

PAGE NO	SEC NO	BILL NO	ITEM NO	DESCRIPTION	UNIT	LOCAL CONTENT THRESHOLD	QUANTITY	RATE
1	2	1		SECTION NO. 2	H2			
1	2	1		BILL NO. 1	H2			
1	2	1		ALTERATIONS, DEMOLITIONS, ETC.	H2			
1	2	1		PREAMBLES				
1	2	1		Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
1	2	1		SUPPLEMENTARY PREAMBLES				
1	2	1		Notes: 1.Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part B of the Prasa Specifications before pricing this bill				
1	2	1		GENERAL NOTES				
1	2	1		For further preambles and full descriptions of Items not fully described in this Bill, reference must be made to supplementary preambles and descriptions in the other Bills of this Section. Such supplementary preambles and descriptions shall apply equally				
1	2	1		GENERAL				
1	2	1		In taking down and removing existing work the utmost care shall be observed to prevent any structural or other damage to remaining portions of the building and the Contractor shall provide all shoring, needling, strutting, etc. to ensure stability				
1	2	1		Any water supply and other piping that may be encountered and which is found necessary to disconnect or cut shall, after such disconnection or cutting has been authorised by the Representative/Agent, be effectively stopped off				
1	2	1		EXISTING BUILDINGS				
1	2	1		The existing buildings will be in use and occupied during the progress of the contract and the Contractor will be required to carry out the works in such a manner as will least interfere with the occupants and with the minimum of disturbance				
1	2	1		SIZE PERTAINING TO EXISTING WORK				
1	2	1		The Contractor is advised to take all dimensions affecting the existing buildings on the site and he will be held solely responsible for the correctness of sizes of all new work. All sizes given in relation to existing work are approximate.				
1	2	1		MAKING GOOD DAMAGED WORK				
1	2	1		The Contractor shall make good in all trades to existing work where damaged or disturbed through the alterations with all necessary new materials to match the existing				
1	2	1		FORMING NEW OPENINGS OR ALTERING OPENINGS IN EXISTING WALLS				
1	2	1		Descriptions of forming new openings or altering openings in existing walls shall be deemed to include breaking out for and forming new brick, in-situ concrete or prestressed concrete lintels, including all reinforcement, formwork, turning pieces, etc.				
1	2	1		BUILDING UP OPENINGS				
1	2	1		Descriptions of building up existing openings where given in number shall be deemed to include preparing existing surfaces all around, brickwork properly toothed and bonded to existing, wedging up and making good on both sides as described				
1	2	1		PAINTWORK				
1	2	1		Where plasterwork on walls, ceilings, etc. are required to be patched or made good, prices are to include for the appropriate priming coat and one coat undercoat to receive paint finishing coats which are measured elsewhere				
1	2	1		The contractor must protect all work not removed such as walls, floors, doors, windows, fittings, etc. from damage during the progress of the work and provide all necessary materials for doing so.				
1	2	1		Tenderers are advised to visit the site before tendering and satisfy themselves as to the nature and extent of the works, means of access to the site and availability of working space. No claims will be entertained due to the tenderer having failed to comply				
1	2	1		PROCEDURE OF WORK				
1	2	1		The Representative/Agent reserves the right to direct the order in which the contract will be executed, should circumstances necessitate such action.				
1	2	1		LOSS BY THEFT, FIRE OR OTHERWISE				
1	2	1		The risk of loss, theft, fire, storm, riot or otherwise of the buildings to be demolished and the materials therein shall rest entirely with the contractor immediately upon the handing over of the site.				
1	2	1		WATER AND OTHER PIPING				
2	2	1		Any water supply or other piping that may be met with and found necessary to disconnect or cut are to be effectively stopped off or grubbed up and removed and any new connections that may be necessary and are to be made with proper fittings				
2	2	1		ELECTRICAL AND OTHER SERVICES				
2	2	1		Special care is to be exercised not to unnecessarily interfere with any electric light, bell, power, telephone or other wires and fittings that may be met with and due notice must be given to the Architect.				
2	2	1		The contractor must protect all work not removed such as walls, floors, doors, windows, fittings, etc. from damage during the progress of the work and provide all necessary materials for doing so.				
2	2	1		OCCUPATION OF EXISTING BUILDINGS				
2	2	1		Tenderers are advised that the existing buildings will be in occupation during the building operations and due allowance must be made for the work being carried out in such a manner as will least interfere with the general routine of the occupants.				
2	2	1		NOISE PREVENTION				
2	2	1		The contractor shall take special care to minimise noisy operations during business hours. Such measures will include, inter alia, the use of silent compressors and strict control of workmen.				
2	2	1		The contractor shall demolish the portions of existing structures or buildings with a minimum amount of damage to adjoining buildings, materials, pavings, etc. Any damage caused is to be made good at his own expense with materials to match the existing.				
2	2	1		ALTERATIONS TO OPENINGS				
2	2	1		Where the Contractor is required to form openings, alter openings or brick up openings in existing walls all brickwork shall be made good at jambs including properly bonding to existing. Brickwork in bricking up openings shall be wedged and pinned up to				
2	2	1		MAKING GOOD, ETC				
2	2	1		Prices are to include for making good in all trades to existing work, where damaged or disturbed through alterations, with all necessary new materials to match existing and leave complete and perfect in every respect.				
2	2	1		Prices are to include for making good in all trades to existing work, where damaged or disturbed through alterations, with all necessary new materials to match existing and leave complete and perfect in every respect.				
2	2	1		REMOVAL OF EXISTING WORK	H3			
2	2	1		Take out and remove doors, windows, etc. including thresholds, sills, etc. (new doors & windows elsewhere).	H3			
2	2	1	1	Damaged timber single door size overall 813 x 2032mm high from half brick wall. DR101	No	N/A		RATE ONLY
2	2	1	2	Damaged timber single door size overall 813 x 2032mm high from one brick wall. DR101	No	N/A		RATE ONLY
2	2	1	3	Damaged double door size overall 1 612 x 2032mm high from one brick wall. DR100	No	N/A		RATE ONLY
2	2	1	4	Damaged Windows complete. WN100	No	N/A		RATE ONLY
2	2	1		Take down and remove roofs, floors, panelling, ceilings, partitions, etc.:	H3			
2	2	1	5	Carefully examine entire roof area for leaks and remove damaged roof parts, including roof trusses, concrete roofs,etc.	m ²	N/A		RATE ONLY
2	2	1	6	Remove all ceilings complete	m ²	N/A		RATE ONLY
2	2	1		Take out and remove ironmongery, including preparing for new sets.	H3			
2	2	1	7	Toilet paper holder.	No	N/A		RATE ONLY
2	2	1	8	Liquid soap dispenser.	No	N/A		RATE ONLY
2	2	1	9	Paper towel dispenser.	No	N/A		RATE ONLY
2	2	1	10	Towel rail.	No	N/A		RATE ONLY
2	2	1		Taking out/off and removing sundry metalwork	H3			
2	2	1	11	Remove damaged burglar proofing	m ²	N/A		RATE ONLY
2	2	1		Hacking up/off and removing tiles including removing mortar bed or adhesive from concrete or brickwork and preparing surfaces for new screed, plaster, tile finish, etc	H3			
2	2	1	12	Wall tiles.	m ²	N/A		RATE ONLY
3	2	1	13	Floor tiles.	m ²	N/A		RATE ONLY

