



National Disaster Management Office Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Bill of Quantities Revision 01

2 March 2021



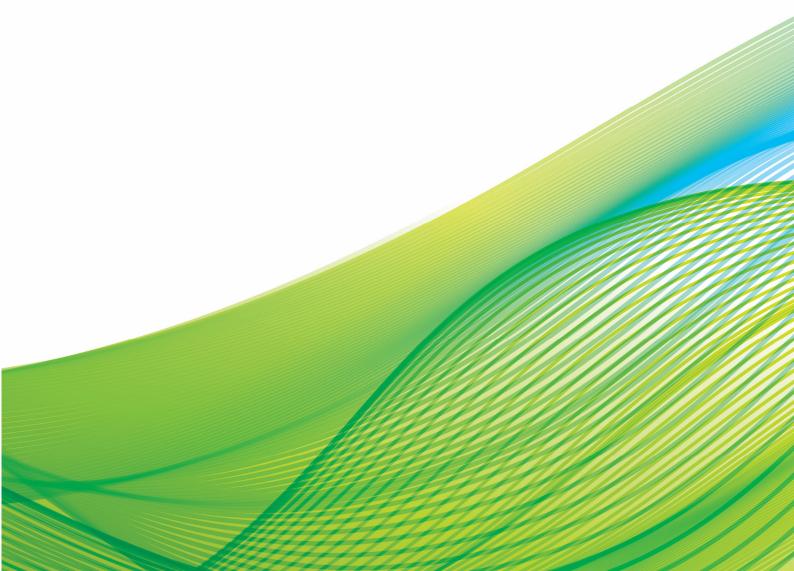
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Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
1	PRELIMINARIES				
1.1	SPECIFICATION				
1.2	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
1.3	DRAWINGS				
1.4	The Contractor is referred to the Drawing Schedule attached to the back of this Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
1.5	GENERALLY				
1.6	The true cost of Preliminaries is deemed to be entered in this Section and not elsewhere.				
1.7	The total of the prices inserted against items contained in this section are deemed to represent the total cost of Preliminaries.				
1.8	In general, items within the Preliminaries are regarded as a fixed amount not subject to adjustment other than in accordance the various contractual conditions and requirements referred to in the contract documents				
1.9	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
1.10	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
1.11	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
1.12	Name of Parties				
1.13	Refer to the Specification for Names and Addresses of all parties including Principal, Superintendent and all other Consultants.				
1.14	Location and Description of Site				
1.15	Refer to the Specification and the Drawings for the location of the site, description of the site and overall site dimensions.				
1.16	Scope of the Project				
1.17	The Bills of Quantities have been prepared to assist Contractors to identify and define the scope of work to be included in the Contract. They are provided as a reference document only.				
1.18	Description of Work				
1.19	The Contractor is referred to the Specification and the Drawings for full description of the works to be carried out under this Contract.				
1.20	PRICING OF PRELIMINARIES				
1.21	Generally				
1.22	It is the Contractor's responsibility to refer to the documents in pricing the Preliminaries Section of the Bill of Quantities and to allow for any cost implications in connection with the various contractual conditions and requirements referred to therein.				
1.23	The prices inserted against items listed hereunder shall include all expenses involved in complying with the terms thereof.				



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ails: National Disaster Management Office Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
1	PRELIMINARIES				(Continued)
1.24	If the Contractor leaves particular references to clauses unpriced it will be deemed that the clauses referred to have their costs included elsewhere or that the Contractor considers that no costs will be incurred in relation to those clauses.				
1.25	<u>Preliminaries</u>				
1.26	Allow for all preliminaries in accordance with the specification and the nominated contract.				
1.27	Quality Assurance				
1.28	Allow for all costs which may be incurred in complying with all quality assurance requirements including hold points, inspections and submissions of product data and records as specified.				
1.29	BILLS OF QUANTITIES				
1.30	Generally				
1.31	The Bills of Quantities is provided as a reference document only.				
1.32	Method of measurement				
1.33	Unless otherwise stated the quantities are measured net as fixed in position. The quantities are not to be used for ordering of materials purposes.				
1.34	The quantities have been measured in accordance with the Specification and from the Drawings listed at the rear of the Bill of Quantities.				
1.35	The Contractor is advised to recognise the Quantity Surveyors intent to identify all items of cost regardless of the status of the documentation. It is however the Contractors responsibility to make due allowance in their tender for all costs they consider necessary to complete the project in accordance with the Tender Documents whether or not those costs are identified in this Document.				
1.36	<u>Prices</u>				
1.37	The Contractor will price every item that has a value and use realistic rates to facilitate accurate costing of Variations and Claims. Unpriced items will be deemed to have their cost included elsewhere or to be NIL value. Unrealistic rates in the submitted priced Bills of Quantities will be subject to adjustment in accordance with General Condition of Contract				
1.38	All items of the Bills of Quantities shall be rated and priced individually and not grouped together to equal the amount of the Tender.				
1.39	The Contractor will be deemed to have included in his rates and prices for all work that may be necessary, but is not required to be measured under the detailed rules of measurement within the ASMM.				
1.40	If the Contractor considers that a measured item attaches no individual monetary obligation, he should strike out the money columns to indicate a "no charge" item. If any item is not priced and not struck through but left blank it shall be deemed to have been struck through. The work or obligation so described shall then be deemed to be included in the rates generally and no financial adjustment may be made by reason of change in quantity to that item.				



