

Item No		Quantity	Amount
	<p><u>SECTION 1</u></p> <p><u>BILL NO.1</u></p> <p><u>PRELIMINARIES</u></p> <p><u>BUILDING AGREEMENT AND PRELIMINARIES</u></p> <p>The JBCC Series 2000 Edition 4.1 Code 2101 March 2005 edition prepared by the Joint Building Contracts Committee, shall be the agreement, amended as hereinafter described</p> <p>The Preliminaries for use with the JBCC Series 2000 Principal Building Agreement (May 2005 edition) prepared by the Joint Building Contracts Committee, shall be deemed to be incorporated in these bills of quantities</p> <p>Contractors are referred to the above-mentioned documents for the full intent and meaning of each clause thereof</p> <p>These clauses are hereinafter referred to by clause number and heading only. Where standard clauses or alternatives are not entirely applicable to this contract, such modifications, corrections or supplements as will apply are given under each relevant clause heading and such modifications, corrections or supplements shall take precedence notwithstanding anything to the contrary contained in the above-mentioned documents</p> <p>Where any item is not relevant to this specific contract such item is marked N/A signifying "not applicable"</p> <p>Notwithstanding anything to the contrary contained in any of the contract documents including the Principal Building Agreement and the Preliminaries, the provision of the "Preliminaries" as hereinafter set forth shall prevail and shall take precedence</p> <p><u>PREAMBLES FOR TRADES</u></p> <p>The Model Preambles for Trades (1999 edition) as published by the Association of South African Quantity Surveyors shall be deemed to be incorporated in these bills of quantities and no claims arising from brevity of description of items fully described in the said Model Preambles for Trades will be entertained</p> <p>Supplementary preambles to the Model Preambles covering clauses of a general nature, clauses pertaining specific materials and amendments to clauses of the Model Preambles are incorporated in these bills of quantities to satisfy the requirements of this project</p>		
	Carried Forward	R	
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<p style="text-align: right;">Brought Forward</p> <p>The contractor's prices for all items throughout these bills of quantities must take account of and include for all of the obligations, requirements and specifications given in the Model Preambles and in any supplementary preambles</p> <p><u>GENERAL</u></p> <p>If Alternative A as set out in clause B10.3 hereinafter is to be used for the adjustment of preliminaries then each item priced is to be allocated to one or more of the three categories, "F", "T", or "V" as the case may be below such item, where "F" denotes a fixed amount (amount not to be varied), "T" denotes an amount variable in proportion to time and "V" denotes an amount variable in proportion to value</p> <p><u>SECTION A: PRINCIPAL BUILDING AGREEMENT</u></p> <p>Definitions (A1)</p> <p>1 Definitions and interpretation (clause 1)</p> <p>F:..... V:..... T:.....</p> <p>Objective and Preparation (A2 to A14)</p> <p>2 Offer, acceptance and performance (clause 2)</p> <p>F:..... V:..... T:.....</p> <p>3 Documents (clause 3)</p> <p>F:..... V:..... T:.....</p> <p>4 Design responsibility (clause 4)</p> <p>F:..... V:..... T:.....</p> <p>5 Employer's agents (clause 5)</p> <p>The principal agent shall monitor and control progress and scheduling - monitor all contract conditions, and coordinate the efforts of the employer's agents, the contractor and subcontractors. The powers conferred on the principal agent in terms of this clause and/or exercising of these powers shall not to be construed as removing or diminishing any of the obligations of the Contractor in terms of the Principal Building Agreement, whether financial, contractual or otherwise, nor shall the exercising of these powers create any privity of contract as between the Employer or his agents on the one part and the Contractor or subcontractors or suppliers on the other part</p>	<p>R</p> <p>Item</p> <p>Item</p> <p>Item</p> <p>Item</p>	
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	Brought Forward	R
	The principal agent reserves the right to attend and participate in all contractor/subcontractor's meetings, to invite other employer's agents to attend such meetings as his discretion and to converse and chair any such meetings to the degree and frequency and comprehensiveness dictated in the opinion of the project manager by the circumstances and exigencies of the construction process	
	F:..... V:..... T:.....	Item
6	Site representative (clause 6)	
	F:..... V:..... T:.....	Item
7	Compliance with regulations (clause 7)	
	F:..... V:..... T:.....	Item
8	Works risk (clause 8)	
	F:..... V:..... T:.....	Item
9	Indemnities (clause 9)	
	F:..... V:..... T:.....	Item
10	Works insurances (clause 10)	
	F:..... V:..... T:.....	Item
11	Liability insurances (clause 11)	
	F:..... V:..... T:.....	Item
12	Effecting insurances (clause 12)	
	F:..... V:..... T:.....	Item
13	No clause (clause 13)	N/A
14	Security (clause 14)	
	F:..... V:..... T:.....	Item
	Carried Forward	R
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		Brought Forward	R
<u>Execution (A15 - A23)</u>			
15	Preparation for and execution of the works (clause 15) F:..... V:..... T:.....		Item
16	Access to the works (clause 16) F:..... V:..... T:.....		Item
17	Contract instructions (clause 17) F:..... V:..... T:.....		Item
18	Setting out of the works (clause 18) The contractor shall notify the principal agent if any encroachments of adjoining foundations, buildings, structures, pavements, boundaries, etc. exist in order that the necessary arrangements may be made for the rectification of any such encroachments F:..... V:..... T:.....		Item
19	Assignment (clause 19) The contractor shall not cede his rights or delegate his obligations in terms of this agreement unless specifically called for by the employer F:..... V:..... T:.....		Item
20	Nominated subcontractors (clause 20) F:..... V:..... T:.....		Item
21	Selected subcontractors (clause 21) Written proof is required from subcontract tenderers at tendering that they can meet the JBCC Selected Subcontract Agreement or other tender agreements and provide security in terms of the agreement. If the above is not provided the tender may not be accepted. All amounts allowed under Provisional Amounts are intended to be awarded to Selected Subcontractors F:..... V:..... T:.....		Item
22	Employer's Direct Contractors (clause 22)		
		Carried Forward	R
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		Brought Forward	R
	F:..... V:..... T:.....		Item
23	Contractor's Domestic Sub-contractors (Clause 23)		
	F:..... V:..... T:.....		Item
	<u>Completion (A24-A30)</u>		
24	Practical completion (clause 24)		
	F:..... V:..... T:.....		Item
25	Works completion (clause 25)		
	F:..... V:..... T:.....		Item
26	Final completion (clause 26)		
	F:..... V:..... T:.....		Item
27	Latent defects liability period (clause 27)		
	F:..... V:..... T:.....		Item
28	Sectional completion (clause 28)		
	F:..... V:..... T:.....		Item
29	Revision of date of practical completion (clause 29)		
	The removal and replacement of materials and/or workmanship that do not conform to specification or drawings shall not constitute grounds for an extension of the construction period nor for an adjustment to the contract sum (clause 29.3)		
	F:..... V:..... T:.....		Item
30	Penalty for non-completion (clause 30)		
	F:..... V:..... T:.....		Item
	<u>Payment (A31 - A35)</u>		
31	Interim payment to the contractor (clause 31)		
		Carried Forward	R
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		Brought Forward	R
	F:..... V:..... T:.....		Item
32	Adjustment to the contract value (clause 32) Where prices are submitted by the contractor or nominated/selected subcontractors during the progress of the works in respect of contract instructions or in regard to a claim under the terms of the contract and notwithstanding the fact that such prices may be used in an interim payment certificate, there is to be no presumption of acceptance. Should the principal agent wish to accept any such prices prior to the issue of the final certificate, it will be in writing		
	F:..... V:..... T:.....		Item
33	Recovery of expense and loss (clause 33)		
	F:..... V:..... T:.....		Item
34	Final account and final payment (clause 34) The employer shall not pay any interest on amounts payable to the contractor for one hundred and forty two (142) days after the date of issue of the certificate of practical completion The employer shall, however, pay interest to the contractor at the rate stipulated in clause 34.11 on any amounts payable to the contractor more than one hundred and forty two (142) days after the date of issue of the certificate of practical completion but only for such period as the settlement of the final account is delayed by the non-performance of the principal agent or the employer or his agents. In evaluating non-performance for the purpose of this clause a reasonable time shall be allowed to the employer or his agents to respond to any matter brought to his/their attention and which may affect the settlement of the final account		
	F:..... V:..... T:.....		Item
35	Payment to other parties (clause 35)		
	F:..... V:..... T:.....		Item
	<u>Cancellation (A36-A39)</u>		
36	Cancellation by employer - contractor's default (clause 36)		
	F:..... V:..... T:.....		Item
37	Cancellation by employer - loss and damage (clause 37)		
		Carried Forward	R
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		Brought Forward	R
	F:..... V:..... T:.....		Item
38	Cancellation by contractor - employer's default (clause 38)		
	F:..... V:..... T:.....		Item
39	Cancellation - cessation of the works (clause 39)		
	F:..... V:..... T:.....		Item
	<u>Dispute Settlement (A40)</u>		
40	Dispute Settlement (clause 40)		
	F:..... V:..... T:.....		Item
	<u>State Provision (A41)</u>		
41	State clauses (clause 41)		
	Information necessary for the completion of those clauses contained in the schedule which are necessary for tender purposes is given hereunder		
	F:..... V:..... T:.....		Item
	THE SCHEDULE		
	Information necessary for the completion of those clauses contained in the schedule which are necessary for tender purposes is given hereunder		
42	Pre-tender information (clause 42)		
	F:..... V:..... T:.....		Item
		Carried Forward	R
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	Brought Forward	R
42.1 CONTRACTING AND OTHER PARTIES		
42.1.1 Employer: As per information on the tender data		
42.1.2 Principal Agent: As per information on the tender data		
42.1.3 Architect:		
42.1.4: Quantity Surveyor:		
42.1.5: Structural:		
42.1.6 Civil:		
42.1.7 Electrical Engineer:		
42.1.8 Mechanical Engineer:		
42.2 CONTRACT DETAILS		
42.2.1 Works description: Construction of sanitation facilities		
42.2.1 Site description: as per information on the tender data		
42.2.3 Work or installations by direct contractors: N/A		
42.2.4 The agreement is for a government contract where there are specific options that are applicable to a State organ only	Yes	
42.2.5 Date on which possession of the site is intended to be given:	UNKNOWN	
42.2.6 Period for the commencement of the works after the contractor takes possession of the site:		
42.2.7 For the works as a whole intended date of practical completion and the penalty per calendar day 3 months after the contractual commencement date. Penalty Amount: The penalty per calendar day shall be 0.05% of the tendered amount (inclusive of value added tax)		
42.2.8 For the works in sections: intended date of practical completion and the penalty per calendar day. Section 1: N/A Date: N/A Penalty amount: N/A		
42.2.9 The law applicable to this agreement shall be that of South Africa (country)		
	Carried Forward	R
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		Brought Forward	R
42.3	INSURANCES		
42.3.1	Contract works insurance to be effected by: Contractor: For the sum of Contract Amount 20.00% With a deductible of - to be determined by the contractor		
42.3.2	Supplementary insurance is required:	NO	
42.3.3	Public liability insurance to be effected by: Contractor. For the sum of R2 500 000-00. With a deductible of - to be determined by the contractor		
42.4	DOCUMENTS		
42.4.1	Waivers of contractor's lien or right of continuing possession is required:	YES	
42.4.2	Number of construction document copies to be supplied to the contractor free of charge: 3 Number of		
42.4.3	Bills of quantities/Lump sum document schedule of rates drawn up in accordance with: Standard System of Measuring Building Work		
42.4.4	On acceptance of the tender the bills of quantities/lump sum document is to be submitted within working days. The priced bills of quantities must be handed in with the tender		
42.4.5	JBCC Engineering General Conditions are to be included in the contract documents:	NO	
42.4.6	The contract value is to be adjusted using escalation adjustment indices: Yes. Where JBCC CPAP is to be used. Base month: July 2010		
42.4.7	Details of changes made to the provision of JBCC standard documentation:		
		Carried Forward	R
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		Brought Forward	R
<u>SECTION B: PRELIMINARIES</u>			
Definitions and interpretation (B1)			
43	Definition and interpretation (B1.1 - B1.4.6) F:..... V:..... T:.....		Item
Documents (B2)			
44	Checking of documents (B2.1) F:..... V:..... T:.....		Item
45	Provisional bills of quantities (B2.2) F:..... V:..... T:.....		N/A
46	Availability of construction documentation (B2.3) F:..... V:..... T:.....		Item
47	Interests of agents (B2.4) F:..... V:..... T:.....		Item
48	Priced documents (B2.5) F:..... V:..... T:.....		Item
49	Tender submission (B2.6) F:..... V:..... T:.....		Item
The site (B3)			
50	Defined works area (B3.1) F:..... V:..... T:.....		Item
51	Geotechnical investigation (B3.2) F:..... V:..... T:.....		Item
		Carried Forward	R
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		Brought Forward	R	
52	Inspection of the site (B3.3) F:..... V:..... T:.....		Item	
53	Existing premises occupied (B3.4) F:..... V:..... T:.....		Item	
54	Previous work - dimensional accuracy (B3.5) F:..... V:..... T:.....		Item	
55	Previous work - defects (B3.6) F:..... V:..... T:.....		Item	
56	Services - known (B3.7) F:..... V:..... T:.....		Item	
57	Services - unknown (B3.8) F:..... V:..... T:.....		Item	
58	Protection of trees, etc (B3.9) F:..... V:..... T:.....		Item	
59	Articles of value (B3.10) F:..... V:..... T:.....		Item	
60	Inspection of adjoining properties, etc (B3.11) F:..... V:..... T:.....		Item	
	Management of contract (B4)			
61	Management of the works (B4.1) F:..... V:..... T:.....		Item	
62	Programming for the works (B4.2)			
		Carried Forward	R	
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		Brought Forward	R
	F:..... V:..... T:.....		Item
63	Progress meetings (B4.3)		
	F:..... V:..... T:.....		Item
64	Technical meetings (B4.4)		
	F:..... V:..... T:.....		Item
65	Labour and plant records (B4.5)		
	F:..... V:..... T:.....		Item
	Samples, shop drawings and manufacturer's instructions (B5)		
66	Samples of materials (B5.1)		
	F:..... V:..... T:.....		Item
67	Workmanship samples (B5.2)		
	F:..... V:..... T:.....		Item
68	Shop drawings (B5.3)		
	F:..... V:..... T:.....		Item
69	Compliance with manufacturer's instructions (B5.4)		
	F:..... V:..... T:.....		Item
	Temporary works and plant (B6)		
70	Deposits and fees (B6.1)		
	F:..... V:..... T:.....		Item
71	Enclosure of the works (B6.2)		
	F:..... V:..... T:.....		Item
72	Advertising (B6.3)		
		Carried Forward	R
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		Brought Forward	R
	F:..... V:..... T:.....		Item
73	Plant, equipment, sheds and offices (B6.4)		
	F:..... V:..... T:.....		Item
74	Main notice board (B6.5)		
	F:..... V:..... T:.....		Item
75	Subcontractors notice board (B6.6)		
	F:..... V:..... T:.....		Item
	Temporary services (B7)		
76	Location (B7.1)		
	F:..... V:..... T:.....		Item
77	Water (B7.2) Option [A] shall apply		
	F:..... V:..... T:.....		Item
78	Electricity (B7.3) Option [A] shall apply		
	F:..... V:..... T:.....		Item
79	Telecommunication facilities (B7.4)		
	F:..... V:..... T:.....		Item
80	Ablution facilities (B7.5) Option [A] shall apply		
	F:..... V:..... T:.....		Item
	Prime cost amounts (B8)		
81	Responsibility for prime cost amounts (B8.1)		
	F:..... V:..... T:.....		Item
	Attendance on N/S subcontractors (B9)		
		Carried Forward	R
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		Brought Forward	R
82	General attendance (B9.1) F:..... V:..... T:.....		Item
83	Special attendance (B9.2) F:..... V:..... T:.....		Item
84	Commissioning - Fuel, water and power (B9.3) F:..... V:..... T:.....		Item
Financial aspects (B10)			
85	Statutory taxes, duties and levies (B10.1) F:..... V:..... T:.....		Item
86	Payment of preliminaries (B10.2) Option (B) shall apply F:..... V:..... T:.....		Item
87	Adjustment of preliminaries (B10.3) Option (A) shall apply F:..... V:..... T:.....		Item
88	Payment certificate cash flow (B10.4) F:..... V:..... T:.....		Item
General (B11)			
89	Protection of works (B11.1) F:..... V:..... T:.....		Item
90	Protection/isolation of existing/sectionally occupied works(B11.2) F:..... V:..... T:.....		Item
91	Security of the Works (B11.3) F:..... V:..... T:.....		Item
		Carried Forward	R
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		Brought Forward	R
92	Notice before covering work (B11.4) F:..... V:..... T:.....		Item
93	Disturbance (B11.5) F:..... V:..... T:.....		Item
94	Environmental disturbance (B11.6) F:..... V:..... T:.....		Item
95	Works cleaning and clearing (B11.7) F:..... V:..... T:.....		Item
96	Vermin (B11.8) F:..... V:..... T:.....		Item
97	Overhand work (B11.9) F:..... V:..... T:.....		Item
98	Instruction manuals and guarantees (B11.10) F:..... V:..... T:.....		Item
99	As built information (B11.11) F:..... V:..... T:.....		Item
100	Tenant installations (B11.12) F:..... V:..... T:.....		Item
Schedule of variables (B12)			
101	Pre-tender information (B12.1) F:..... V:..... T:.....		Item
	12.1.1 Provisional bills of quantities (B12.1.1). The quantities are provisional:	No	
		Carried Forward	R
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	Brought Forward	R
12.1.2 Availability of construction documentation (B2.3): Construction documentation is not complete:	No	
12.1.3 Interest of agents (B2.4)		
12.1.4 Defined works area (B3.1)		
12.1.5 Geotechnical investigation (B3.2) N/A		
12.1.6 Existing premises occupied (B3.4)		
12.1.7 Previous work - Dimensional accuracy (B3.4)		
12.1.8 Previous work - defects (B3.5)		
12.1.8 Services - known (B3.70)		
12.1.10 Protection of trees (B3.9) All trees should be protected and only on instruction of the Principal Agent may any trees be removed		
12.1.11 Inspection of adjoining properties (B3.11)		
12.1.12 Enclosure of the works (B6.2)		
12.1.13 Offices B6.4.3). An office for the clerk of works should be provided		
12.1.14 Main notice board (B6.5). YES		
12.1.15 Subcontractors' notice board (B6.6). A notice board is required. No		
12.1.16 Water (B7.2). Alternative Selected: A		
12.1.17 Electricity (B7.3). Alternative selected: A		
12.1.18 Telecommunications (B7.4)		
12.1.19 Ablution facilities (B7.5). Alternative selected: A		
12.1.20 Protection of existing/sectionally occupied works (B11.2)		
12.1.21 Special attendance (B9.2). Subcontractor (1) details: N/A		
12.1.22 Protection of the works (B11.1). N/A		
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R