3	2	1	14 Tile skirting 100mm high.	m	N/A	RATE ONLY	
3	2	1	Take out and removing piping, sanitary fittings, etc, including cutting off as necessary, disconnecting piping from fittings and making good floor and wall finishes (making good tiling and paintwork elsewhere)	H3			
3	2	1	15 Wash hand basin with brackets, taps, etc. and all necessary piping, etc.	No	N/A	RATE ONLY	
3	2	1	16 Water closet suite complete with flushing system and all necessary piping, etc.	No	N/A	RATE ONLY	
3	2	1	PREPARATORY WORK TO EXISTING SURFACES	H2			
3	2	1	Hacking off and removing paint from existing plaster and prepare surfaces to receive new paint.	H3			
3	2	1	17 Hacking face of existing painted wall to receive new paint (elsewhere).	m ²	N/A	RATE ONLY	
3	2	1	MAKE GOOD FINISHES, ETC.	H2			
3	2	1	Make good internal granolithic, screed, plaster, etc. to match existing:	H3			
3	2	1	18 Plaster on walls in patches.	m ²	100% Cement Products	RATE ONLY	
3	2	1	19 Making good cement plaster on walls where tiles removed.	m ²	100% Cement Products	RATE ONLY	
3	2	1	BUDGETARY ALLOWANCES	H2			
3	2	1	20 Allow the amount of R 5 000.00 for external alterations/vegetation, etc. This work shall be measured on completion and priced at agreed rates.	Item	N/A	RATE ONLY	5000
3	2	1	TOTAL ALTERATIONS, DEMOLITIONS, ETC.				
3	2	2	SECTION NO. 2	H2			
3	2	2	BILL NO. 2	H2			
3	2	2	WATERPROOFING	H2			
3	2	2	PREAMBLES				
3	2	2	Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
3	2	2	SUPPLEMENTARY PREAMBLES				
3	2	2	Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part B of the Prasa Specifications before pricing this bill				
3	2	2	Waterproofing Under a ten year guarantee. Waterproofing to roofs shall be laid to even falls to outlets etc with necessary ridges, hips and valleys. Waterproofing of roofs, basements, etc shall be deemed to include additional labour to turn-ups and turn-downs				
3	2	2	DAMP-PROOFING OF WALLS AND FLOORS	H2 H2			
3	2	2	One layer of approved 375 micron embossed damp proof course	H3			
3	2	2	1 In walls, window cills, etc.	m ²	N/A	RATE ONLY	
3	2	2	Two coats bitumen emulsion waterproof coating:	H3			
3	2	2	2 On walls to receive wall tiling.	m ²	N/A	RATE ONLY	
3	2	2	JOINT SEALANTS, ETC	H2			
3	2	2	Two part grey polysulphide sealing compound including backing cord, bond breaker, primer, etc.	H3			
3	2	2	3 Point 6mm wide joint between ceramic sanitaryware and wall with type 2 one component, silicone rubber base joint sealing compound.	m	N/A	RATE ONLY	
3	2	2	4 3 x 35mm in saw cut joints in floors	m	N/A	RATE ONLY	
3	2	2	5 Rake out 12mm thick expansion joint filler to a depth of 10mm, apply approved primer, insert packing strip and fill with type 2 gungrade polysulphide base joint sealing compound.	m	N/A	RATE ONLY	
4	2	2	TOTAL WATERPROOFING				
4	2	3	SECTION NO. 2	H2			
4	2	3	BILL NO. 3	H2			
4	2	3	ROOF COVERING	H2			
4	2	3	PREAMBLES				
4	2	3	Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
4	2	3	SUPPLEMENTARY PREAMBLES				
4	2	3	Notes: 1. Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part B of the Prasa Specifications before pricing this bill				
4	2	3	Straight cutting	H2			
4	2	3	Descriptions of all roof coverings are deemed to include for all straight cutting				
4	2	3	PROFILED SHEETING OF METAL, FIBRE-CEMENT, PLASTICS, ETC.	H2			
4	2	3	Roof slates, manufactured in accordance with SANS 803:2005, size 610 x 406 x 7mm thick, fixed at a pitch of 30°, each slate twice nailed with 63 x 2,5mm copper clout nail to sawn softwood battens at 250mm centres, fixed to trusses with slates fastened together with copper disc rivets.	H3			
4	2	3	1 Roof coverings, etc.	m ²	100% Cement Product	RATE ONLY	
4	2	3	Flashings, etc.:	H3			
4	2	3	2 flashing.	m	100% Steel Products	RATE ONLY	
4	2	3	3 Ridge cappings.	m	100% Cement Product	RATE ONLY	
4	2	3	ROOF INSULATION	H2			
4	2	3	Fibreglass reinforced aluminium foil faced resin bonded glass fibre flexible insulation with galvanised straining wires fixed in strict accordance with the manufacturer's instructions:	H3			
4	2	3	100mm Thick fibreglass roof insulation laid taut over purlins (purlins at approximately 1100mm centres) with minimum 100mm side laps and fixed concurrent with roof covering including galvanised steel straining wires, etc.	m ²	N/A	RATE ONLY	
4	2	3	TOTAL ROOF COVERING				
3	2	4	SECTION NO. 2	H2			
4	2	4	BILL NO. 4	H2			
4	2	4	CARPENTRY AND JOINERY	H2			
4	2	4	PREAMBLES				
4	2	4	Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
4	2	4	SUPPLEMENTARY PREAMBLES				
4	2	4	Notes: 1. Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part B of the Prasa Specifications before pricing this bill	H2			
4	2	4	Straight cutting				
4	2	4	Descriptions of all roof coverings are deemed to include for all straight cutting				
4	2	4	DOORS, ETC.	H2			
5	2	4	2 Panel door with bolection mould/dopen inward, overall size 1 612 x 2032mm high. Guarantee: 10-year. Application: Semi-exterior, Door: 2 Panel door with bolection mould (Code: SD16/1612/OI), Door width: 1612mm, Door height: 2032mm.	H3			
5	2	4	1 Door size overall 1 612 x 2032mm high. (DR100)	No	N/A	RATE ONLY	
5	2	4	6 Panel door, overall size 813 x 2032mm high. Door range: Guarantee: 1-year, Application: Semi-exterior, Door: 6 Panel door, Door width: 813mm, Door height: 2032mm. (Frames elsewhere):	H3			
5	2	4	2 Door size overall 813 x 2032mm high. (DR101)	No	N/A	RATE ONLY	
5	2	4	FINANCIAL PROVISIONS	H2			
5	2	4	3 Allow the amount of R 5,000.00 for Joinery Work. This work shall be measured on completion and priced at agreed rates.	Item	N/A	RATE ONLY	5000
5	2	4	TOTAL CARPENTRY AND JOINERY				