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Details: National Disaster Management Office -

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
1	PRELIMINARIES				(Continued)
1.41	Any errors in extension or addition or both, or correction of incorrect or inconsistent rates or prices (including the inserting of rates or prices wrongly omitted and the deletion of rates or prices wrongly included) discovered by the Superintendent or the Contractor in the priced copy of the Bills of Quantities lodged by the Contractor shall be corrected in a manner agreed between the Contractor and the Superintendent, or in the event of failure to agree, as determined by the Superintendent so that the total of all items in the Priced Bills of Quantities continues to equal the lump sum accepted by the Principal for the execution of the whole of the work to which the Bills of Quantities relates.				
1.42	Staging of the Works				
1.43	The Contractor is referred to the contract documents for full details of the staging of the works and will be deemed to have allowed here or in the rates and prices for all additional costs associated therewith. Measurement items do not generally separate work in different stages.				
1.44	Trade Names				
1.45	All trade names included in this Bill of Quantities will be deemed to have the words 'or equal approved' inserted after them.				
1.46	<u>Dimensions</u>				
1.47	All dimensions given in item descriptions are in millimetres unless otherwise described.				
1.48	Attendance upon nominated sub-contractors				
1.49	Attendance items include for both general and specific attendance. Prices against such attendance items will therefore be deemed to include for all general and specific attendance.				
1.50	Works by others				
1.51	Contractor shall allow for all cooperation of the Principal's supply and installation items as noted.				
1.52	ABBREVIATIONS				
1.53	Where the following abbreviations have been used in the Bills of Quantities they shall have the meanings as indicated below:				
1.54	approx - approximately				
1.55	BMT - Base Metal Thickness				
1.56	CHS - Circular Hollow Section				
1.57	EA - Equal Angle				
1.58	dia - diameter				
1.59	dwg - drawing				
1.60	(f) - finished sizes				
1.61	kg - kilogram				
1.62	kN - kilo Newton				
1.63	mm - millimetre				
1.64	m - metre				
1.65	m2 - square metre				
1.66	m3 - cubic metre				



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Code	Description	Quantity	Unit	Rate	Total
1	PRELIMINARIES				(Continued)
1.67	max - maximum				
1.68	min - minimum				
1.69	MPa - Megapascals				
1.70	NB - Nominal Bore				
1.71	No number				
1.72	nom - nominal				
1.73	OD - Outside Diameter				
1.74	PFC - Parallel Flanged Channel				
1.75	PVC - Polyvinyl Chloride				
1.76	uPVC - Unplasticised Polyvinyl Chloride				
1.77	RC - Reinforced Concrete				
1.78	RHS - Rectangular Hollow Section				
1.79	SHS - Square Hollow Section				
1.80	t - tonne				
1.81	TFB - Taper Flanged Beam				
1.82	TFC - Taper Flanged Channel				
1.83	UA - Unequal Angle				
1.84	UB - Universal Beam				
1.85	UC - Universal Column				
1.86	um - micro metre				



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Code	Description	Quantity	Unit	Rate	Total
1	PRELIMINARIES				(Continued)

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PRELIMINARIES Carried to Summary:



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**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
2	DEMOLITION				
2.1	GENERALLY				
2.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
2.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
2.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
2.5	SPECIFICATION				
2.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
2.7	DRAWINGS				
2.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
2.9	PREAMBLE				
2.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
2.11	All materials, fittings, etc. removed from site unless otherwise described will become the property of the Contractor who is to cart the same away from site.		item		
2.12	Complying with all requirements set out in the Specification, the Drawings and to Authorities' Regulations.		item		
2.13	Protection of adjacent existing surfaces, glazing, decorative render mouldings, other finishes, structures and the like items that are likely to be marked, soiled and / or damaged during construction.		item		
2.14	Making good all damaged surfaces, glazing, decorative render mouldings, other finishes, structures and the like items to their original condition if any damage is caused by the Contractor and / or due to inadequate protection during construction.		item		
2.15	All demolition and clearance, labour and materials, scaffolding, needling, strutting, providing temporary walls and screens for protection of people and as dust barriers including altering and adapting same as required during the progress of the works and for taking down and clearing away on completion.		item		
2.16	Making good all works disturbed as required following demolition including re-use existing materials, replacing paving, reinstating finishes, filling holes and the like items as required to return disturbed works to their original state.		item		
2.17	Coordinating with other trades associated with the demolition.		item		
2.18	Bins, cartage and dumping fees.		item		
2.19	Cleaning down surfaces on completion required for new work to be carried out.		item		
2.20	Cleaning up, removal of all rubbish and debris, removal of all temporary supports and equipment upon completion of all demolition.		item		



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Code	Description	Quantity	Unit	Rate	Total
2	DEMOLITION				(Continued)
2.21	The approximate quantities / dimensions of demolition work in this Bill are given as a guide to the Contractor for estimating purposes and are advised to visit the site and inspect the existing structures and site conditions and study the drawings to ascertain the full extent and character of the operations. No claim on the grounds of lack of knowledge or variance in the approximate quantities will be entertained.		item		
2.22	ALLOWANCES				
2.23	Allow for testing and inspections		item		
2.24	Allow for samples and submissions		item		
2.25	Allow for records and record keeping		item		
2.26	Allow for dilapidation report		item		
2.27	Allow for inspection of the existing premise		item		
2.28	Allow for all measures to be taken to protect existing works or premises on site or adjoining properties and all occupants		item		
2.29	Allow for supporting structures as required		item		
2.30	Allow for staging of works		item		
2.31	Allow for locating, identifying and protecting existing services not earmarked for demolition		item		
2.32	Allow for complying with all requirements of the authorities, obtaining permits and paying all fees including appropriate disposal of demolished material		item		
2.33	Allow for any additional costs necessary to complete the works and for which no specific provision is included		item		
2.34	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
2.35	MEASUREMENT NOTE				
2.36	All items demolished are the property of the SIWA and to be re-used or salvaged as directed		Note		
2.37	The following items are measured to assist the contractor and are in addition to those notes nominated on the architectural drawings in particular Dwg A020 Demolition Notes		Note		
2.38	HAZARDOUS MATERIAL REMOVAL				
2.39	Remove any hazardous and contaminated material including asbestos, lead paint and remove in accordance with the clients requirements	1	item		
2.40	Allow for all associated decontamination unit, negative air units, dust and air monitoring, testing and re-testing, and final report confirming removal of all asbestos	1	item		
2.41	DEMOLITION				
2.42	Allow for the demolition of any structure, element or vegetation to enable the construction of the project including water tank and UXO survey	1	item		



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**DEMOLITION** 

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Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
3	GROUNDWORKS				
3.1	GENERALLY				
3.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
3.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
3.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
3.5	SPECIFICATION				
3.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
3.7	DRAWINGS				
3.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
3.9	PREAMBLE				
3.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
3.11	Excavating in material as found. The Contractor is to refer to the site soil report and is to allow for ALL types of material to be encountered including all levels of contaminated material (if any) AND rock of any form and for the subsequent correct disposal of surplus material and remediation treatment / stabilisation of material.		item		
3.12	Excavation rates will be deemed to include for all designed shoring.		item		
3.13	Excavation rates will be deemed to include for any type of backfilling required.		item		
3.14	Surface preparation to excavated areas and filling.		item		
3.15	Excavation rates shall include for any additional disposal of surplus soil due to the increase in bulk of excavated materials.		item		
3.16	Filling rates shall include for any decrease in bulk of filling after it has been compacted and shall include for any additional material required.		item		
3.17	Any method of compaction to achieve the required density.		item		
3.18	Stockpiling of excavated and imported material for reuse.		item		
3.19	ALLOWANCES				
3.20	Allow for testing and inspections		item		
3.21	Allow for samples and submissions		item		
3.22	Allow for records and record keeping		item		
3.23	Allow for due diligence report		item		
3.24	Allow for giving all notices and complying with all regulations		item		
3.25	Allow for keeping excavations free from rain and percolating water by pumping or otherwise		item		
3.26	Allow for soft spots		item		