12.1.23 Disturbance (B11.5). N/A

12.1.24 Environmental disturbance (B11.6). N/A

Post-tender information (B12.2)

12.2.1 Payment of preliminaries. Alternative selected: B

12.2.2 Adjustment of preliminaries. Alternative selected: A

12.2.3 Additional agreed preliminaries items: N/A

SECTION C: SPECIFIC PRELIMINARIES

Any special items to meet the particular circumstances of a specific project are embodied in this section. Where required for an aspect of the works to be executed according to the design by a consulting engineer, a recital of the headings to the individual clauses of the JBCC Engineering General Conditions are included

102 Site instructions

Instructions issued on site are to be recorded in triplicate in a site instruction book which is to be maintained on site by the contractor

F:..... V:..... T:.....

Item

103 Black economic empowerment and training

F:..... V:..... T:.....

Item

104 Proprietary branded products

The contractor shall take delivery of, handle, store, use, apply and/or fix all proprietary branded products in strict accordance with the manufacturers' instructions after consultation with the manufacturer's authorised representative

F:..... V:..... T:.....

Item

105 Testing of flat roof waterproofing for watertightness

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Flat roof waterproof areas shall be prepared with small sand dykes around them of a size and enclosing an area approved by the principal agent, flooded with water and kept "ponded" for at least 36 hours as a test to ensure the watertightness of the waterproofing and before any further construction work is carried out above the waterproofing

F:..... V:..... T:.....

Item

106 Contract instructions

Contract instructions issued on site are to be recorded in triplicate in a site instruction book which is to be maintained on site by the contractor

F:..... V:..... T:.....

Item

107 Labour record

At the end of each week the contractor shall provide the principal agent with a written record, in schedule form, reflecting the number and descriptions of tradesmen and labourers employed by him and all subcontractors on the works each day of that week

F:..... V:..... T:.....

Item

108 Plant record

At the end of each calendar week the contractor shall provide the principal agent with a written record, in schedule form, reflecting the number, type and capacity of all plant, excluding hand tools, currently used on the works each day of that week

F:..... V:..... T:.....

Item

109 Guarantees

Where guarantees are called for, the contractor shall obtain a written guarantee, addressed to the employer, from the firm supplying the materials and/or doing the work and shall deliver same to the principal agent on the certified completion of the contract. The guarantee shall state that workmanship, materials and installation are guaranteed for a specified period from the date of final completion and that any defects that may arise during the specified period shall be made good at the expense of the firm supplying the materials and/or doing the work, upon written notice to do so. This guarantee will not be enforced if the work is damaged by defects in the construction of the building in which case the responsibility for replacement shall rest entirely with the contractor. The principal agent shall be the sole judge of the cause responsible for defects in the work and his decision shall be final and binding in terms of clause 40.2 of the agreement

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F:..... V:..... T:.....

Item

110 Overtime

Should overtime be required to be worked for any reason whatsoever, the costs of such overtime are to be borne by the contractor unless the principal agent has specifically authorized and indicated in writing, prior to the execution thereof, that costs for such overtime will to be borne by the employer

F:..... V:..... T:.....

Item

111 Co-operation of the contractor for cost management

It is specifically agreed that the contractor accepts the obligation of assisting the professional consultants in implementing proper cost management. The contractor will be advised by the principal agent of all cost management procedures which will be implemented to ensure that the final building cost does not exceed the budget. The quantity surveyor undertakes to make available to the contractor all budgetary allowances and cost assessments/reports to enable the proper procedure to be implemented and the contractor will attend all cost plan review and cost management meetings. The contractor undertakes to extend these procedures, as necessary, to all subcontractors

F:..... V:..... T:.....

Item

112 Occupational Health and Safety Specification

Any Principal Contractor entering into a contract with The Developer must achieve an acceptable level of Occupational Health and Safety performance. Refer to "Project Specification" and "Safety, Health and Environmental Evaluation Questionnaire" The contractor to comply with all provisions of the above and to be enforced on all selected and or other sub-contractors, as no claim afterwards will be entertained

F:..... V:..... T:.....