7	2	7	3	Frame for door size 1 612 x 2032mm high.	No	100% Steel Products	RATE ONLY	
7	2	7		STEEL WINDOWS	H2			
7	2	7		Standard residential type steel windows with burglar bars to fixed and opening sections:	H3			
7	2	7	4	Steel windows with burglar bars (On Various sizes, window schedule by the architect to be available during construction stage)	No	100% Steel Products	RATE ONLY	
7	2	7		FINANCIAL PROVISIONS	H2			
7	2	7		The items described hereunder cover work which is not fully defined at tender stage and which is intended to be executed by the Contractor and/or his Sub-Contractors. The amounts shown shall be used as directed by the Representative/ Agent and shall be deducted in whole or in part if not required.				
7	2	7	5	Allow the amount of R 20,000.00 metalwork not specified. This work shall be measured on completion and priced at agreed rates.	Item	100% Steel Products	RATE ONLY	
7	2	7		TOTAL METALWORK				
7	2	8		SECTION NO. 2	H2			
7	2	8		BILL NO. 8	H2			
7	2	8		PLASTERING	H2			
7	2	8		PREAMBLES				
7	2	8		Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
7	2	8		SUPPLEMENTARY PREAMBLES				
7	2	8		Notes: 1.Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part 8 of the Prasa Specifications before pricing this bill				
7	2	8		Floor preparation to include grout grinding, levelling and skim coating surface with new mortar ready to receive new screed	H2			
7	2	8		Wall preparation to include grout grinding, levelling and skim coating surface with new mortar ready to receive new plaster/backing				
7	2	8		Screeds on concrete:	H3			
8	2	8	1	All surfaces to be clean and free from oil, dust or shutter release agents and concrete surfaces to be chipped or scarified to remove laitance. Apply epoxy into cavity at one point only to avoid entrapping air. Applied in accordance with approved manufacturer's specifications by approved applicators.	m ²	N/A	RATE ONLY	
8	2	8		INTERNAL PLASTER and EXTERNAL PLASTER ON WALLS	H2			
8	2	8		All existing bricks to be cleaned with Brick wash, Acid based detergent, Replace any bricks applicable with 222 x 106 x 73mm, 51 bricks per m ² and sealed with brick dressing from manufacturer	H3			
8	2	8	2	Plaster on walls	m ²	100% Cement Products	RATE ONLY	
8	2	8	3	In narrow widths.	m ²	100% Cement Products	RATE ONLY	
8	2	8		CRACK REPAIRS	H2			
8	2	8		Repairs to non-structural cracks in walls:	H3			
8	2	8	4	Cut a 6mm wide x 15mm deep saw cut above and below the crack and plaster with 5:1 cement mortar to form a v-joint.	m	100% Cement Products	RATE ONLY	
8	2	8		TOTAL PLASTERING				
8	2	9		SECTION NO. 2	H2			
8	2	9		BILL NO. 9	H2			
8	2	9		TILING	H2			
8	2	9		PREAMBLES				
8	2	9		Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
8	2	9		SUPPLEMENTARY PREAMBLES				
8	2	9		Notes: 1.Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part 8 of the Prasa Specifications before pricing this bill				
8	2	9		Descriptions Unless described as "fixed with adhesive to plaster (plaster elsewhere)" descriptions of tiling on brick or concrete walls, columns, etc shall be deemed to include 1:4 cement plaster backing and descriptions of tiling on concrete floors etc	H2			
8	2	9		WALL TILING	H2			
8	2	9		Slate tiles, size 300 x 300mm fixed to internal wall plaster backing with tile adhesive mixed with bonding liquid in lieu of water with diagonal joints continuous in both directions and grouted with tile grout (elsewhere specified), excess grout on the surface to be cleaned with water as work proceeds. Apply natural stone sealer as per manufacturer's recommendations.	H3			
8	2	9	1	On walls.	m ²	N/A	RATE ONLY	
8	2	9	2	In splashbacks, etc.	m ²	N/A	RATE ONLY	
8	2	9		FLOOR TILING	H2			
8	2	9		Rustic cement wash based tiles, size 600 x 600 x 20mm thick, with 5-8mm diagonal joints continuous in both directions grouted with suitable grout, excess grout on the surface to be cleaned with water as the work proceeds, bedded in a cement slurry on 25-30mm thick semi-dry mortar screed and tamped using a rubber mallet on a 100mm thick concrete surface bed on 150mm subbase, conforming to SANS 12000 M1 degree of Accuracy.	H3			
8	2	9	3	On floors.	m ²	N/A	RATE ONLY	
8	2	9	4	100mm High skirting.	m	N/A	RATE ONLY	
8	2	9		CORNER PROTECTORS, DIVIDING STRIPS, ETC.	H2			
8	2	9	5	12mm high aluminium straight trim fixed in strict accordance with the manufacturer's instructions.	m	N/A	RATE ONLY	
8	2	9		TOTAL TILING				
8	2	9		SECTION NO. 2	H2			
9	2	10		BILL NO. 10	H2			
9	2	10		GLAZING	H2			
9	2	10		PREAMBLES				
9	2	10		Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
9	2	10		SUPPLEMENTARY PREAMBLES				
9	2	10		Notes: 1.Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part 8 of the Prasa Specifications before pricing this bill	H2			
9	2	10		GLAZING TO STEEL WITH PUTTY	H2			
9	2	10		Install 4mm clear glazing on all missing and broken casements	H3			
9	2	10	1	Provision of R22 000 for glazing replacement. This work shall be measured on completion and priced at agreed rates. (On Various sizes, window schedule by the architect to be available during construction stage)	Sum	N/A	RATE ONLY	22000
9	2	10		TOPS, SHELVES, MIRRORS, ETC.	H2			
9	2	10		Mirrors to comply with SABS 1236 Class A.	H3			
9	2	10		6mm Silvered float glass copper backed mirrors with polished edges holed for and fixed with chromium plated dome capped mirror screws with rubber buffers to plugs in brickwork or concrete and foam backing strip all round:	H3			
9	2	10	2	Mirror size 600 x 900mm high.	No	N/A	RATE ONLY	
9	2	10		TOTAL GLAZING				
9	2	11		SECTION NO. 2	H2			
9	2	11		BILL NO. 11	H2			
9	2	11		PAINTWORK	H2			
9	2	11		Tenderers are to refer to the Model Preambles for Trades (Latest Edition) and Supplementary Preambles for further description and amplification of work in this section				
9	2	11		SUPPLEMENTARY PREAMBLES				
9	2	11		Notes: 1.Tenderers are advised to study the Prasa Norms, Guidelines and Standards (NGS) for Station Facilities and Part 8 of the Prasa Specifications before pricing this bill				

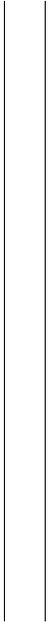
9	2	11	PAINTWORK TO NEW WORK and PREVIOUSLY PAINTED SURFACES	H2			
9	2	11	PAINTWORK	H2			
9	2	11	Approved Quality Matt paint (colour to be selected by architect) to new exterior cement plaster. Surface to be clean, dry and dust free with a moisture content of less than 12%. Prime surface with one coat Plaster Primer with an overcoating time of 4 hours and finish with two coats Matt paint with an overcoating time of 4 hours.	H3			
9	2	11	1 Internal and external plastered walls, columns, recessed bands, etc.	m ²	N/A	RATE ONLY	
9	2	11	ON METAL SURFACES	H2			
			Aluminium oleoresinous paint (colour to be selected) to previously decorated solvent based exterior shop primed mild steel.				
			Remove all shop-primer and corrosion products from the steel by means of sand blasting steel to a bright metal condition, and a cleanliness standard of Sa2½ minimum. Prime surface with one coat Primer for Steel with an overcoating time of 18 hours. Apply one coat undercoat with an overcoating time of 18 hours and finish with two coats Aluminium Paint with an overcoating time of 18 hours.				
9	2	11		H3			
9	2	11	2 Door frames and linings.	m ²	N/A	RATE ONLY	
9	2	11	3 Windows with burglar bars. (On Various sizes, window schedule by the architect to be available during construction stage)	m ²	N/A	RATE ONLY	
9	2	11	TOTAL PAINTWORK				
9	2		BUILDERS WORK SUMMARY				
9	2		1 ALTERATIONS	Page			33
10	2		2 WATERPROOFING	Page			51
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10	2		4 CARPENTRY AND JOINERY	Page			58
10	2		5 CEILINGS PARTITIONS AND ACCESS FLOORING	Page			64
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10	2		9 TILING	Page			79
10	2		10 GLAZING	Page			87
10	2		11 PAINTWORK	Page			91
			Sub-Total				
10	2		SUBTOTAL - Carried to Final Summary				