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Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
3	GROUNDWORKS				(Continued)
3.27	Allow for sediment and erosion control		item		
3.28	Allow for keeping excavation free from rain and percolating water by pumping or otherwise		item		
3.29	Allow for subgrade inspections and fill placement to be supervised by geotechnical engineer		item		
3.30	SUB-GRADE PREPARATION				
3.31	Prepare a hazardous substances management plan as specified	1	item		
3.32	Allow for local authority permits including but not limited to earthmoving and HPO permits	1	item		
3.33	Civil Works refer to Earthworks Notes on Dwg C0001				
3.34	The Contractor is to visit the site after completion of the demolition (by others) and ascertain the extent of vegetation, soils containing organic and deleterious material, concrete slabs, concrete building footings and pavement areas remaining, which shall be stripped and removed from site	1	item		
3.35	Depressions formed by removal of underground elements and or weakened areas should be cleaned out and filled with compacted imported fill material	1	item		
3.36	Exposed construction areas shall be proof rolled and areas demonstrating excessive movement shall be removed to competent material and replaced with compacted imported fill material	1	item		
3.37	All soft, wet or unsuitable material is to be removed and replaced with approved material	1	item		
3.38	Structural Works refer to Bulk Excavation, Sub-Grade Preparation and Excavation and Site Retention Notes on Dwg S005				
3.39	Strip all vegetation and top soil to a minimum depth as per the geotechnical advice or to design subgrade levels, whichever is lower, to expose natural design founding material	1	item		
3.40	Topsoil to be stockpiled for future landscaping use if directed	1	item		
3.41	DETAILED EXCAVATION IN MATERIAL AS FOUND				
3.42	Excavation commencing at reduced level				
3.43	Trench excavation, for strip footings and ground tie beams including blinding layer, 0-1000 total depth	63	m3		
3.44	Trench excavation, for ground beams including blinding layer, 0-1000 total depth	16	m3		
3.45	Pit excavation, for pad footings including blinding layer, 0-1000 total depth	14	m3		
3.46	WORKING SPACE AND/OR MAINTAINING FACES				
3.47	Provide for working space and/or maintaining faces to the following				
3.48	Note: formwork has also been measured, therefore depending on the construction methodology, either select 'maintaining faces' or 'formwork'				
3.49	Working space and/or maintaining faces, to strip footings and ground-tie beams excavation, 0-1000 total depth	129	m2		
3.50	Working space and/or maintaining faces, to ground beams excavation, 0-1000 total depth	36	m2		
3.51	Working space and/or maintaining faces, to pad footing excavation, 0-1000 total depth	18	m2		



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Code	Description	Quantity	Unit	Rate	Total
3	GROUNDWORKS				(Continued)
3.52	FILLING AND BASECOURSES				
3.53	Approved filling including compacting, leveling and trimming surface				
3.54	Engineered fill comprising non-expansive approved select fill placed in uniform layers not exceeding 200mm loose thickness and compacted to achieve a minimum dry density ratio of 98% standard	201	m3		
3.55	Allow for field dry density tests to be carrier out for each layer of filling, to verify specified density ratios	1	item		
3.56	Surplus to spoil to be removed from site	1	item		
3.57	Type 2.3 (CBR 45) base-course compacted to minimum 95% M.D.D including compaction, leveling and trimming surface refer Reinforced Concrete Footpath note on Dwg C0110				
3.58	100 thick base course	112	m2		
3.59	Proof roll and remove all wet and weak areas and replace with select fill material including compaction and excavation	1	item		
3.60	Approved sand filling including compacting, leveling and trimming surface				
3.61	50 thick sand bed	239	m2		
3.62	PLASTIC MEMBRANES				
3.63	Layer of plastic film 0.2mm thick lapped and jointed in accordance with the manufacturer's recommendation				
3.64	Horizontal membrane, laid on approved filling including turn-ups not exceeding 500 high	239	m2		
3.65	TERMITE TREATMENT				
3.66	Allow for 'Trithor' or equal approved termite management and control system as specified	1	item		



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Code	Description	Quantity	Unit	Rate	Total
3	GROUNDWORKS				(Continued)

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**GROUNDWORKS Carried to Summary:** 