Item

SUMMARY OF CATEGORIES

Category : Fixed R

Category : Value R

Category : Time R

Carried to Final Summary

R

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	<u>BILL NO.1</u>			
	<u>DEMOLITIONS</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>TEMPORARY BARRIERS ,SCREENS, ETC</u>			
	<u>Temporary barriers, screens, etc including removal</u>			
1	Dust screen 2500mm high between concrete floor and suspended ceiling formed of a suitable timber framing and polyethylene stapled on including corners, ends, etc	m	45	
	<u>Taking down and demolishing dilapidated pit toilet structure, etc</u>			
2	Break down and demolish existing building per seat, incl. cutting the foundation wall, strip footings, windows, roof covering, etc, Dislodge, removal of surface beds, backfilling, cart away etc. of all rubble and leaving no visible sign of the building (Enviro Loo Toilet)	No	1	
	Carried Forward to Summary of Section No. 2			R
	Section No. 2 Alterations Bill No. 1 DEMOLITIONS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No	<u>BILL NO.2</u>	Quantity	Rate	Amount
	<u>REFURBISHMENT OF EXISTING ABLUTIONS</u>			
	<u>PREAMBLES</u>			
	For preambles refer to "Department Of Public Works Specification Of Materials And Methods To Be Used - PW371"			
	<u>Taking down and demolishing dilapidated pit toilet structure, etc</u>			
1	demolition existing brick & mortar toilet structures per seat and backfill all pits with soil where applicable	m2	158	
	<u>Taking down and removing roofs, floors, panelling, ceilings, partitions, etc</u>			
2	Steel roof sheeting from timber or steel trusses including ridge, flashings, etc	m2	112	
	<u>Taking out and removing doors, windows, etc from brickwork to be demolished.</u>			
3	813 x 2032 Timber single doors including steel frame from one brickwall and prepare to receive new frame.	No	21	
	<u>Hacking up/off and removing granolithic, screeds, plaster, etc from concrete or brickwork and preparing surfaces for new screeds, plaster, etc</u>			
4	Screed	m2	155	
	<u>ROOF COVERINGS ETC</u>			
	<u>PROFILED METAL SHEETING AND ACCESSORIES</u>			
	<u>4mm "Alucushion Bubblefoil FR" (Code 2906) polyethelene bubblefold aluminium foil faced one side sheeting</u>			
5	Insulation sheeting laid taut over purlins (at approximately 750mm centres) and fixed concurrent with roof covering with minimum 150mm stapled laps including galvanised steel straining wires at not exceeding 400mm centres and double-sided tape at edges where required	m2	68	
	Carried Forward			R
	Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>0.58mm "Kliplock" roof sheeting in chromadek fixed to timber purlins (elsewhere)</u>		
6	Roof covering with pitch not exceeding 50 degrees	m2	68
<u>RAINWATER DISPOSAL</u>			
	<u>0.8mm Thick "Watertite Guttering" ogee seamless aluminium commercial and industrial type prepainted gutters and rainwater pipes</u>		
7	150 x 125mm Roof gutters	m	13
8	Extra over gutter for stopped end	No	4
9	Extra over gutter for angle	No	10
10	Extra over gutter for outlet for 100 x 75mm pipe	No	10
11	100 x 75mm Fluted rainwater pipes	m	10
12	Extra over rainwater pipe for shoe	No	4
13	Extra over rainwater pipe for eaves or plinth offset	No	4
<u>EAVES, VERGES, ETC</u>			
	<u>"Everite FC77" pressed fibre-cement</u>		
14	15 x 250mm Fascias and barge boards including galvanised steel H-profile jointing strips	m	22
<u>DOORS, ETC</u>			
	<u>Wrought meranti doors hung to steel frames</u>		
15	44mm Framed and ledged batten door 914 x 2032mm high of 44 x 100mm top rail and stiles, 22 x 100mm middle and bottom rails, covered on both sides with 6mm plywood with veneer (D3)	No	4
Carried Forward			R
Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

		Brought Forward		R
	<u>Solid core flush doors with concealed hardwood edges and 4mm thick masonite covering on both sides hung to steel frame</u>			
16	40mm Door 813 x 2032mm high	No	9	
	<u>Finishes to ironmongery</u>			
	Where applicable finishes to ironmongery are indicated by suffixes in accordance with the following list: BS Satin bronze lacquered CH Chromium plated SC Satin chromium plated SE Silver enamelled GE Grey enamelled AS Anodised silver AB Anodised bronze AG Anodised gold ABL Anodised black PB Polished brass PL Polished and lacquered PT Epoxy coated SD Sanded			
	<u>CATCHES,CABIN HOOKS, ETC</u>			
	<u>"Solid"</u>			
17	100mm Cabin hook and eye including 70 x 70 x 20mm chamfered hardwood block twice oiled and plugged	No	1	
	<u>LOCKS</u>			
	<u>"Solid"</u>			
18	"Code 630" padlock	No	4	
	<u>"EN-SUIT LOCKS</u>			
	<u>Approved</u>			
19	"Code 460/313" Blesbok four lever lockset	No	4	
20	Master keys	No	1	
	<u>LETTERS, NAME PLATES, ETC</u>			
	<u>150 x 150 x 3mm thick "Union" aluminium standard safety signage</u>			
21	SS5066E-06SSE15 stainless steel pictogram engraved as per architectural specification	No	4	
	Carried Forward			R
	Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>SHE - BINS</u>		
22	SheBins	No	2
	<u>GLAZING TO STEEL WITH PUTTY</u>		
	<u>4mm Clear float glass</u>		
23	Panes exceeding 0,1m2 and not exceeding 0,5m2	m2	2
	<u>TOPS, SHELVES, DOORS, MIRRORS, ETC</u>		
	<u>4 mm Silvered float glass copper backed mirrors with 10 mm bevelled and polished edges holed for and fixed with chromium plated dome capped mirror screws with rubber buffers to plugs in brickwork or concrete</u>		
24	Mirror 400 x 600mm high with four (4) screws	No	1
	<u>"Vaal" or Similar approved</u>		
25	510 x 405mm "Hibiscus" (code 7050)white vitreous rounded lavatory basin with one tap holes fixed to wall with and including two semi - concealed brackets (code 8446Z0)	No	2
26	"Hibiscus" vitreous china close coupled washdown pan (code 752600) complete with double flap heavy duty plastic seat with adjustable hinges and matching 6/3 litre top dual flush cistern (code 710741)	No	4
	<u>TESTING</u>		
27	Testing waste pipe system		Item
	<u>FITTINGS</u>		
28	19mm chrome plated push button taps to wash troughs	No	1
	<u>WASTE UNION ETC</u>		
	<u>"Cobra watertech"</u>		
29	32mm 301CP waste union	No	2
	Carried Forward		R
	Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers		

		Brought Forward		R
<u>TRAPS ETC</u>				
30	32mm Deep seal "P" or "S" trap <u>"Cobra Watertech"</u>	No	2	
31	38mm 365/40 CP Bottle trap	No	2	
<u>TAPS, VALVES, ETC</u>				
32	15mm Stopcock	No	2	
33	15mm Full-way gate valve <u>"Cobra Watertech"</u>	No	2	
34	PA3.522 "Masterflo" pressure control valve with PB1.10 Vacuum breaker.	No	7	
<u>SANITARY PLUMBING</u>				
<u>uPVC pipes</u>				
35	50mm Pipes	m	30	
36	110mm Pipes	m	30	
37	50mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	15	
38	110mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	15	
39	110mm Pipe laid in and including trenches exceeding 1m deep and not exceeding 2m deep.	m	15	
<u>Pre-cast concrete gulleys</u>				
40	110mm Dished gulley not exceeding 1m deep with 150mm steel grate and standard concrete gulley surround	No	1	
<u>Sundries</u>				
41	100mm Cast iron "ABC" cleaning eye	No	5	
		Carried Forward		R
Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers				

Brought Forward			R
42	Precast concrete inspection eye marker slab set in ground	No	5
43	110mm Rodding eye	No	5
	<u>Extra over uPVC pipes for fittings</u>		
44	50mm Bend	No	12
45	50mm Access junction	No	12
46	110mm Pan connector	No	12
47	110mm Bent pan connector	No	4
48	50mm Access bend	No	12
49	110mm Access bend	No	5
50	110mm Two-way vent valve	No	6
	<u>TESTING</u>		
51	Testing waste pipe system		Item
	<u>WATER SUPPLIES</u>		
	<u>Galvanised steel pipes</u>		
52	50mm Pipes	m	30
	<u>Extra over galvanised steel pipes for fittings</u>		
53	50mm Elbow	No	7
54	50mm Reducer	No	7
	<u>Class O copper pipes</u>		
55	15mm Pipes	m	30
56	22mm Pipes	m	30
	Carried Forward		R
Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Extra over class O copper pipes for capillary fittings</u>		
57	15mm Fittings	No	7
58	22mm Fittings	No	7
	<u>Copper overflow and service pipes</u>		
59	15mm Service pipe 450mm girth	No	6
	<u>PREPARATORY WORK TO EXISTING WORK</u>		
	<u>Previously painted plastered surfaces</u>		
	Surfaces shall be thoroughly washed down and allowed to dry completely before any paint is applied. Blistered or peeling paint shall be completely removed and cracks shall be opened, filled with a suitable filler and finished smooth		
	<u>Previously painted metal surfaces</u>		
	Surfaces shall be thoroughly rubbed and cleaned down. Blistered or peeling paint shall be completely removed down to bare metal		
	<u>Previously painted wood surfaces</u>		
	Surfaces shall be thoroughly cleaned down. Blistered or peeling paint shall be completely removed and cracks and crevices shall be primed, filled with suitable filler and finished smooth		
	<u>CEMENT SCREEDS TO CONCRETE</u>		
	<u>Screeds to steel trowelled, on concrete:</u>		
60	30mm Thick on floors	m2	68
	<u>PAINTWORK ETC TO NEW WORK</u>		
	<u>ON INTERNAL FLOATED PLASTER SURFACE</u>		
	<u>One coat sealer/under coat and two coats interior quality "Acrylic PVA" emulsion paint.</u>		
	Carried Forward		
	R		
	Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers		

Brought Forward			R
<u>ON FIBRE-CEMENT</u>			
<u>One coat primer, one coat universal undercoat and two coats super acrylic PVA paint</u>			
61	On fascias and barge boards	m2	7
62	On window sills not exceeding 300 mm girth	m	4
<u>ON METAL</u>			
<u>Spot priming defects in pre primed surfaces, apply one coat primer , one coat under coat and two coats super gloss enamel paint</u>			
63	On door frames	m2	3
64	On windows with burglar bars	m2	4
<u>ON WOOD</u>			
<u>One coat wood primer, one coat universal undercoat and two coats polyurithane high gloss varnish</u>			
65	On doors	m2	4
<u>SUNDRY ITEMS</u>			
<u>Desluge</u>			
66	Cleaning of existing enviroloo tanks	No	8
<u>Windmaster</u>			
67	Louvres	No	8
<u>Chemical Toilets</u>			
68	Provide the amount of R 100,000.00 (One Hundred thousand Rand) for supply of chemical toilets to be structured by the quantity surveyor for the duration of the project and variable to approved revision to the date of practical completion	Item	100 000,00
69	Allow for profit on above if required	Item	
Carried Forward			R
Section No. 2 Alterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