AMOUNT









PAGE NO	SEC NO	BILL NO	Item	Description	Unit	LOCAL CONTENT THRESHOLD	Qty	Rate	Amount
				SECTION NO. 3					
1	3	1	1	1 BILL 1: RETICULATION AND DISTRIBUTION BOARDS					
1	3	1.1.1	1	Distribution Boards					
1	3	1	1	Distribution boards complete with all MCBs, switchgear, accessories, sheet metal frames, sub-frames, busbars, terminals, wiring, conduit terminations, labelling, fixtures and fittings as specified, with all equipment fitted and equipped in factory all strictly as per schematic diagram. (Please note that the distribution board's shop drawing should be submitted to the Engineer for approval prior to manufacture).					
1	3	1.1.1	1	DB-A: MLVB	Supply Install	No.	N/A	RATE ONLY	
1	3	1.1.2	1	DB-B	Supply Install	No.	N/A	RATE ONLY	
1	3	1.1.3	1	DB-C	Supply Install	No.	N/A	RATE ONLY	
1	3	1.2	1	Low voltage cables 600/1 000V PVC/PVC/SWA/PVC multi-core copper cable installed in sleeves (sleeves measured elsewhere)					
1	3	1.2.1	1	35mm ² 4 Core	Supply Install	m	90% Electrical cables	RATE ONLY	
1	3	1.2.2	1	16mm ² 4 Core	Supply Install	m	90% Electrical cables	RATE ONLY	
1	3	1.2.3	1	10mm ² 4 Core	Supply Install	m	90% Electrical cables	RATE ONLY	
1	3	1.3	1	Low voltage cable terminations (Lugs, Glands & Shrouds) Make off and terminate the LV cable, complete with glands and shrouds including connection of cable to equipment terminals					
1	3	1.3.1	1	35mm ² 4 Core	Supply Install	No.	90% Electrical cables	RATE ONLY	
1	3	1.3.2	1	16mm ² 4 Core	Supply Install	No.	90% Electrical cables	RATE ONLY	
1	3	1.3.3	1	10mm ² 4 Core	Supply Install	No.	90% Electrical cables	RATE ONLY	
1	3	1.4	1	Earthing Conductors Bare stranded copper earth conductor installed in sleeves (sleeves measured elsewhere)					
1	3	1.4.1	1	16mm ²	Supply Install	m	90% Electrical cables	RATE ONLY	
1	3	1.4.2	1	10mm ²	Supply Install	m	90% Electrical cables	RATE ONLY	
				Carried forward to next page					
PAGE NO	SEC NO	BILL NO	Item	Description	Unit		Qty	Rate	Amount
				Brought forward from previous page					
2	3	1.5	1	Earthing conductor terminations					
2	3	1	1	Make off and terminate earth conductor, including lugs and connections					
2	3	1.5.1	1	16mm ²	Supply Install	No.	90% Electrical cables	RATE ONLY	
2	3	1.5.2	1	10mm ²	Supply Install	No.	90% Electrical cables	RATE ONLY	
2	3	1.6	1	Earth Rods SABS approved copper earth rod					
2	3	1.6.1	1	2400mm long 16mm diameter	Supply Install	No.	90% Electrical cables	RATE ONLY	
2	3	1.7	1	Sleeves High density (or equal and approved) polyethylene (HDPE) sleeve with double wall construction, corrugated outer wall and smooth inner wall finish inclusive of couplers, bends, etc					
2	3	1.7.1	1	110mm diameter	Supply Install	m	100% HDPE	RATE ONLY	
2	3	1.7.2	1	50mm diameter	Supply Install	m	100% HDPE	RATE ONLY	
2	3	1.8	1	Draw wires Draw wire drawn into sleeves and conduits including approximately 300mm slack in boxes, distribution board, etc.					
2	3	1.8.1	1	1.6mm ² Galvanised steel draw wire	Supply Install	m	90% Electrical cables	RATE ONLY	
2	3	1.9	1	Excavations All excavations, back filling and compaction must be done manually using local labour					
2	3	1	1	Excavate for cable and sleeve trench including temporary support of sides, keeping excavations dry, backfilling and compacting to the Engineer's specification					
2	3	1.9.1	1	Pickable Soil		m ³	N/A	RATE ONLY	
2	3	1.9.2	1	For Soft Rock		m ³	N/A	RATE ONLY	
2	3	1.9.3	1	For Hard Rock		m ³	N/A	RATE ONLY	
2	3	1.9.4	1	Bedding under and filling around cables comprising sifted sand	Supply Install	m ³	N/A	RATE ONLY	
2	3	1.10	1	Cable Tape and Markers					
2	3	1.10.1	1	PVC warning marking tape	Supply Install	m	N/A	RATE ONLY	
2	3	1.10.3	1	Concrete route markers	Supply Install	No.	100% Cement	RATE ONLY	
				Carried forward to next page					
PAGE NO	SEC NO	BILL NO	Item	Description	Unit		Qty	Rate	Amount
				Brought forward from previous page					
3	3	1.11	1	Manholes complete with heavy duty trafficable covers					
3	3	1.11.1	1	1000 x 1000 x 800 mm	Supply Install	No.	100% Steel Product	RATE ONLY	
3	3	1.11.2	1	600 x 600 x 800 mm	Supply Install	No.	100% Steel Product	RATE ONLY	
3	3	1.12	1	Area Lights Installed and mounted on poles, including poles, excavation to install poles, lamps, 5A circuit breaker and 2 x 2.5mm ² PVC conductors from circuit breaker to luminaire on top of pole.					

