorption (76.2 mm x 25.4 mm x 6mm; 3 nos.)	2,300		2 nos. Parpendicular to Fibre Lay from Same Sheet	
Consultancy on Pile Load Capacity			3	Density (from MOR Test)	1,800
1	Test Supervision & Report (per Pile)	60900 + *	4	Size & Shape (5 nos.)	2,300
Consultancy on Pile Integrity			5	Water Absorption (4" X 4"; 3 nos. from Per Sheet)	1,800+600
1	Per Pile (see conditions a,b,c) (a) Minimum fees for integrity tests in each visit (within Dhaka City-Tk.50,000/**, outside Dhaka City-Tk.75,000**) (b) Integrity tests be done on all piles for a structure (c) Pile load test be done on at least 1% of piles selected on the basis of integrity results	1500 + **	6	Moisture Content (from MOR Test)	2,300
			7	Water Tightness (24" X 20"; 3 nos. One from each Sheet)	7,100+600
			8	pH Value (from MOR Test)	900
			9	Heat & Rain Wall Structures (5' X 4'; 2 nos.; One from each Sheet)	23,200

Various Consultancy Services	
1	Land Survey (Planimetric/Topographic/Contour) by Total Station and GPS
2	Cost Estimation of Civil Structures
3	Asset Evaluation of Civil Structures/Industries/Properties
1	Design of Building, Bridges, Airport, Offshore Structures, Drainage Structures etc.
2	Structural Evaluation of Old Civil Structures without Drawings/Records
3	Quality Assurance (QA) of Civil Structures / Flat
4	Certification on Structural Stability of Civil Structures
5	Design Checking of various Concrete and Steel Structures
6	Investigation of Civil Engineering Projects
7	Assessment of Safety for old Structures
8	Strengthening of Existing Structures
1	Environmental Site Assessment (e.g. for LPG plants, Power plants)
2	Environmental Impact Assessment (EIA) of Civil Engineering Projects
3	Environmental Monitoring of Civil Engineering Projects
4	Design of Solid Waste Disposal Systems
5	Design of Water and Wastewater Treatment Systems
6	Design of Iron Removal Plants
7	Plumbing and Sewer Systems Design
8	Solid, Hazardous and Industrial Waste Management and Pollution Control
9	Design of Water Supply System
10	Training on Water Quality, Water Supply and Sanitation
1	Design and Analysis of Shallow and Deep Foundations
2	Design and Analysis of Embankments
3	Design and Analysis of Earth Retaining Structures
4	Planning of Soil Investigation Programs
5	Planning and Design of Soil Improvement Schemes
6	Seismic Design of Foundation
7	Seismic Hazard Analysis
8	Microzonation Maps
1	Transportation Impact Assessment (TIA) of Civil Engineering Projects
2	Traffic Studies (Volume, O-D, Speed, Delay, Parking etc.)
3	Traffic Forecasting
4	Geometric and Structural Design of Pavements, Parking Lots etc.
5	Planning and Design of Inland Container Terminal/Depot (ICT / ICD)
6	Planning and Design of Airport Terminal
7	Design of Runway Pavement
8	Design of Road/Highways/Bridge/Culverts
9	Planning and Design of Flyover / Underpass / Interchange
10	Road Accident Investigation/Safety Measure/Road Safety Auditing
11	Development of Transportation Model
12	Training on Traffic Studies, Traffic Management, Transportation Planning, Traffic Safety

Notes: [* Field visit fee; inside Dhaka = Tk. 7000; Greater Dhaka = Tk. 11000; other Districts = Tk. 14000; Remote areas = Tk. 20000] [** Field visit fee + Tk. 2000 if Core Cutter/Scanner/Load Cell etc. are needed.] [* & ** Transport, local hospitalities, accommodation (in case of overnight stay) etc. are to be provided by the client]