	Brought Forward	Item	R	
70	Allow for attendance			
	Carried Forward to Summary of Section No. 2		R	
	Section No. 2 ALterations Bill No. 2 REFURBISHMENTS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Bill No	SECTION SUMMARY - Alterations	Page No	Amount
1	DEMOLTIONS	20	
2	REFURBISHMENTS	29	
Carried to Final Summary			R
Section No. 2 ALterations Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No	<u>SECTION 3</u>	Quantity	Rate	Amount
	<u>BILL NO.1</u>			
	<u>EARTHWORKS</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>SITE CLEARANCE</u>			
1	Digging up and removing rubbish, debris, vegetation, hedges, shrubs, bush, and trees not exceeding 200mm girth, etc	m2	84	
2	Stripping average 100mm thick layer of top soil and stockpiling on site	m2	37	
	<u>EXCAVATION, FILLING, ETC</u>			
	<u>Excavate in earth not exceeding 2m deep</u>			
3	Trenches	m3	34	
4	For apron thickening	m3	16	
	<u>Extra over trench and hole excavations in earth for excavation:</u>			
5	Soft rock	m3	1	
6	Hard rock	m3	2	
	<u>Extra over all excavations for carting away:</u>			
7	Surplus material from excavations and/or stock piles on site to a dumping site to be allocated by the Contractor	m3	52	
	Carried Forward			R
	Section No. 3 SFD3 Bill No. 1 EARTHWORKS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>Risk of collapse of excavations</u>			
8	Sides of trench and hole excavations not exceeding 1,5m deep	m2	22
<u>Keeping excavations free of water</u>			
9	Keeping excavations free of all water other than subterranean water		Item
<u>Earth filling obtained from the excavations and/or prescribed stock piles on site compacted to 93% Mod. AASHTO density</u>			
10	Under floors, steps, pavings, etc	m3	13
11	Backfilling to trenches, holes, etc	m3	8
<u>Compaction of surfaces</u>			
12	Compaction of ground surface under floors etc including scarifying for a depth of 150mm, breaking down oversize material, adding suitable material where necessary and compacting to 93% Mod AASHTO density	m2	14
13	Compaction of ground surface to aprons etc including scarifying for a depth of 150mm, breaking down oversize material, adding suitable material where necessary and compacting to 93% Mod AASHTO density	m2	21
<u>Prescribed density tests on filling</u>			
14	"Modified AASHTO Density" tests	No	1
<u>SOIL POISONING</u>			
<u>Soil insecticide</u>			
15	Under floors etc including forming and poisoning shallow furrows against foundation walls etc, filling in furrows and ramming	m2	14
16	To bottom of concrete aprons	m2	21
17	To bottoms and sides of trenches etc	m2	33
Carried Forward to Summary of Section No. 3			R
Section No. 3			
SFD3			
Bill No. 1			
EARTHWORKS			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	<u>BILL NO.2</u>	Quantity	Rate	Amount
	<u>CONCRETE, FORMWORK AND REINFORCEMENT</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>REINFORCED CONCRETE, ETC</u>			
	<u>25MPa/19mm concrete</u>			
1	Strip footings	m3	15	
2	Aprons cast in panels	m3	9	
3	Extra over concrete in surface beds for thickening 85mm deep the bottom including all excavation, backfilling etc	m	3	
4	Thickening down apron on edge 110mm deep x 200mm wide	m	25	
	<u>REINFORCED CONCRETE, ETC</u>			
	<u>25MPa/19mm concrete</u>			
5	Surface beds	m3	17	
	<u>CONCRETE SUNDRIES</u>			
	<u>Finishing top surfaces of concrete smooth with a wood float</u>			
6	Aprons and pavings to falls	m2	21	
	<u>TEST CUBES</u>			
7	Allow for preparing a set of three test cubes, each size 150 x 150 x 150mm, sending them to an approved testing laboratory for testing and paying all charges in connection therewith	No	2	
	Carried Forward			R
	Section No. 3 SFD3 Bill No. 2 CONCRETE, FORMWORK AND REINFORCEMENT Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Finishing top surfaces of concrete smooth with a steel trowel</u>		
8	Surface beds, slabs, etc	m2	14
	<u>FORMWORK</u>		
	<u>Rough formwork to sides:</u>		
9	Edges, risers, ends and reveals not exceeding 300mm high or wide	m	25
	<u>REINFORCEMENT</u>		
	<u>High tensile steel reinforcement to structural concrete work</u>		
10	12mm Diameter bars	t	0.540
	<u>Mesh reinforcement (measured nett)</u>		
11	Mesh ref. No. 395 fabric reinforcement fixed horizontal in surface beds	m2	14
Carried Forward to Summary of Section No. 3			R
Section No. 3			
SFD3			
Bill No. 2			
CONCRETE, FORMWORK AND REINFORCEMENT			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	Quantity	Rate	Amount
<p><u>BILL NO. 3</u></p>			
<p><u>BRICKWORK</u></p>			
<p><u>SUPPLEMENTARY PREAMBLES</u></p>			
<p>For preambles see "Specifications of materials and methods to be used - PW371"</p>			
<p><u>BRICKWORK</u></p>			
<p><u>Sizes in descriptions</u></p>			
<p>Where sizes in descriptions are given in brick units, "one brick" shall represent the length and "half brick" the width of a brick</p>			
<p><u>Hollow walls etc</u></p>			
<p>Descriptions of hollow walls shall be deemed to include leaving every fifth perpend of the bottom course of the external skin open as a weep hole</p>			
<p>Walls in two skins described as "bagged and sealed" shall be deemed to include having the outer face of the inner skin bagged with 1:6 cement and sand mixture and sealed with two coats "Brixal" bitumen emulsion waterproofing coating</p>			
<p>User note: The above preamble generally applies for works in hot and humid coastal areas</p>			
<p><u>Face bricks</u></p>			
<p>Bricks shall be ordered timeously to obtain uniformity in size and colour</p>			
<p><u>Pointing</u></p>			
<p>Descriptions of recessed pointing to fair face brickwork and face brickwork shall be deemed to include square recessed, hollow recessed, weathered pointing, etc</p>			
<p>Carried Forward</p>			
<p>Section No. 3 SFD3 Bill No. 3 MASONRY Letlamoreng Primary School Tshashu Consulting and Project Managers</p>		R	

Brought Forward		R
<u>Samples</u>		
Samples of all masonry building units, except for walls described as "load bearing" shall consist of a minimum of 6 units. Samples of building units to be used in walls described as "load bearing" shall consist of 30 units from every 30 000 units delivered to site		
<u>FOUNDATIONS</u>		
<u>Brickwork of NFX bricks (14 MPa nominal compressive strength) in class I mortar</u>		
1	One brick walls	m2 18
<u>FACE BRICKWORK</u>		
<u>Face bricks (purchase price of R5,000.00/1000 delivered to site excluding VAT) pointed with flush horizontal and vertical joints</u>		
2	Extra over brickwork for face brickwork in foundation	m2 9
<u>SUPERSTRUCTURE</u>		
<u>FACE BRICKWORK</u>		
<u>Face bricks (purchase price of R5,000.00/1000 delivered to site excluding VAT) pointed with flush horizontal and vertical joints</u>		
3	Half brickwork for face brick walls pointed on both sides	m2 40
4	One brickwork for face brick walls pointed on both sides	m2 94
5	Extra over brickwork for face brickwork in beamfilling	m2 9
6	Fair raking and cutting	m 8
<u>Brick-on-edge header course copings, sills, etc of face bricks (purchase price of R3,500.00/1000 delivered to site excluding VAT) pointed with recessed joints on all exposed faces</u>		
7	Extra over brickwork for brick-on-edge header course lintels pointed on two sides and 110mm soffit	m 4
Carried Forward		R
Section No. 3 SFD3 Bill No. 3 MASONRY Letlamoreng Primary School Tshashu Consulting and Project Managers		

Brought Forward			R
8	Face brick-on-edge sill 220mm wide pointed on two side and on top and set at an angle	m	4
9	Fair cutting and fitting around pipe not exceeding 100mm diameter	No	8
<u>BRICKWORK SUNDRIES</u>			
<u>Brick reinforcement</u>			
10	75mm Wide reinforcement built in horizontally	m	6
11	150mm Wide reinforcement built in horizontally	m	152
<u>Turning pieces</u>			
12	230mm Wide turning piece to lintels etc	m	4
<u>Galvanised wire ties etc</u>			
13	6mm Diameter roof tie 2m girth bent double with one end fixed to timber and other end built into brickwork	No	10
<u>Ventilation bricks</u>			
14	Set of two 22 x 155mm high terra cotta clay vermin proof air bricks including making good reveals and gauze	No	6
Carried Forward to Summary of Section No. 3			R
Section No. 3			
SFD3			
Bill No. 3			
MASONRY			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	<u>BILL NO. 4</u>	Quantity	Rate	Amount
	<u>WATERPROOFING</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>DAMP-PROOFING OF WALLS AND FLOORS</u>			
	<u>One layer 375 micron embossed damp proof course</u>			
1	In walls	m2	3	
	<u>One layer 250 micron waterproof sheeting and sealed at overlaps with pressure sensitive tape</u>			
2	Under surface beds	m2	14	
	<u>FLOORS AND WALLS SEALERS</u>			
	<u>Secomastic non setting mastic sealant applied cold with a hand pressure caulking gun and leave perfectly watertight:</u>			
3	Around steel windows and door frames	m	26	
	Carried Forward to Summary of Section No. 3			R
	Section No. 3 SFD3 Bill No. 4 WATERPROOFING Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No	<u>BILL NO. 5</u>	Quantity	Rate	Amount
	<u>ROOF COVERINGS</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	NOTE : Unless otherwise stated herein, all items in this bill shall be deemed to fall into Work Group No. 124 for CPAP formula purposes			
	<u>PROFILED METAL SHEETING AND ACCESSORIES</u>			
	<u>0.58mm "Kliplock" roof sheeting in chromadek fixed to timber purlins (elsewhere)</u>			
1	Allow the Provisional Amount of R30 000.00 (Thirty Thousand Rand) for supply and installation of roof sheeting	Item		30 000.00
	<u>Sundries</u>			
2	12" Thermal resistance sisolation laid on purlins	m2	17	
	<u>RAINWATER DISPOSAL</u>			
	<u>Aluzink seamless metal gutters:</u>			
3	100 x 100 x 0.6mm Standard rainwater gutters fixed with gutter brackets	m	5	
4	Extra for closed ends	No	2	
5	75 x 100 x 0.6mm Thick galvanised rainwater downpipes fixed to wall	m	7	
6	Extra over rainwater pipe for eaves offset	No	2	
7	Ditto, for shoe	No	2	
	Carried Forward to Summary of Section No. 3			R
	Section No. 3 SFD3 Bill No. 5 ROOF COVERINGS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No	<u>BILL NO. 6</u>	Quantity	Rate	Amount
	<u>CARPENTRY AND JOINERY</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>ROOFS, ETC</u>			
	The following in pre-fabricated roof trusses manufactured from "CCA Tanalith" pre-treated wrought softwood			
1	Allow the Provisional Amount of R25 000.00 (Twenty five Thousand Rand) for supply and complete installation of roof trusses including all necessary bracing, gangboarding, splayed eaves purlins, wall plates, etc			25 000,00
	<u>Sundries</u>			
2	Two coats creosote on sawn timbers	m2	15	
3	6mm Diameter galvanised wire tie 3000mm girth, wrapped around rafter and purlin with ends tied together	No	15	
4	Hurricane clips	No	10	
	<u>EAVES, VERGES, ETC</u>			
	<u>Pressed fibre-cement</u>			
5	15 x 230mm Fascias and barge boards, including galvanised steel H-profile jointing strips	m	19	
	<u>DOORS, ETC</u>			
	<u>Wrought meranti doors hung to steel frames</u>			
6	44mm Framed batten door 813 x 2032mm high of 44 x 150mm top rail and stiles, 22 x 150mm middle ledge and braces and 22 x 220mm bottom rail, filled in with 22mm V-jointed one side boarding and including weatherboard (D1)	No	2	
	Carried Forward			
	Section No. 3 SFD3 Bill No. 6 CARPENTRY AND JOINERY Letlamoreng Primary School Tshashu Consulting and Project Managers		R	

Brought Forward		R
<u>Wrought meranti doors hung to steel frames</u>		
7	44mm Framed batten door 813 x 2032mm high of 44 x 150mm top rail and stiles, 22 x 150mm middle ledge and braces and 22 x 220mm bottom rail, filled in with 22mm V-jointed one side boarding and including weatherboard (D2)	No 5
<u>Wrought meranti doors hung to steel frames</u>		
8	44mm Framed batten door 915 x 2032mm high of 44 x 150mm top rail and stiles, 22 x 150mm middle ledge and braces and 22 x 220mm bottom rail, filled in with 22mm V-jointed one side boarding and including weatherboard (D3)	No 1
Carried Forward to Summary of Section No. 3		R
Section No. 3		
SFD3		
Bill No. 6		
CARPENTRY AND JOINERY		
Letlamoreng Primary School		
Tshashu Consulting and Project Managers		