3	3	1	1.12.1	Type B26: Surface mounted high pressure die-cast aluminium powder coated body with injection-moulded, high-impact, non-discolouring acrylic diffuser, the diffuser shall be held to the body by four captive stainless steel Allen head screws c/w 2 x 9W LED T5 lamps, 600 lumens, IP65 and electronic control gear.	Supply Install	No. No.	N/A	RATE ONLY		
3	3	1	1.12.2	Type S1: Post top LED luminaire c/w top cover, high pressure powder coated die-cast aluminium base and gear plate, high impact acrylic protector, 55W LED lamp, 6 490 lumens, IP66, electronic control gear and 3.6m galvanised steel pole.	Supply Install	No. No.	N/A	RATE ONLY		
3	3	1	1.13	Galvanised steel conduits						
3	3	1	1.13.1	Galvanised steel conduit including bending, short lengths, draw boxes, cutting,bands, jointing, couplings, saddles and accessories as per SABS 1065. Fixed to surface or laid in or flush mounted in brickwork, dry walls (partitions), concrete, roof space or ceiling void. The rate to allow for the conduit mounting brackets to suspend conduits from concrete slab as would be required in the ceiling void. 20mm	Supply Install	m m	100% Steel Product	RATE ONLY		
3	3	1	1.14	Galvanised boxes						
3	3	1	1.14.1	Surface or flush mounted galvanised boxes with one, two, three or four way or back entry as required, including fixing to conduit with the necessary locknuts, adaptors, bushes, etc., installed chased in brickwork, on surface in ceiling or cast in concrete, excluding coverplates. 20mm	Supply Install	No. No.	100% Steel Product	RATE ONLY		
				Carried forward to next page						
PAGE NO	SEC NO	BILL NO	Item	Description	Unit		Qty	Rate	Amount	
4	3	1	1.15	PVC insulated conductors						
4	3	1	1.15.1	600/1000V PVC insulated conductors drawn into conduit or installed in wiring channel including conductor identification labels, terminating, etc. 2.5 mm ²	Supply Install	m m	90% Electrical cables	RATE ONLY		
4	3	1	1.16	Bare copper earth conductors						
4	3	1	1.16.1	Earth conductors drawn into conduit or installed in wiring channel including conductor identification labels, terminating, etc. 2.5 mm ²	Supply Install	m m	90% Electrical cables	RATE ONLY		
4	3	1	1.17	Photocell						
4	3	1	1.17.1	Photocell installed in a suitably sized rectangular bulkhead luminaire housing with clear UV stabilised high impact acrylic lens and labelling as specified 16A, 230V, Photocell	Supply Install	No. No.	N/A	RATE ONLY		
4	3	1	1.18	Testing and commissioning						
4	3	1	1.18.1	Testing and commissioning of the works covered within this bill.	Item		N/A	RATE ONLY		
				Carried forward to Summary Page						
PAGE NO	SEC NO	BILL NO	Item	Description	Unit		Qty	Rate	Amount	
5	3	2	2	2 BILL 2: BUILDING BLOCKS - ELECTRICAL INSTALLATIONS						
5	3	2	2.1	PVC conduits						
5	3	2	2.1.1	PVC conduit including bending, short lengths, draw boxes, cutting,bands, jointing, couplings, saddles and accessories as per SABS 1065. Fixed to surface or laid in or flush mounted in brickwork, dry walls (partitions), concrete, roof space or ceiling void. The rate to allow for the conduit mounting brackets to suspend conduits from concrete slab as would be required in the ceiling void. 20mm	Supply Install	m m	100% PVC Product	RATE ONLY		
5	3	2	2.1.2	25mm	Supply Install	m m	100% PVC Product	RATE ONLY		
5	3	2	2.2	PVC round boxes						
5	3	2	2.2.1	Surface or flush mounted 60mm deep PVC conduit round boxes with one, two, three or four way or back entry as required, including fixing to conduit with the necessary locknuts, adaptors, bushes, etc., installed in brickwork, on surface in ceiling void or cast in concrete inclusive of coverplates, where necessary. 20mm	Supply Install	No. No.	100% PVC Product	RATE ONLY		
5	3	2	2.2.2	25mm	Supply Install	No. No.	100% PVC Product	RATE ONLY		
5	3	2	2.3	Galvanised boxes						
5	3	2	2.3.1	Surface or flush mounted galvanised boxes with one, two, three or four way or back entry as required, including fixing to conduit with the necessary locknuts, adaptors, bushes, etc., installed chased in brickwork, on surface in ceiling or cast in concrete, excluding coverplates. 100 x 50 x 50mm	Supply Install	No. No.	100% Steel Product	RATE ONLY		
5	3	2	2.3.2	100 x 100 x 50mm	Supply Install	No. No.	100% Steel Product	RATE ONLY		
5	3	2	2.4	Cable Ladders and Trays						
5	3	2	2.4.1	Heavy Duty Galvanised Cable Ladders and Trays complete with cantilever hangers or suspension rods complete with all joints, bends, tees, splicing etc as specified on the Drawings and the Quality Specifications. 150mm wide cable ladder	Supply Install	m m	100% Steel Product	RATE ONLY		
5	3	2	2.4.2	200mm wide cable ladder	Supply Install	m m	100% Steel Product	RATE ONLY		
5	3	2	2.4.3	300mm wide wiremesh cable tray	Supply Install	m m	100% Steel Product	RATE ONLY		
				Carried forward to next page						
PAGE NO	SEC NO	BILL NO	Item	Description	Unit		Qty	Rate	Amount	
6	3	2	2.5	PVC insulated conductors						
6	3	2	2.5.1	600/1000V PVC insulated conductors drawn into conduit or installed in wiring channel including conductor identification labels, terminating, etc. 2.5 mm ²	Supply Install	m m	90% Electrical cables	RATE ONLY		
6	3	2	2.5.2	4.0 mm ²	Supply Install	m m	90% Electrical cables	RATE ONLY		
6	3	2	2.6	Insulated earth conductors						
6	3	2	2.6.1	Earth conductors drawn into conduit or installed in wiring channel including conductor identification labels, terminating, etc. 2.5 mm ²	Supply Install	m m	90% Electrical cables	RATE ONLY		
6	3	2	2.7	Bare copper earth conductors						

6	3	2	Earth conductors drawn into conduit or installed in wiring channel including conductor identification labels, terminating, etc.							
6	3	2.7.1	2.5 mm ²	Supply	m	90% Electrical cables	RATE ONLY			
				Install	m					
6	3	2.7.2	4.0 mm ²	Supply	m	90% Electrical cables	RATE ONLY			
				Install	m					
6	3	2.8	Socket outlets							
6	3	2	Socket outlet complete with all necessary chrome fixing screws, steel cover plates, labeling, cradles, including all holes, drilling, etc							
6	3	2.8.1	16A, 230V, 3-pin single switched socket outlet, 2-pin slimline switched socket outlet, flush wall mounted	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.8.2	16A, 230V, 3-pin double switched socket outlet, wall mounted	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.8.3	16A, 230V, 3-pin dedicated single switched socket outlet with shaved earth pin, 2-pin slimline socket outlet, wall mounted	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.8.4	16A, Wireless service outlet point	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.9	Isolators							
			Isolator complete with box, cover plate and accessories.							
6	3	2.9.1	20A DP Single phase isolator, flush mounted	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.9.2	20A DP Single phase isolator, surface mounted	Supply	No.	N/A	RATE ONLY			
				Install	No.					
6	3	2.9.3	20A DP Single phase isolator, surface mounted, weatherproof, IP56	Supply	No.	N/A	RATE ONLY			
				Install	No.					
Carried forward to next page										
PAGE NO	SEC NO	BILL NO	Item Description		Unit		Qty	Rate	Amount	
Brought forward from previous page										
7	3	2.10	Light switches							
7	3	2	Light switch complete with all necessary chrome fixing screws, steel cover plates, labeling, cradles, including all holes,drilling, etc inclusive of termination of circuit wiring onto switch terminals.							
7	3	2.10.1	16A, 230V, 1 Lever 1 Way	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.10.2	16A, 230V, 1 Lever 2 Way	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.11	Photocell							
7	3	2	Photocell installed in a suitably sized rectangular bulkhead luminaire housing with clear UV stabilised high impact acrylic lens and labelling as specified							
7	3	2.11.1	16A, 230V, Photocell	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.12	Occupancy Sensors							
7	3	2	Ceiling/concrete slab mounted occupancy sensors for lighting control							
7	3	2.12.1	10A, 250V, Passive 360° occupancy sensor	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.13	Light fittings							
7	3	2	SABS approved light fittings as per the specification, complete with lamps,machine or wood screws, bolts, installed and connected as specified. All fittings shall be similar or equal to (and subject to approval) the light fittings specified in the schedule of light fittings.							
7	3	2	Please note that all ceiling mounted light fittings shall be delivered with 3m of 1,5mm ² flexible cable with a 5 amp 3 pin plug top fitted.							
7	3	2.13.1	Type B5: Surface mounted emergency exit light c/w 2 x 9W T5 lamps, 110 lumens per lamp with running pictogram, directional arrows, electronic control gear, 3m x 1.5mm ² 3Core Flex Cable, 5A Unswitched Socket Outlet, Plug Top and self contained one hour battery backup.	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.13.2	Type C1- 53W LED recessed panel fitting	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.13.3	Type A1- 36W LED recessed panel fitting	Supply	No.	N/A	RATE ONLY			
				Install	No.					
7	3	2.13.4	Type E1: Round bulkhead light fitting with unbreakable polycarbonate diffuser c/w 20W LED lamp, 2 000 lumens, IP65 and electronic control gear.	Supply	No.	N/A	RATE ONLY			
				Install	No.					
Carried forward to next page										
PAGE NO	SEC NO	BILL NO	Item Description		Unit		Qty	Rate	Amount	
Brought forward from previous page										
8	3	2.14	Telecommunications distribution board							
8	3	2	Flush mounted distribution board, lockable, complete with 20mm thick wooden back board							
8	3	2.14.1	300 x 300 x 150mm deep	Supply	No.	N/A	RATE ONLY			
				Install	No.					
8	3	2.15	Telecommunications outlets							
8	3	2	Galvanised steel epoxy powder coated cradles and covers mounted on power skirting or wall complete with removable blank inserts.							
8	3	2.15.1	RI45 socket outlet - Wall Mounted	Supply	No.	100% Steel Product	RATE ONLY			
				Install	No.					
8	3	2.16	Television outlets							
8	3	2.16.1	Galvanised steel epoxy powder coated cradles and covers complete with removable blank inserts as specified.							
				Supply	No.	100% Steel Product	RATE ONLY			
				Install	No.					
8	3	2.17	Testing and commissioning							
8	3	2.17.1	Testing and commissioning of the works covered within this bill.		Item	N/A	RATE ONLY			
Carried forward to next page										
PAGE NO	SEC NO	BILL NO	Item Description		Unit		Qty	Rate	Amount	
Brought forward from previous page										
9	3	2.18	Earthing and lightning protection system installations							
9	3	2	Allowance should be made for the following electrical equipment.							
			70mm ² PVC stranded copper conductor 600V/1000V grade drawn in conduit-down conductors shall be bonded to steel roof with M6 20mm long brass bolts, nuts and washers. Copper conductor shall be equipped with hexagon criped lig for bonding/termination.							
9	3	2	70mm ² bare stranded copper conductor laid in trench for the creation of ring earth electrode in trench, 800mm below ground.							
9	3	2	8mm diameter solid aluminium round conductor surface mounted on aluminium guides							