Item No		Quantity	Rate	Amount
	<u>BILL NO. 7</u>			
	<u>IRONMONGERY</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>CATCHES, CABIN HOOKS, ETC</u>			
	<u>Approved</u>			
1	150mm Cabin hook and eye including 70 x 70 x 20mm chamfered hardwood block twice oiled and plugged	No	2	
	<u>LOCKS</u>			
	<u>Approved</u>			
2	Four lever mortice lockset	No	5	
	<u>DOORSTOPS</u>			
	<u>Approved</u>			
3	38mm Diameter rubber door stop, plugged	No	5	
	<u>LETTERS, NAME PLATES, ETC</u>			
	<u>Union or similar approved</u>			
4	75 x 150mm Natural anodised plate with male or female symbol	No	2	
	<u>DOOR CLOSERS, ETC</u>			
	<u>"Union"</u>			
5	Union DC 737 ENG-5 SC HO (737SCHO)	No	7	
	<u>BATHROOM FITTINGS</u>			
	Carried Forward			R
	Section No. 3 SFD3 Bill No. 7 IRONMONGERY Letlamoreng Primary School Tshashu Consulting and Project Managers			

		Brought Forward		R
	<u>Kimberley-Clarke or similar</u>			
6	Kimberley-Clarke SQ2 code 405607B white lockable toilet roll holder	No	4	
	<u>SHE Bin</u>			
7	Stainless steel rust resistant she bins	No	4	
	<u>Vaal Paragon or similar</u>			
8	32mm Type 9 back grab rail 800mm long plugged	No	1	
9	32mm Type 8 back grab rail 900mm girth plugged	No	1	
Carried Forward to Summary of Section No. 3				R
Section No. 3				
SFD3				
Bill No. 7				
IRONMONGERY				
Letlamoreng Primary School				
Tshashu Consulting and Project Managers				

Item No		Quantity	Rate	Amount
	<u>BILL NO. 8</u>			
	<u>METALWORK</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>PRESSED STEEL DOOR FRAMES</u>			
	<u>1,6mm Single rebated frames suitable for one brick walls</u>			
1	Frame for door 813 x 2032mm high	No	2	
	<u>1,6mm Single rebated frames suitable for one brick walls</u>			
2	Frame for disabled door 945 x 2032mm high	No	1	
	<u>1,2mm Single rebated frames suitable for one half walls</u>			
3	Frame for door 813 x 2032mm high	No	5	
	<u>STEEL WINDOWS, DOORS, ETC</u>			
4	Window type NE1, 533 x 654mm high including burglar bars	No	5	
5	Window type NE7, 1022 x 654mm high including burglar bars	No	6	
	<u>WELDED SCREENS, GATES, ETC</u>			
	<u>Steel gates and frames</u>			
6	Purpose made square hollow section mild steel security gate, size 813 x 2032mm high	No	2	
	<u>GUARD RAILS</u>			
	<u>Handrails</u>			
7	Handrails as per details	m	8	
8	Junctions	No	5	
	Carried Forward			R
	Section No. 3 SFD3 Bill No. 8 METALWORK Letlamoreng Primary School Tshashu Consulting and Project Managers			

		Brought Forward		R
9	150 x 150mm base plates	No	8	
10	Rawl bolts	kg	17	
Carried Forward to Summary of Section No. 3				R
Section No. 3 SFD3 Bill No. 8 METALWORK Letlamoreng Primary School Tshashu Consulting and Project Managers				

Item No	<u>BILL NO. 10</u>	Quantity	Rate	Amount
	<u>PLUMBING AND DRAINAGE (PROVISIONAL)</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>"Vaal" or Similar approved</u>			
1	510 x 405mm "Hibiscus" (code 7050)white vitreous rounded lavatory basin with one tap holes fixed to wall with and including two semi - concealed brackets (code 8446Z0)	No	2	
	<u>DRY ABLUTION TECHNOLOGY</u>			
	<u>Enviro - loo - systems</u>			
2	Supply and install Enviro-loo industrial system 1040 Model unit comprising of top unit and louvred inlets, drying plate, two air inlets, standard junior toilet pan, seat and lid, 3500mm long vent pipe, ventilation extraction unit fixed to wall with vent wall bracket, 1 bag mounting screws and organic starter, enzyme and toilet cleaner including all necessary fittings installed complete strictly in accordance with manufacturer's instructions	No	5	
3	Enviroloo system unrinal complete	No	1	
4	"Protea" Paraplegic vitreous china washdown pan with double flap heavy duty plastic seat and matching 9 litre cistern complete with lid, fitment and purpose made chromium plated side - flush lever fixed to brickwork as item	No	1	
	<u>Wash troughs</u>			
5	Supply and install pre-cast double wash trough, complete with all necessary pipework including soakaway size 1000 x 1000 x 1000mm covered with "bidem"	No	3	
	<u>TESTING</u>			
6	Testing waste pipe system		Item	
	Carried Forward			R
	Section No. 3 SFD3 Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>FITTINGS</u>			
7	19mm chrome plated push button taps to wash troughs	No	2
<u>WASTE UNION ETC</u>			
<u>"Cobra watertech"</u>			
8	32mm 301CP waste union	No	2
<u>TRAPS ETC</u>			
9	32mm Deep seal "P" or "S" trap	No	2
<u>"Cobra Watertech"</u>			
10	38mm 365/40 CP Bottle trap	No	2
<u>TAPS, VALVES, ETC</u>			
11	15mm 114 - 15CP "Star" pillar tap	No	12
12	15mm 166/041CP "Elbow action" sink mixer	No	2
13	15mm Stopcock	No	2
14	15mm Full-way gate valve	No	2
<u>"Cobra Watertech"</u>			
15	PA3.522 "Masterflo" pressure control valve with PB1.10 Vacuum breaker.	No	6
<u>SANITARY PLUMBING</u>			
<u>uPVC pipes</u>			
16	50mm Pipes	m	10
17	110mm Pipes	m	10
18	50mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	10
Carried Forward			R
Section No. 3 SFD3 Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
19	110mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	10
20	110mm Pipe laid in and including trenches exceeding 1m deep and not exceeding 2m deep.	m	10
<u>Pre-cast concrete gulleys</u>			
21	110mm Dished gulley not exceeding 1m deep with 150mm steel grate and standard concrete gulley surround	No	1
<u>Sundries</u>			
22	100mm Cast iron "ABC" cleaning eye	No	5
23	Precast concrete inspection eye marker slab set in ground	No	5
24	110mm Rodding eye	No	5
<u>Extra over uPVC pipes for fittings</u>			
25	50mm Bend	No	12
26	50mm Access junction	No	12
27	110mm Pan connector	No	12
28	110mm Bent pan connector	No	4
29	50mm Access bend	No	12
30	110mm Access bend	No	5
31	110mm Two-way vent valve	No	6
<u>TESTING</u>			
32	Testing waste pipe system		Item
<u>WATER SUPPLIES</u>			
Carried Forward			R
Section No. 3 SFD3 Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>HDPE polyethelene Class 12 piping with butwelding type pressure fittings</u>			
33	50mm Pipe and excavation not exceeding 1m deep	m	50
<u>Extra over HDPE polyethylene pipes for fittings</u>			
34	50mm Fittings	No	20
35	30mm Fittings (Reducers)	No	20
<u>Sundries</u>			
36	Testing water pipe system		Item
<u>Galvanised steel pipes</u>			
37	50mm Pipes	m	30
<u>Extra over galvanised steel pipes for fittings</u>			
38	50mm Elbow	No	7
39	50mm Reducer	No	7
<u>Class O copper pipes</u>			
40	15mm Pipes	m	30
41	22mm Pipes	m	30
<u>Extra over class O copper pipes for capillary fittings</u>			
42	15mm Fittings	No	7
43	22mm Fittings	No	7
<u>Copper overflow and service pipes</u>			
44	15mm Service pipe 450mm girth	No	6
Carried Forward to Summary of Section No. 3			R
Section No. 3			
SFD3			
Bill No. 10			
PLUMBING AND DRAINAGE			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No		Quantity	Rate	Amount
	<u>BILL NO. 12</u>			
	<u>PAINTWORK</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>ON FIBRE-CEMENT</u>			
	<u>Prepare and brush to remove all loose contaminations, apply one coat primer and two coats PVA emulsion paint</u>			
1	On fascias and barge boards	m2	5	
	<u>ON WOOD SURFACES</u>			
	<u>Undercoat and minimum 2 coat gloss enamel</u>			
2	On doors (external)	m2	7	
3	On doors (Internal)	m2	14	
	<u>ON METAL</u>			
	<u>Undercoat and minimum 2 coat gloss enamel</u>			
4	On door frames	m2	4	
5	On gates (measured over the full flat area of both sides)	m2	7	
6	On gutters and down pipes	m	12	
	<u>Spot priming defects in prime surfaces with zinc chromate primer and apply one universal undercoat and two coats EPWP golden brown gloss enamel paint on steel</u>			
7	On windows with burglar bars	m2	5	
	Carried Forward to Summary of Section No. 3			R
	Section No. 3			
	SFD3			
	Bill No. 12			
	PAINTWORK			
	Letlamoreng Primary School			
	Tshashu Consulting and Project Managers			

Bill No	Section No. 3	Page No	Amount
	SFD3		
	<u>SECTION SUMMARY - SFD3</u>		
1	EARTHWORKS	32	
2	CONCRETE, FORMWORK AND REINFORCEMENT	34	
3	MASONRY	37	
4	WATERPROOFING	38	
5	ROOF COVERINGS	39	
6	CARPENTRY AND JOINERY	41	
7	IRONMONGERY	43	
8	METALWORK	45	
9	IN SITU FINISHES	46	
10	PLUMBING AND DRAINAGE	50	
11	GLAZNG	51	
12	PAINTWORK	52	
	Carried to Final Summary		R
	Section No. 3		
	SFD3		
	Letlamoreng Primary School		
	Tshashu Consulting and Project Managers		

Item No	<u>SECTION 4</u>	Quantity	Rate	Amount
	<u>BILL NO.1</u>			
	<u>EARTHWORKS</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>SITE CLEARANCE</u>			
1	Digging up and removing rubbish, debris, vegetation, hedges, shrubs, bush, and trees not exceeding 200mm girth, etc	m2	84	
2	Stripping average 100mm thick layer of top soil and stockiling on site	m2	37	
	<u>EXCAVATION, FILLING, ETC</u>			
	<u>Excavate in earth not exceeding 2m deep</u>			
3	Trenches	m3	25	
4	For apron thickening	m3	6	
	<u>Extra over trench and hole excavations in earth for excavation:</u>			
5	Soft rock	m3	1	
6	Hard rock	m3	2	
	<u>Extra over all excavations for carting away:</u>			
7	Surplus material from excavations and/or stock piles on site to a dumping site to be allocated by the Contractor	m3	2	
	Carried Forward			R
	Section No. 4 SM2 + 2UR Bill No. 1 EARTHWORKS Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>Risk of collapse of excavations</u>			
8	Sides of trench and hole excavations not exceeding 1,5m deep	m2	22
<u>Keeping excavations free of water</u>			
9	Keeping excavations free of all water other than subterranean water		Item
<u>Earth filling obtained from the excavations and/or prescribed stock piles on site compacted to 93% Mod. AASHTO density</u>			
10	Under floors, steps, pavings, etc	m3	3
11	Backfilling to trenches, holes, etc	m3	3
<u>Compaction of surfaces</u>			
12	Compaction of ground surface under floors etc including scarifying for a depth of 150mm, breaking down oversize material, adding suitable material where necessary and compacting to 93% Mod AASHTO density	m2	14
13	Compaction of ground surface to aprons etc including scarifying for a depth of 150mm, breaking down oversize material, adding suitable material where necessary and compacting to 93% Mod AASHTO density	m2	21
<u>Prescribed density tests on filling</u>			
14	"Modified AASHTO Density" tests	No	1
<u>SOIL POISONING</u>			
<u>Soil insecticide</u>			
15	Under floors etc including forming and poisoning shallow furrows against foundation walls etc, filling in furrows and ramming	m2	14
16	To bottom of concrete aprons	m2	21
17	To bottoms and sides of trenches etc	m2	33
Carried Forward to Summary of Section No. 4			R
Section No. 4			
SM2 + 2UR			
Bill No. 1			
EARTHWORKS			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	<u>BILL NO.2</u>	Quantity	Rate	Amount
	<u>CONCRETE, FORMWORK AND REINFORCEMENT</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>UNREINFORCED CONCRETE, ETC</u>			
	<u>25MPa/19mm concrete</u>			
1	Strip footings	m3	25	
2	Aprons cast in panels	m3	12	
3	Extra over concrete in surface beds for thickening 85mm deep the bottom including all excavation, backfilling etc	m	8	
4	Thickening down apron on edge 110mm deep x 200mm wide	m	25	
5	Ramps	m3	6	
	<u>REINFORCED CONCRETE, ETC</u>			
	<u>25MPa/19mm concrete</u>			
6	Surface beds	m3	16	
	<u>CONCRETE SUNDRIES</u>			
	<u>Finishing top surfaces of concrete smooth with a wood float</u>			
7	Aprons and pavings to falls	m2	21	
	<u>TEST CUBES</u>			
8	Allow for preparing a set of three test cubes, each size 150 x 150 x 150mm, sending them to an approved testing laboratory for testing and paying all charges in connection therewith	No	2	
	Carried Forward			R
	Section No. 4 SM2 + 2UR Bill No. 2 CONCRETE, FORMWORK AND REINFORCEMENT Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Finishing top surfaces of concrete smooth with a steel trowel</u>		
9	Surface beds, slabs, etc	m2	14
	<u>FORMWORK</u>		
	<u>Rough formwork to sides:</u>		
10	Edges, risers, ends and reveals not exceeding 300mm high or wide	m	25
	<u>REINFORCEMENT</u>		
	<u>High tensile steel reinforcement to structural concrete work</u>		
11	12mm Diameter bars	t	0.540
	<u>Mesh reinforcement (measured nett)</u>		
12	Mesh ref. No. 395 fabric reinforcement fixed horizontal in surface beds	m2	39
Carried Forward to Summary of Section No. 4			R
Section No. 4			
SM2 + 2UR			
Bill No. 2			
CONCRETE, FORMWORK AND REINFORCEMENT			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	Quantity	Rate	Amount
<p><u>BILL NO. 3</u></p>			
<p><u>BRICKWORK</u></p>			
<p><u>SUPPLEMENTARY PREAMBLES</u></p>			
<p>For preambles see "Specifications of materials and methods to be used - PW371"</p>			
<p><u>BRICKWORK</u></p>			
<p><u>Sizes in descriptions</u></p>			
<p>Where sizes in descriptions are given in brick units, "one brick" shall represent the length and "half brick" the width of a brick</p>			
<p><u>Hollow walls etc</u></p>			
<p>Descriptions of hollow walls shall be deemed to include leaving every fifth perpend of the bottom course of the external skin open as a weep hole</p>			
<p>Walls in two skins described as "bagged and sealed" shall be deemed to include having the outer face of the inner skin bagged with 1:6 cement and sand mixture and sealed with two coats "Brixal" bitumen emulsion waterproofing coating</p>			
<p>User note: The above preamble generally applies for works in hot and humid coastal areas</p>			
<p><u>Face bricks</u></p>			
<p>Bricks shall be ordered timeously to obtain uniformity in size and colour</p>			
<p><u>Pointing</u></p>			
<p>Descriptions of recessed pointing to fair face brickwork and face brickwork shall be deemed to include square recessed, hollow recessed, weathered pointing, etc</p>			
<p>Carried Forward</p>			
<p>Section No. 4 SM2 + 2UR Bill No. 3 MASONRY Letlamoreng Primary School Tshashu Consulting and Project Managers</p>		R	

Brought Forward		R
<u>Samples</u>		
Samples of all masonry building units, except for walls described as "load bearing" shall consist of a minimum of 6 units. Samples of building units to be used in walls described as "load bearing" shall consist of 30 units from every 30 000 units delivered to site		
<u>FOUNDATIONS</u>		
<u>Brickwork of NFX bricks (14 MPa nominal compressive strength) in class I mortar</u>		
1	One brick walls	m2 16
<u>FACE BRICKWORK</u>		
<u>Face bricks (purchase price of R5,000.00/1000 delivered to site excluding VAT) pointed with flush horizontal and vertical joints</u>		
2	Extra over brickwork for face brickwork in foundation	m2 9
<u>SUPERSTRUCTURE</u>		
<u>FACE BRICKWORK</u>		
<u>Face bricks (purchase price of R5,000.00/1000 delivered to site excluding VAT) pointed with flush horizontal and vertical joints</u>		
3	Half brickwork for face brick walls pointed on both sides	m2 28
4	One brickwork for face brick walls pointed on both sides	m2 86
5	Extra over brickwork for face brickwork in beamfilling	m2 12
6	Fair raking and cutting	m 8
<u>Brick-on-edge header course copings, sills, etc of face bricks (purchase price of R3,500.00/1000 delivered to site excluding VAT) pointed with recessed joints on all exposed faces</u>		
7	Extra over brickwork for brick-on-edge header course lintels pointed on two sides and 110mm soffit	m 4
Carried Forward		R
Section No. 4 SM2 + 2UR Bill No. 3 MASONRY Letlamoreng Primary School Tshashu Consulting and Project Managers		

		Brought Forward		R
8	Face brick-on-edge sill 220mm wide pointed on two side and on top and set at an angle	m	4	
9	Fair cutting and fitting around pipe not exceeding 100mm diameter	No	8	
<u>BRICKWORK SUNDRIES</u>				
<u>Brick reinforcement</u>				
10	75mm Wide reinforcement built in horizontally	m	6	
11	150mm Wide reinforcement built in horizontally	m	152	
<u>Turning pieces</u>				
12	230mm Wide turning piece to lintels etc	m	4	
<u>Galvanised wire ties etc</u>				
13	6mm Diameter roof tie 2m girth bent double with one end fixed to timber and other end built into brickwork	No	10	
<u>Ventilation bricks</u>				
14	Set of two 22 x 155mm high terra cotta clay vermin proof air bricks including making good reveals and gauze	No	6	
Carried Forward to Summary of Section No. 4				R
Section No. 4				
SM2 + 2UR				
Bill No. 3				
MASONRY				
Letlamoreng Primary School				
Tshashu Consulting and Project Managers				

Item No	<u>BILL NO. 4</u>	Quantity	Rate	Amount
	<u>WATERPROOFING</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>DAMP-PROOFING OF WALLS AND FLOORS</u>			
	<u>One layer 375 micron embossed damp proof course</u>			
1	In walls	m2	3	
	<u>One layer 250 micron waterproof sheeting and sealed at overlaps with pressure sensitive tape</u>			
2	Under surface beds	m2	14	
	<u>FLOORS AND WALLS SEALERS</u>			
	<u>Secomastic non setting mastic sealant applied cold with a hand pressure caulking gun and leave perfectly watertight:</u>			
3	Around steel windows and door frames	m	26	
	Carried Forward to Summary of Section No. 4			R
	Section No. 4 SM2 + 2UR Bill No. 4 WATERPROOFING Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No	<u>BILL NO. 5</u>	Quantity	Rate	Amount
	<u>ROOF COVERINGS</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	NOTE : Unless otherwise stated herein, all items in this bill shall be deemed to fall into Work Group No. 124 for CPAP formula purposes			
	<u>PROFILED METAL SHEETING AND ACCESSORIES</u>			
	<u>0.58mm "Kliplock" roof sheeting in chromadek fixed to timber purlins (elsewhere)</u>			
1	Allow the Provisional Amount of R35 000.00 (Thity Five Thousand Rand) for supply and installation of roof sheeting	Item		35 000.00
	<u>Sundries</u>			
2	12" Thermal resistance sisolation laid on purlins	m2	17	
	<u>RAINWATER DISPOSAL</u>			
	<u>Aluzink seamless metal gutters:</u>			
3	100 x 100 x 0.6mm Standard rainwater gutters fixed with gutter brackets	m	5	
4	Extra for closed ends	No	2	
5	75 x 100 x 0.6mm Thick galvanised rainwater downpipes fixed to wall	m	7	
6	Extra over rainwater pipe for eaves offset	No	2	
7	Ditto, for shoe	No	2	
	Carried Forward to Summary of Section No. 4			R
	Section No. 4 SM2 + 2UR Bill No. 5 ROOF COVERINGS Letlamoreng Primary School Tshashu Consulting and Project Managers			

		Brought Forward		R
		<u>Wrought meranti doors hung to steel frames</u>		
7	44mm Framed batten door 915 x 2032mm high of 44 x 150mm top rail and stiles, 22 x 150mm middle ledge and braces and 22 x 220mm bottom rail, filled in with 22mm V-jointed one side boarding and including weatherboard (D3)	No	1	
		<u>Wrought meranti doors hung to steel frames</u>		
8	44mm Framed stable batten door 813 x 1016mm high of 44 x 150mm top rail and stiles, 22 x 150mm middle ledge and braces and 22 x 220mm bottom rail, filled in with 22mm V-jointed one side boarding and including weatherboard (D4)	No	5	
		<u>FRAMED FRAMES, ETC</u>		
		<u>Wrot meranti frames</u>		
9	44 x 100mm Rebated frames plugged	m	8	
Carried Forward to Summary of Section No. 4				R
Section No. 4 SM2 + 2UR Bill No. 6 CARPENTRY AND JOINERY Letlamoreng Primary School Tshashu Consulting and Project Managers				

Item No	<u>BILL NO. 7</u>	Quantity	Rate	Amount
	<u>IRONMONGERY</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>CATCHES, CABIN HOOKS, ETC</u>			
	<u>Approved</u>			
1	150mm Cabin hook and eye including 70 x 70 x 20mm chamfered hardwood block twice oiled and plugged	No	2	
	<u>LOCKS</u>			
	<u>Approved</u>			
2	Four lever mortice lockset	No	5	
	<u>DOORSTOPS</u>			
	<u>Approved</u>			
3	38mm Diameter rubber door stop, plugged	No	5	
	<u>LETTERS, NAME PLATES, ETC</u>			
	<u>Union or similar approved</u>			
4	75 x 150mm Natural anodised plate with male or female symbol	No	2	
	<u>DOOR CLOSERS, ETC</u>			
	<u>"Union"</u>			
5	Union DC 737 ENG-5 SC HO (737SCHO)	No	2	
	<u>BATHROOM FITTINGS</u>			
	Carried Forward			R
	Section No. 4 SM2 + 2UR Bill No. 7 IRONMONGERY Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No		Quantity	Rate	Amount
	<u>BILL NO. 8</u>			
	<u>METALWORK</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>PRESSED STEEL DOOR FRAMES</u>			
	<u>1,6mm Single rebated frames suitable for one brick walls</u>			
1	Frame for door 813 x 2032mm high	No	2	
	<u>1,2mm Single rebated frames suitable for half brick walls</u>			
2	Frame for door 813 x 2032mm high	No	8	
	<u>1,6mm Single rebated frames suitable for one brick walls</u>			
3	Frame for door 945 x 2032mm high (Disabled)	No	1	
	<u>STEEL WINDOWS, DOORS, ETC</u>			
4	Window type NE1, 533 x 654mm high including burglar bars	No	5	
5	Window type NE7, 1022 x 654mm high including burglar bars	No	6	
	<u>WELDED SCREENS, GATES, ETC</u>			
	<u>Steel gates and frames</u>			
6	Purpose made square hollow section mild steel security gate, size 813 x 2032mm high	No	2	
	<u>GUARD RAILS</u>			
	<u>Handrails</u>			
7	Handrails as per details	m	8	
8	Junctions	No	5	
	Carried Forward			R
	Section No. 4 SM2 + 2UR Bill No. 8 METALWORK Letlamoreng Primary School Tshashu Consulting and Project Managers			