PAGE NO	SEC NO	BILL NO	Item	Description	Unit	Qty	Rate	Amount
9	3	2		Joint between dissimilar materials to be done by crimping lugs on the two types of materials and bond the lugs with M6 20mm long brass bolts, nuts and washers.				
9	3	2		Earth electrodes to be extensible copper clad steel rods 12mm diameter and 1500mm long driven into the ground to a depth of not less than 600mm below finished ground level.				
9	3	2		Bonding between stranded copper conductors and earth electrodes to be done by CAD weld method. Bonding to steel reinforcing to be done with a U clamp, the copper conductor to be equipped with a lug.				
9	3	2		Test points to be created between down conductors and earth electrode conductors equipped with lugs and bonded with M6 20mm long brass bolts, nuts and washers.				
9	3	2		Site survey to be done prior to the installation and the soil resistivity shall be measured, the prevailing site conditions checked and a proposal submitted to the Engineer regarding the type of earthing.				
9	3	2		Draw boxes, conduits equipped with draw wire placed in position for casting into concrete or screed, for building in or chased into concrete or brickwork and for surface mounted in ceiling voids including bending, threading, jointing, short lengths, draw boxes, couplings, bends, tees and saddles, etc. as specified.				
9	3	2	2.18.1	Conduct soil resistivity tests and submit results	Item	N/A	RATE ONLY	
9	3	2	2.18.2	32mm diameter PVC conduit built into brickwork/ installed in ground	Supply Install	m m	100% PVC Products	RATE ONLY
9	3	2	2.18.3	70mm ² PVC insulated copper down conductor	Supply Install	m m	90% Electrical cables	RATE ONLY
9	3	2	2.18.4	70mm ² bare stranded copper conductor installed in ground	Supply Install	m m	90% Electrical cables	RATE ONLY
				Carried forward to next page				
				Brought forward from previous page				
10	3	2	2.18.5	Test points between down conductor and earth electrode conductor installed complete with lugs, bolts, nuts and washers as specified.	Supply Install	No. No.	N/A	RATE ONLY
10	3	2	2.18.6	Bonding of down conductors to roof sheetings installed complete with lugs, bolts, nuts and washers as specified.	Supply Install	No. No.	N/A	RATE ONLY
10	3	2	2.18.7	Bonding of earth electrode conductors to earth electrodes installed complete with CAD weld, lugs, bolts, nuts and washers as specified.	Supply Install	No. No.	N/A	RATE ONLY
10	3	2	2.18.8	12mm diameter 1500mm long extensible earth electrode complete installed 600mm below finished ground level	Supply Install	No. No.	90% Electrical cables	RATE ONLY
10	3	2	2.18.9	25mm x 3mm copper tape	Supply Install	m m	90% Electrical cables	RATE ONLY
10	3	2	2.18.10	8mm ² solid aluminium conductor	Supply Install	m m	90% Electrical cables	RATE ONLY
10	3	2	2.18.11	Air discharge copper conductor	Supply Install	No. No.	90% Electrical cables	RATE ONLY
10	3	2	2.18.12	Connection/test terminal on column inclusive of termination materials	Supply Install	No. No.	N/A	RATE ONLY
10	3	2	2.18.13	Allow for any other cost you may deem necessary to complete the installation of the lightning protection system.	Item	N/A	RATE ONLY	
10	3	2	2.18.14	Testing and Commissioning	Sum	N/A	RATE ONLY	
10	3	2	2.18.15	Issue earth resistance test certificate	Sum	N/A	RATE ONLY	
								Amount
11	3	1		1 BILL 1: RETICULATION AND DISTRIBUTION BOARDS				0
11	3	2		2 BILL 2: BUILDING BLOCKS - ELECTRICAL INSTALLATIONS				0
				FINAL SUMMARY: BUILDING WORKS (EXCLUDING VAT)				0

PAGE NO	SEC NO	BILL NO	Item	Description	Unit	LOCAL CONTENT THRESHOLD	Qty	Rate	Amount
1	4	1		BILL 1 - HOT AND COLD WATER INSTALLATION					
1	4	1		ITEMS IN RED WERE ADDED AFTER TENDER FOR FULL FUNCTIONALITY					
1	4	1		All rates supplied in this bill of quantities will be deemed to include scaffolding to any height and fixing of cold and hot water pipes up to and including roof height.					
1	4	1		All pipes shall be deemed to include in the rates all necessary hanger brackets, threaded rod (irrespective of the suspension length), nuts, washers, anchors and drilling of holes in the concrete slab.					
1	4	1	1	Cold and Hot Water Piping					
				Supply, deliver, install and pressure test of copper Class 0 SANS 460 piping c/w consumables,					
1	4	1	1.1	supports, hangers, anchors, etc					
1	4	1	1,1,1	Dia. 15mm pipe	m	N/A		RATE ONLY	
1	4	1	1,1,2	Dia. 22mm pipe	m	N/A		RATE ONLY	
1	4	1	1.2	Supply, deliver, install and pressure test of HDPE piping c/w consumables, fittings and supports					
1	4	1	1.2.1	Dia. 75mm pipe	m	100% HDPE		RATE ONLY	
1	4	1		Carry forward to next page					
				Carried forward from the previous page					
1	4	1	2	Isolating Valves					
1	4	1	2.1	Dia. 15mm	No	70% Gate valve		RATE ONLY	
1	4	1	2.2	Dia. 22mm	No	70% Gate valve		RATE ONLY	
1	4	1	3	Non-Return Valves					
1	4	1	3.1	Dia.75mm	No	70% PRV		RATE ONLY	
1	4	1	4	Pressure Reducing Valve (Adjustable)					
1	4	1	4.1	Dia. 75mm, with gauge	No	70% PRV		RATE ONLY	
1	4	1	5	Extra over copper pipework as follows:					
1	4	1	5.1	Tee's					
1	4	1	5,1,1	Dia. 15mm Equal Tee	No	N/A		RATE ONLY	
1	4	1	5,1,2	Dia. 22mm Equal Tee	No	N/A		RATE ONLY	
1	4	1	6	Elbows					
1	4	1	6,1,1	Dia. 15mm 90° elbow	No	N/A		RATE ONLY	
1	4	1	6,1,2	Dia. 22mm 90° elbow	No	N/A		RATE ONLY	
1	4	1	7	Testing and commissioning of the entire system					
1	4	1	7	Allow for submission of workshop drawings, technical data sheets and as-built drawings for approval	Sum	N/A		RATE ONLY	
1	4	1	8	approval	Sum	N/A		RATE ONLY	
				Carry forward to summary					