		Brought Forward			R
9	150 x 150mm base plates	No	8		
10	Rawl bolts	kg	17		
Carried Forward to Summary of Section No. 4					R
Section No. 4 SM2 + 2UR Bill No. 8 METALWORK Letlamoreng Primary School Tshashu Consulting and Project Managers					

Item No		Quantity	Rate	Amount
	<u>BILL NO. 10</u>			
	<u>PLUMBING AND DRAINAGE (PROVISIONAL)</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>"Vaal" or Similar approved</u>			
1	510 x 405mm "Hibiscus" (code 7050)white vitreous rounded lavatory basin with one tap holes fixed to wall with and including two semi - concealed brackets (code 8446Z0)	No	2	
	<u>DRY ABLUTION TECHNOLOGY</u>			
	<u>Enviro - loo - systems</u>			
2	Supply and install Enviro-loo industrial system 1040 Model unit comprising of top unit and louvred inlets, drying plate, two air inlets, standard junior toilet pan, seat and lid, 3500mm long vent pipe, ventilation extraction unit fixed to wall with vent wall bracket, 1 bag mounting screws and organic starter, enzyme and toilet cleaner including all necessary fittings installed complete strictly in accordance with manufacturer's instructions	No	3	
3	Enviroloo system unrial complete	No	1	
4	"Protea" Paraplegic vitreous china washdown pan with double flap heavy duty plastic seat and matching 9 litre cistern complete with lid, fitment and purpose made chromium plated side - flush lever fixed to brickwork as item	No	1	
	<u>Wash troughs</u>			
5	Supply and install pre-cast double wash trough, complete with all necessary pipework including soakaway size 1000 x 1000 x 1000mm covered with "bidem"	No	3	
	<u>TESTING</u>			
6	Testing waste pipe system		Item	
	Carried Forward			R
	Section No. 4 SM2 + 2UR Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>FITTINGS</u>			
7	19mm chrome plated push button taps to wash troughs	No	2
<u>WASTE UNION ETC</u>			
<u>"Cobra watertech"</u>			
8	32mm 301CP waste union	No	2
<u>TRAPS ETC</u>			
9	32mm Deep seal "P" or "S" trap	No	2
<u>"Cobra Watertech"</u>			
10	38mm 365/40 CP Bottle trap	No	2
<u>TAPS, VALVES, ETC</u>			
11	15mm 114 - 15CP "Star" pillar tap	No	12
12	15mm 166/041CP "Elbow action" sink mixer	No	2
13	15mm Stopcock	No	2
14	15mm Full-way gate valve	No	2
<u>"Cobra Watertech"</u>			
15	PA3.522 "Masterflo" pressure control valve with PB1.10 Vacuum breaker.	No	6
<u>SANITARY PLUMBING</u>			
<u>uPVC pipes</u>			
16	50mm Pipes	m	10
17	110mm Pipes	m	10
18	50mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	10
Carried Forward			R
Section No. 4 SM2 + 2UR Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
19	110mm Pipe laid in and including trenches not exceeding 1m deep under surfacebeds	m	10
20	110mm Pipe laid in and including trenches exceeding 1m deep and not exceeding 2m deep.	m	10
<u>Pre-cast concrete gulleys</u>			
21	110mm Dished gulley not exceeding 1m deep with 150mm steel grate and standard concrete gulley surround	No	1
<u>Sundries</u>			
22	100mm Cast iron "ABC" cleaning eye	No	5
23	Precast concrete inspection eye marker slab set in ground	No	5
24	110mm Rodding eye	No	5
<u>Extra over uPVC pipes for fittings</u>			
25	50mm Bend	No	12
26	50mm Access junction	No	12
27	110mm Pan connector	No	12
28	110mm Bent pan connector	No	4
29	50mm Access bend	No	12
30	110mm Access bend	No	5
31	110mm Two-way vent valve	No	6
<u>TESTING</u>			
32	Testing waste pipe system		Item
<u>WATER SUPPLIES</u>			
Carried Forward			R
Section No. 4 SM2 + 2UR Bill No. 10 PLUMBING AND DRAINAGE Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>HDPE polyethelene Class 12 piping with butwelding type pressure fittings</u>			
33	50mm Pipe and excavation not exceeding 1m deep	m	50
<u>Extra over HDPE polyethylene pipes for fittings</u>			
34	50mm Fittings	No	20
35	30mm Fittings (Reducers)	No	20
<u>Sundries</u>			
36	Testing water pipe system		Item
<u>Galvanised steel pipes</u>			
37	50mm Pipes	m	30
<u>Extra over galvanised steel pipes for fittings</u>			
38	50mm Elbow	No	7
39	50mm Reducer	No	7
<u>Class O copper pipes</u>			
40	15mm Pipes	m	30
41	22mm Pipes	m	30
<u>Extra over class O copper pipes for capillary fittings</u>			
42	15mm Fittings	No	7
43	22mm Fittings	No	7
<u>Copper overflow and service pipes</u>			
44	15mm Service pipe 450mm girth	No	6
Carried Forward to Summary of Section No. 4			R
Section No. 4			
SM2 + 2UR			
Bill No. 10			
PLUMBING AND DRAINAGE			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No		Quantity	Rate	Amount
	<u>BILL NO. 12</u>			
	<u>PAINTWORK</u>			
	<u>SUPPLEMENTARY PREAMBLES</u>			
	For preambles see "Specifications of materials and methods to be used - PW371"			
	<u>ON FIBRE-CEMENT</u>			
	<u>Prepare and brush to remove all loose contaminations, apply one coat primer and two coats PVA emulsion paint</u>			
1	On fascias and barge boards	m2	5	
	<u>ON WOOD SURFACES</u>			
	<u>Undercoat and minimum 2 coat gloss enamel</u>			
2	On doors (external)	m2	7	
3	On doors (Internal)	m2	21	
	<u>ON METAL</u>			
	<u>Undercoat and minimum 2 coat gloss enamel</u>			
4	On door frames	m2	4	
5	On gates (measured over the full flat area of both sides)	m2	7	
6	On gutters and down pipes	m	12	
	<u>Spot priming defects in prime surfaces with zinc chromate primer and apply one universal undercoat and two coats EPWP golden brown gloss enamel paint on steel</u>			
7	On windows with burglar bars	m2	5	
	Carried Forward to Summary of Section No. 4			R
	Section No. 4			
	SM2 + 2UR			
	Bill No. 12			
	PAINTWORK			
	Letlamoreng Primary School			
	Tshashu Consulting and Project Managers			

Bill No	SECTION SUMMARY - SM2 + 2UR	Page No	Amount
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	SM2 + 2UR		
	SECTION SUMMARY - SM2 + 2UR		
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2	CONCRETE, FORMWORK AND REINFORCEMENT	57	
3	MASONRY	60	
4	WATERPROOFING	61	
5	ROOF COVERINGS	62	
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7	IRONMONGERY	66	
8	METALWORK	68	
9	IN SITU FINISHES	69	
10	PLUMBING AND DRAINAGE	73	
11	GLAZNG	74	
12	PAINTWORK	75	
	Carried to Final Summary		R
	Section No. 4		
	SM2 + 2UR		
	Letlamoreng Primary School		
	Tshashu Consulting and Project Managers		

Item No		Quantity	Rate	Amount
	<u>SECTION NO.6</u>			
	<u>BILL NO.1</u>			
	<u>STORM WATER CONTROL</u>			
	<u>PREAMBLES</u>			
	For preambles refer to "Department Of Public Works Specification Of Materials And Methods To Be Used - PW371"			
	<u>WALKWAYS</u>			
	<u>EARTHWORKS</u>			
	<u>Site clearance</u>			
1	Digging up and removing rubbish, debris, vegetation, hedges, shrubs and trees not exceeding 200mm girth, bush, etc	m2	280	
	<u>BULK EXCAVATION, FILLING, ETC</u>			
	<u>Open face excavation in earth over sloping site</u>			
2	Excavate in pickable earth to reduce ground level below paving and stockpile	m3	42	
3	Rip and scarify ground level to a depth of 150mm and consolidate to 100% mod. AASHTO density {minimum CBR 3}	m2	220	
	<u>Extra over bulk excavation in earth for excavation in</u>			
4	Soft rock	m3	4	
5	Hard rock	m3	0.4	
	<u>Risk of collapse of excavations</u>			
6	Sides of bulk excavations exceeding 1,5m deep	m2	45	
	<u>Keeping excavations free of water</u>			
7	Keeping excavation free of water		Item	
	Carried Forward			R
	Section No. 5 External Services Bill No. 1 STORM WATER CONTROL Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>Earth filling obtained from the excavations and/or prescribed stock piles on site compacted to 95% Mod AASHTO density</u>			
8	Backfilling to bulk excavations,etc	m3	30
<u>Earth filling supplied by the contractor compacted to 93% mod AASHTO density</u>			
9	150mm Imported G5 material compacted to 93% mod. AASHTO density	m3	15
<u>Prescribed density tests on filling</u>			
10	"Modified AASHTO Density" test	No	45
<u>UNREINFORCED CONCRETE</u>			
<u>20MPa/19mm concrete</u>			
11	Aprons cast in panels to falls	m3	19
12	Extra over concrete for thickening size 150mm deep 200mm top and tapering to 100mm at bottom including all excavation to 100mm backfilling etc.	m	45
<u>TEST CUBES</u>			
13	Allow for preparing a set of three concrete strength test cubes, each size 150 x 150 x 150mm, sending them to an approved Testing Laboratory for testing and paying all charges in connection therewith. (Provisional)	Sets	2.0
<u>CONCRETE SUNDRIES</u>			
<u>Finishing top surfaces of concrete smooth with a wood float</u>			
14	Aprons to falls	m2	25
<u>FORMWORK</u>			
<u>ROUGH FORMWORK (DEGREE OF ACCURACY II)</u>			
Carried Forward			R
Section No. 5 External Services Bill No. 1 STORM WATER CONTROL Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>Rough formwork to sides</u>			
15	Edges, risers, ends and reveals not exceeding 300mm high or wide	m	46
<u>REINFORCEMENT</u>			
<u>Fabric reinforcement</u>			
16	Ref 193 fabric reinforcement in concrete surface beds, slabs, etc	m2	27
<u>MOVEMENT JOINTS ETC</u>			
<u>Expansion joints with bitumen impregnated softboard between vertical concrete and brick surfaces</u>			
17	15mm Joints exceeding 300mm high (Provisional)	m	17
<u>DIVIDING STRIPS, ETC.</u>			
18	6 x 38mm Angle iron step guard cast into concrete with 3 x 6mm anchors	m	9
<u>Paving</u>			
<u>Paving of type 60mm interlocking pre-cast concrete paving blocks laid in herring bone pattern with butt joints including 50mm thick river sand bed with sand swept into joints, including preparation of ground or filling "L"</u>			
19	Paving to walkways etc to falls, including necessary straight edge blocks "Labour Intensive"	m2	280
<u>Kerbs</u>			
<u>Precast concrete finished smooth on exposed surfaces including bedding, jointing and pointing</u>			
20	Fig 12 kerb with 150 x 150 x 300mm unreinforced concrete haunching at back of each joint, including excavation, backfilling, etc "Labour Intensive"	m	180
Carried Forward			R
Section No. 5 External Services Bill No. 1 STORM WATER CONTROL Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Weedkiller (active ingredients metalaclor 102,8 g/l, terbitilasién 248,6 g/l and atrasién 248,6 g/l) mixed in the proportion of 100 ml weedkiller to 100 l water and applied at a rate of 10 l/m² "L"</u>		
21	Under paving etc "Labour Intensive"	m ²	185
	<u>Mass concrete with a coarse aggregate of 19mm and a minimum compressive strength of 15mpa at 28days</u>		
22	V-shaped channel 700mm x 100mm thick with rounded salient edges and finished on exposed surfaces 2:1 cement moetar, laid to falls in panels not exceeding 1,mm long with 12mmbitumen impregnated movement joint with exposed edges raked out for a depth of 10mm and filled with bituminous compound including all necessary excavations and formwork and one layer of ref 193 mesh reinforcement.	m	200
23	Extra for fair open end	No	48
24	Extra for angle intersection	No	37
Carried Forward to Summary of Section No. 5			R
Section No. 5			
External Services			
Bill No. 1			
STORM WATER CONTROL			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Earth filling obtained from the excavations and/or prescribed stock piles on site compacted to 93% Mod. AASHTO density</u>		
7	Backfilling to holes,etc	m3	16
	<u>Prescribed density tests on filling</u>		
8	"Modified AASHTO Density" test	No	3
	<u>SOIL POISONING</u>		
	<u>Soil insecticide</u>		
9	To bottom holes and sides of holes etc	m2	63
	<u>UNREINFORCED CONCRETE CAST AGAINST EXCAVATED SURFACES</u>		
	<u>25MPa/19mm Concrete</u>		
10	Bases	m3	6
	<u>TEST CUBES</u>		
11	Allow for preparing a set of three concrete strength test cubes, each size 150 x 150 x 150mm , sending them to an approved Testing Laboratory for testing and paying all charges in connection therewith.	Sets	1.0
	<u>FENCING</u>		
	<u>Steel Palisade Fencing</u>		
	<u>The following in steel palisade fencing</u>		
12	1800mm High Devils fork palisade fencing comprising 40 x 40 x 2mm x 1 750mm angle pales bolted at 175mm centres onto 50 x 50 x 3mm angle iron crossbars onto 76 x 76 x 2mm square tube posts 2400mm long by means of 40 x 5.00mm flat bar fish plate and including planting posts into 600 x 600 x 600mm deep 25MPa concrete complete with all earthworks, trimmings and fixing. (all concrete work to engineer's specification	m	887
Carried Forward			R
Section No. 5 External Services Bill No. 2 FENCING Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
13	Sliding gate 6 000mm x 1 800mm High formed from 40 x 40 x 2mm welded angle iron paling; 76 x 38 x 2mm rectangular tubing frame; two 80mm roller coaster wheels fitted with ball bearing; track formed of 12mm steel rod welded to 40 x 40 x 5mm angle iron fixed into a 300 x 400 x 5 000mm concrete base; gate posts formed of 75 x 75 x 2mm steel square tubing 2 400mm overall length planted into 450 x 450 x 600mm concrete base (all concrete work to engineer's specification).	No	2
14	Pedestrian gate 1 500mm x 1 800mm High formed from 40 x 40 x 2mm welded angle iron paling; 50 x 25 x 1.6mm rectangular tubing frame; gate posts formed of 75 x 75 x 2mm steel square tubing 2400mm overall length planted into 450 x 450 x 600mm concrete base (all concrete work to engineer's specification).	No	3
<u>Paintwork</u>			
<u>On metalwork</u>			
15	Prime, apply one coat undercoat and two coats of high gloss enamel paint on steel (Measured over the full flat area of both sides according specification)	m2	1 644
Carried Forward to Summary of Section No. 5			R
Section No. 5			
External Services			
Bill No. 2			
FENCING			
Letlamoreng Primary School			
Tshashu Consulting and Project Managers			

Item No	<u>SECTION NO.6</u>	Quantity	Rate	Amount
	<u>BILL NO.4</u>			
	<u>WATER TANK AND TANK STAND (PROVISIONAL)</u>			
	<u>PREAMBLES</u>			
	For preambles refer to "Department Of Public Works Specification Of Materials And Methods To Be Used - PW371"			
	<u>WATER TANKS AND TANKS STANDS</u>			
	<u>EXCAVATION,FILLING,ETC OTHER THAN BULK</u>			
	<u>Exavation in earth not exceeding 2m deep</u>			
1	Holes	m3	8	
	<u>Extra over trench and hole excavation in earth for excavation in</u>			
2	Soft rock	m3	1	
3	Hard rock	m3	1	
	<u>Extra over all excavations for carting away</u>			
4	Surplus material from excavations and / or rock piles on site to a dumping site to be located by the contractor	m3	5	
	<u>Risk of collapse of excavations</u>			
5	Sides of trench and hole excavations not exceeding 1,5m deep	m2	41	
	<u>Keeping excavations free of water</u>			
6	Keeping excavation free of water	Item		
	Carried Forward			R
	Section No. 5 External Services Bill No. 3 WATER TANK AND TANK STAND Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Earth filling obtained from the excavations and/or prescribed stock piles on site compacted to 93% Mod. AASHTO density</u>		
7	Backfilling to holes,etc	m3	16
	<u>Prescribed density tests on filling</u>		
8	"Modified AASHTO Density" test	No	3
	<u>SOIL POISONING</u>		
	<u>Soil insecticide</u>		
9	To bottom holes and sides of holes etc	m2	63
	<u>UNREINFORCED CONCRETE CAST AGAINST EXCAVATED SURFACES</u>		
	<u>25MPa/19mm Concrete</u>		
10	Bases	m3	6
	<u>TEST CUBES</u>		
11	Allow for preparing a set of three concrete strength test cubes, each size 150 x 150 x 150mm , sending them to an approved Testing Laboratory for testing and paying all charges in connection therewith.	Sets	1.0
	<u>Structural Steel</u>		
	<u>Welded columns in single lengths with flat base, cap, bearer and connection plates, bolted to concrete</u>		
12	80 x 80mm x 6mm Angle-section	t	0.1
	<u>Welded beams in single lengths with flat bearer and connection plates, bolted to steel</u>		
13	30 x 30mm x 6mm Flat-section	t	0.4
14	40 x 40mm x 5mm Angle -section	t	0.4
15	125 x 50 x 20 x 2mm Lipped channel-section	t	1
Carried Forward			R
Section No. 5 External Services Bill No. 3 WATER TANK AND TANK STAND Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
16	125 x 75 x 8mm Flat-section <u>Bolts to columns, beams, etc</u>	t	0.3
17	High Tensile bolts <u>Spot priming bare metal surfaces with zinc chromate primer an applying one undercoat and two coatsalkyd enamel paint in colours which have a value of 7 or less on the Munsell system in accordance with SABS 1091 on previously painted steel in bad condition</u>	t	0.1
18	Paint to structural steel <u>RAINWATER TANKS</u>	m2	32
19	10 000 Litre plastic water tank fitted onto and secured to tank platforms	No	1
20	50000 Litre plastic water tank fitted onto and secured to tank platforms	No	1
Carried Forward to Summary of Section No. 5			R
Section No. 5 External Services Bill No. 3 WATER TANK AND TANK STAND Letlamoreng Primary School Tshashu Consulting and Project Managers			

Item No		Quantity	Rate	Amount
	<u>RAINWATER HARVESTING</u>			
	<u>SITE CLEARANCE</u>			
1	Digging up and removing rubbish, debris, vegetation, hedges, shrubs, bush, and trees not exceeding 200mm girth, etc	m2	64	
	<u>EXCAVATION,FILLING,ETC OTHER THAN BULK</u>			
	<u>Exavation in earth not exceeding 2m deep</u>			
2	Trenches	m3	12	
	<u>Extra over trench and hole excavation in earth for excavation in</u>			
3	Soft rock	m3	1	
4	Hard rock	m3	0.1	
	<u>Extra over all excavations for carting away</u>			
5	Surplus material from excavations and / or rock piles on site to a dumping site to be located by the contractor	m3	6	
	<u>Risk of collapse of excavations</u>			
6	Sides of trench and hole excavations not exceeding 1,5m deep	m2	95	
	<u>Keeping excavations free of water</u>			
7	Keeping excavation free of water		Item	
	<u>Earth filling supplied by the contractor compacted to 93% mod AASHTO density</u>			
8	Backfilling to trenches,holes,etc	m3	15	
9	Under floors,steps,paving,etc	m3	12	
	<u>Prescribed density tests on filling</u>			
10	"Modified AASHTO Density" test	No	6	
	Carried Forward			R
	Section No. 5 External Services Bill No. 4 RAINWATER HAERVESTING Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
<u>SOIL POISONING</u>			
<u>Soil insecticide</u>			
11	To bottom trenches and sides of trenches etc	m2	12
12	Under floors etc including forming and poisoning shallow furrows against foundation walls etc, filling in furrows and ramming	m2	8
<u>UNREINFORCED CONCRETE CAST AGAINST EXCAVATED SURFACES</u>			
<u>REINFORCED CONCRETE CAST AGAINST EXCAVATED SURFACES</u>			
<u>UNREINFORCED CONCRETE, ETC</u>			
<u>25MPa/19mm concrete</u>			
13	Strip footings	m3	2
<u>REINFORCED CONCRETE</u>			
<u>20Mpa/19mm concrete</u>			
14	Surface beds on waterproofing	m3	4
<u>TEST CUBES</u>			
15	Allow for preparing a set of three concrete strength test cubes, each size 150 x 150 x 150mm , sending them to an approved Testing Laboratory for testing and paying all charges in connection therewith.	Sets	1.0
<u>Finishing top surfaces of concrete smooth with a wood float</u>			
16	Surface beds, slabs, etc	m2	4
<u>REINFORCEMENT (PROVISIONAL)</u>			
Carried Forward			R
Section No. 5 External Services Bill No. 4 RAINWATER HARVESTING Letlamoreng Primary School Tshashu Consulting and Project Managers			

Brought Forward			R
	<u>Fabric reinforcement</u>		
17	Ref 193 fabric reinforcement in concrete surface beds, slabs, etc	m2	4
	<u>MASONRY</u>		
	<u>BRICKWORK</u>		
	<u>Brick work of NFX (14MPa nominal compressive strength) in class I mortar:</u>		
18	One brick wall in foundations	m2	20
	<u>BRICKWORK SUNDRIES</u>		
	<u>Brickwork reinforcement</u>		
19	150mm reinforcement built in horizontally	m	1 920
	<u>FACE BRICKWORK</u>		
	<u>Face bricks (Purchase price of R 5 000,00/1000 delivered to the side excluding VAT) pointed with recessed horizontal and vertical joints</u>		
20	Extra over brickwork for face brickwork	m2	23
	<u>WATERPROOFING</u>		
	<u>DAMP-PROOFING OF WALLS AND FLOORS</u>		
	<u>One layer of 375 micron Consol Plastic Brickrip DPC" embossed damp proof course</u>		
21	On walls, under cills, etc	m2	7
	<u>One layer of 250 micron "Consol Plastic Brickgrip USB Green" waterproof sheeting sealed at laps with Gunplas Pressure Sensitive Tape"</u>		
22	Under surface beds	m2	8
	Carried Forward		R
	Section No. 5 External Services Bill No. 4 RAINWATER HAERVESTING Letlamoreng Primary School Tshashu Consulting and Project Managers		

Bill No	<u>SECTION SUMMARY - External Services</u>	Page No	Amount
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	Section No. 5 External Services Letlamoreng Primary School Tshashu Consulting and Project Managers		

Section No	FINAL SUMMARY	Page No	Amount
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2	Alterations	30	
3	SFD3	53	
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	SUB TOTAL (A)		R
	Provide 10% (TEN PERCENT) on Sub-total (A) as contingency to be deducted in whole or in part if not required		R
	SUB TOTAL (B)		R
	Add Value Added Tax @ 15%		R
	Total		R
	Letlamoreng Primary School Tshashu Consulting and Project Managers		