PAGE NO	SEC NO	BILL NO	Item Description	Unit	LOCAL CONTENT THRESHOLD	Qty	Rate	Amount
			BILL 2 - FIRE PROTECTION					
			Tenderers are referred to the specification and drawings numbered annexed to these bills of quantities for the mechanical work, for the full descriptions of the following items which are to be read and priced in conjunction with the said specification and drawings. All Fire Protection					
1	4	2	Equipment, including portable extinguishers, hose reels, hydrants and complianse to SANS 10400					
1	4	2	Fire Protection Services shall be as per relevant specifications, schedules, scope of works, drawings and technical information.					
1	4	2	Fire Protection equipment offered shall generally be of a good quality standard and shall be approved.					
1	4	2	The engineer and/or Client will authorize the installation as well as ordering equipment by way of signing off each pre-defined building area's audit and scope of work report					
1	4	2	Fire Fighting Equipment					
			Supply, deliver and install the following					
			Fire extinguisher	No.	N/A		RATE ONLY	
1	4	2	1.4 5kg DCP with backing boards	No.	100% Steel Products		RATE ONLY	
1	4	2	3.2 Photoluminescent signage	Sum				
			Fire hose reels					
1	4	2	3.3 25mm x 30mL fire hose reels	No.	N/A		RATE ONLY	
1	4	2	3.4 Photoluminescent signage	Sum	100% Steel Products		RATE ONLY	
			Fire hydrant					
1	4	2	3.5 65mm fire hydrant complete with boosters and valves	No.	Fire Hydrants		RATE ONLY	
1	4	2	3.6 Photoluminescent signage	Sum	100% Steel Products		RATE ONLY	
			Piping					
			Supply, deliver and install pipework complete with supports and accessories:					
			Medium grade, seamless galvanised mild steel					
1	4	2	4.1 25mm dia piping including painting	m	100% Steel Products		RATE ONLY	
1	4	2	4.2 65mm dia piping including painting	m	100% Steel Products		RATE ONLY	
			HDPE class 16					
1	4	2	4.3 110mm dia piping	m	100% HDPE		RATE ONLY	
			Carry forward to next page					
			Carried forward from the previous page					
2	4	2	5 Extra over pipework as follows:					
			90 Degree Bends					
2	4	2	5.1 15mm dia galvanised	No.	100% Steel Products		RATE ONLY	
2	4	2	5.2 65mm dia galvanised	No.	100% Steel Products		RATE ONLY	
2	4	2	5.3 25mm dia HDPE	No.	100% HDPE		RATE ONLY	
2	4	2	5.4 75mm dia HDPE	No.	100% HDPE		RATE ONLY	
			Reducers					
2	4	2	5.5 75mm to 65mm dia	No.	100% Steel Products		RATE ONLY	
2	4	2	5.6 110mm to 25mm dia HDPE	No.	100% HDPE		RATE ONLY	
2	4	2	5.7 110mm to 75mm dia HDPE	No.	100% HDPE		RATE ONLY	
			Tees					
2	4	2	5.8 110x110x110mm dia HDPE	No.	100% HDPE		RATE ONLY	
2	4	2	5.9 110x110x75mm dia HDPE	No.	100% HDPE		RATE ONLY	
2	4	2	5.1 110x110x50mm dia HDPE	No.	100% HDPE		RATE ONLY	
			Valves					
2	4	2	6 Supply, deliver and install the following complete:					
			110mm dia isolation valves	No.	70% Gate valve		RATE ONLY	
2	4	2	6.1 110mm dia isolation valves	No.	70% Gate valve		RATE ONLY	
2	4	2	6.2 65mm dia isolation valves	No.	70% Gate valve		RATE ONLY	
2	4	2	6.3 25mm dia isolation valves	No.	70% Gate valve		RATE ONLY	
2	4	2	6.4 110mm non-return valves	No.	70% PRV		RATE ONLY	
2	4	2	6.5 110mm strainers	No.	70% PRV		RATE ONLY	
2	4	2	6.6 110mm adjustable pressure reducing valve	No.	70% PRV		RATE ONLY	
			Fire alarm and suppression system					
2	4	2	7 Fire alarm and suppression system	Sum	N/A		RATE ONLY	
2	4	2	8 Fire Detection	Sum	N/A		RATE ONLY	
			150 x 150mm hef F13 /F14 /F15 /F16 /F17 /F18 /F19 /F20 /F21 /F31 /F27 /E1 /E2 /E3 /E6 /E10 /E29 /F47 /F41 anodised aluminiumplate with fire ext.					
2	4	2	9 fire alarms, fire extinguisher, fire hose reel or fire hydrant symbols	Sum	100% Steel Products		RATE ONLY	
			Allow for trenching 1m deep by 500mm wide for fire connection points to ring main piping					
2	4	2	10 Allow for trenching 1m deep by 500mm wide for fire connection points to ring main piping	m	N/A		RATE ONLY	
			Fire doors					
2	4	2	11 Supply, deliver and install the following complete:					
			Class A fire doors, 60min fire rating with weaether seal and self-closing, single	No.	N/A		RATE ONLY	
			Allow for submission of workshop drawings, technical data sheets and as-built drawings for approval					
2	4	2	12 Allow for submission of workshop drawings, technical data sheets and as-built drawings for approval	Sum	N/A		RATE ONLY	
			Carry forward to summary					

PAGE NO	SEC NO	BILL NO	Item	Description	Unit	LOCAL CONTENT THRESHOLD	Qty	Rate	Amount
				BILL 3 - BUILDING DRAINAGE RETICULATION					
				All pipes shall be deemed to include in the rates all necessary adaptors, couplers, brackets, reducers, expansion sockets, couplings necessary in joining of pipes and drilling of holes in the concrete slab and walls.					
1	4	3							
1	4	3	1	Piping Supply, deliver and install soil and waste drainage piping, PVC pipe fixed vertically or horizontally on any structure i.e concrete or brick walls etc.					
1	4	3	1.1	50mm PVC SV SABS pipes	m	100% PVC Products		RATE ONLY	
1	4	3	1.2	110mm PVC SV SABS pipe	m	100% PVC Products		RATE ONLY	
1	4	3	2	Extra over pipework Supply, deliver and install soil and waste pipe fittings, junctions, bends, etc complete with rodding eye, pan connectors, branches, etc.					
1	4	3	2.1	110mmx45° PVC UG L/Hand IE junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	110mmx45° PVC UG plain bend	No	100% PVC Products		RATE ONLY	
1	4	3	2.3	110mmx45° R/Hand IE junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.4	110mmx45° ABC PVC UG IE end (RE)	No	100% PVC Products		RATE ONLY	
1	4	3	2.5	110mm PVC P trap gully + overflow	No	100% PVC Products		RATE ONLY	
1	4	3	2.6	Dish gully tops	No	100% PVC Products		RATE ONLY	
1	4	3	2.7	110mm PVC UG gully hopper heads	No	100% PVC Products		RATE ONLY	
1	4	3	2.8	50mmx45° PVC SV IE bends	No	100% PVC Products		RATE ONLY	
1	4	3	2.9	110mmx90° PVC UP plain bend	No	100% PVC Products		RATE ONLY	
1	4	3	2.1	110mmx90° PVC SV IE bend	No	100% PVC Products		RATE ONLY	
1	4	3	2.1	110mmx110mm PVC SV IE junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.1	110mm 2 way vent valve	No	100% PVC Products		RATE ONLY	
1	4	3	2.1	110mmx50mm PVC SV horn bend	No	100% PVC Products		RATE ONLY	
1	4	3	2.1	50mm 2 way vent valves	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	110mmx45° PVC UG plain junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	50mmx90° PVC SV plain junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	50mmx90° PVC SV plain bends	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	50mmx90° PVC SV IE bends	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	50mmx90° PVC SV IE junction	No	100% PVC Products		RATE ONLY	
1	4	3	2.2	600mmx600mm concrete surrounds frames & cover (heavy duty)	No	100% Cement		RATE ONLY	
1	4	3	2.2	Manholes, 1200mmLx 750mmWx1000mmDepth	No	100% Cement		RATE ONLY	
1	4	3		Pressure testing of entire piping system in accordance with the requirements as set out in 10252-2. All pipes need to be pressure tested, documented and signed-off by main contractor, quality assurance offices, project engineer, etc	Sum	N/A		RATE ONLY	
1	4	3	4	Allow for submission of workshop drawings, technical data sheets and as-built drawings for approval	Sum	N/A		RATE ONLY	
				Carry forward to summary					

PAGE NO	SEC NO	Bill No	Description	Amount
1	3	1	BILL 1 - HOT AND COLD WATER INSTALLATION	
1	3	2	BILL 2 - FIRE PROTECTION	
1	3	3	BILL 3 - BUILDING DRAINAGE RETICULATION	
			Total excluding VAT	

TOTAL AMOUNT CARRIED TO FINAL SUMMARY

PAGE NO	SEC NO	BILL NO	ITEM NO	DESCRIPTION	UNIT	LOCAL CONTENT THRESHOLD	QUANTITY	RATE	AMOUNT
1	5	1		SECTION NO. 5	H2				
1	5	1		BILL NO. 1	H2				
1	5	1		PROVISIONAL SUMS	H2				
1	5	1		The Tenderer is referred to the relevant Clauses in the separate document Model Preambles for Trades (2008 Edition)	H2				
1	5	1		Under no circumstances may any Provisional Sum or P.C Item be altered.					
1	5	1		Unless a specific percentage mark up for attendance is indicated in the rate column, the amounts priced by the contractor for attendance against each Provisional Sum shall be deemed to be Lump Sum and shall not be adjusted unless the scope of the sub-contract varies significantly.					
1	5	1		Provisional Sums contained herein may be omitted or reduced at the employer's sole discretion and the contractor shall not be entitled to claim for any loss by way of reductions or omissions of any discount, or percentage relating to the Provisional Sums or P.C Amounts or any loss of profit related thereto.					
1	5	1		BUDGETARY ALLOWANCES : SUNDRY BUILDERS WORK ITEMS NOT MEASURABLE OR IDENTIFIABLE AT TENDER STAGE	H2				
1	5	1	1	Allow a sum of R126 500.00 for builderswork in connection with services	Item	N/A	1	126500	126500
1	5	1		ALLOW THE FOLLOWING PROVISIONAL SUMS	H2				
1	5	1		HVAC INSTALLATION	H3				
1	5	1	2	Provide the amount of R60 000.00 for Heat Pump Split Units installed complete.	Item	N/A	1	60000	60000
1	5	1	3	Profit on above item.	%IT	N/A			0
1	5	1	4	Attendance on ditto.	%IT	N/A			0
1	5	1		SANITARY FITTINGS	H3				
1	5	1	5	Provide the amount of R150 000.00 for Sanitary fittings installed complete.	Item	N/A	1	150000	150000
1	5	1	6	Profit on above item.	%IT	N/A			0
1	5	1	7	Attendance on ditto.	%IT	N/A			0
1	5	1		JOINERY FITTINGS	H3				
1	5	1	8	Provide the amount of R88 800.00 for Joinery fittings installed complete.	Item	N/A	1	88800	88800
1	5	1	9	Profit on above item.	%IT	N/A			0
1	5	1	10	Attendance on ditto.	%IT	N/A			0
1	5	1		EXTERNAL CIVIL SERVICES INSTALLATION	H3				
1	5	1	11	Provide the amount of R910 000.00 for External Civil Services complete.	Item	N/A	1	910000	910000
1	5	1	12	Profit on above item.	%IT	N/A			0
1	5	1	13	Attendance on ditto.	%IT	N/A			0
1	5	1		PERIMETER WALLING & FENCING	H3				
1	5	1	14	Provide the amount of R420 000.00 for Perimeter walling and fencing complete.	Item	100% Steel Product	1	420000	420000
1	5	1	15	Profit on above item.	%IT	N/A			0
1	5	1	16	Attendance on ditto.	%IT	N/A			0
1	5	1		DIRECTIONAL SIGNAGE	H3				
1	5	1	17	Provide the amount of R150 000.00 for Directional Signage complete.	Item	100% Steel Product	1	150000	150000
1	5	1	18	Profit on above item.	%IT	N/A			0
1	5	1	19	Attendance on ditto.	%IT	N/A			0
1	5	1		APPOINTMENT OF CONSULTANTS	H3				
1	5	1	20	Allow a provisional amount of R900 000.00 for the appointment of consultants i.e. Architect, Civil&Structural Engineer, Electrical& Mechanical Engineer and Health&Safety Consultants. Consultants must be professionally registered with their relevant professional bodies e.g ECSA, SACPCMP, SACAP. Consultants must also have a professional indemnity insurance of R1m per consultant. Professional fees will be adjusted at R225 000.00 per consultant.	Sum		1	900000	900000
1	5	1	21	Profit on above item.	%IT				0
1	5	1	22	Attendance on ditto.	%IT				0
1	5	1		TOTAL PROVISIONAL SUMS	%IT				0
1	5			FINAL SUMMARY					
1	5		1	PRELIMINARIES					0
1	5		2	BUILDING WORK (TOTAL)					0
				MAIN BUILDING					0
1	5		3	ELECTRICAL & MECHANICAL ENGINEER				RATE PER HOUR	0
1	5		4	CIVIL & STRUCTURAL ENGINEER				RATE PER HOUR	0
1	5		5	ARCHITECT				RATE PER HOUR	0
			6	HEALTH & SAFETY CONSULTANT				RATE PER HOUR	0
1	5			Sub-Total					0
2	5			Contingency @7.5%					0
2	5			SUBTOTAL	ST				0
2	5			Value Added Tax (15%)	TAX		0.15		0
2	5			Total carried to form of tender	ST				0