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Code	Description	Quantity	Unit	Rate	Total
4	IN-SITU CONCRETE				
4.1	GENERALLY				
4.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
4.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
4.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
4.5	SPECIFICATION				
4.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
4.7	DRAWINGS				
4.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
4.9	PREAMBLE				
4.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
4.11	Mixing and handling		item		
4.12	Placing on ground, membrane, formwork or Bondek		item		
4.13	Hoisting and lowering to all levels		item		
4.14	Pumping		item		
4.15	Compacting and packing around reinforcement, conduits, etc		item		
4.16	Submission		item		
4.17	Shop drawings		item		
4.18	Pour joints and other joints not shown on drawings to all levels including formwork		item		
4.19	Design joints to all levels (not shown on drawings), such as expansion, contraction, perimeter, keyed, saw-cut and dowelled joints, including formwork and joint sealants		item		
4.20	Casting in holding down bolts or the like supplied by others		item		
4.21	Additional concrete required for overbreak and to conform with the excavation (where formwork is not used) and other design tolerances		item		
4.22	Any necessary special treatment to joints		item		
4.23	Core drilling for service pipes and the like		item		
4.24	Cutting away for or casting in metalwork items, pipes and the like		item		
4.25	Making good after removal of formwork		item		
4.26	Concrete machine bases, plinths, kerbs, hobs and the like for services		item		
4.27	Concrete sump, pits, trenches and the like (not shown on drawings) including formwork and reinforcement		item		



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Code	Description	Quantity	Unit	Rate	Total
4	IN-SITU CONCRETE				(Continued)
4.28	Stair nosing and aluminium framing rebates and setdowns		item		
4.29	Tamping surfaces of concrete		item		
4.30	Scabbling surfaces		item		
4.31	Finishing slabs level, to falls and to crossfalls		item		
4.32	Surface dish drains		item		
4.33	Concrete working slabs under tanking		item		
4.34	Allow for any additional costs necessary to complete the works and for which no specific provision is included		item		
4.35	Allow for providing samples of materials or finishes		item		
4.36	Allow for testing materials, concrete specimens and similar		item		
4.37	BLINDING LAYER				
4.38	Allow for 50 thick mass concrete beneath pad footings	2	m3		
4.39	Allow for 50 thick mass concrete beneath strip footings and ground tie beams	7	m3		
4.40	Allow for 50 thick mass concrete beneath ground beams	2	m3		
4.41	Allow for blinding concrete as required to ensure diverted services do not undermine footings as noted on dwg EB-S200	1	item		
4.42	N25 VIBRATED REINFORCED CONCRETE GRADE				
4.43	Pad footings	13	m3		
4.44	Strip footings and ground tie beams	57	m3		
4.45	Ground beams	14	m3		
4.46	Upturn beams	3	m3		
4.47	Slab on ground 100-200 thick, placed on membrane, including thickenings :[164 m2]	25	m3		
4.48	External slab on ground 100-200 thick, placed on membrane, laid to falls and/or crossfalls including thickenings :[90 m2]	11	m3		
4.49	External ramped slab on ground 100-200 thick, placed on membrane, laid to falls and/or crossfalls including thickenings :[107 m2]	5	m3		
4.50	External pedestrian pavement slab on ground 100-200 thick, laid to falls and/or crossfalls :[304 m2]	14	m3		
4.51	Stairs including landings, stringers and treads	4	m3		
4.52	150 high x 150 wide hob to water treatment room	1	m3		
4.53	150 high x 200 wide hob to fuel tank room	1	m3		
4.54	Isolated columns 400 x 400	1	m3		
4.55	Suspended slab 100-200 thick:[377 m2]	27	m3		
4.56	External suspended slab 100-200 thick :[17 m2]	4	m3		
4.57	Attached beams including fold and steps	3	m3		
4.58	Suspended roof slab 200-300 thick laid to falls and/or crossfalls :[147 m2]	33	m3		
4.59	Attached roof beams including fold and steps	5	m3		
4.60	200 high x 160 wide hob to roof access ladder	1	m3		



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**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
4	IN-SITU CONCRETE				(Continued)
4.61	200 high x 200 wide hob to support trusses as detailed on S235	2	m3		
4.62	EXPANSION AND SIMILAR JOINTS				
4.63	Expansion joints and similar including any necessary preparation, formwork and accessories as per typical details on Dwg S050				
4.64	Allow for all sawcut joints as required	1	item		
4.65	Allow for all keyed construction joints as required	1	item		
4.66	Allow for all dowel joints as required	1	item		
4.67	Saw cut joints as per typical detail on Dwg C0110				
4.68	Saw cut joints to external pedestrian pavement slab	38	m		
4.69	INTEGRAL FINISHES				
4.70	Broom finish to the following surfaces				
4.71	Broom finish to external slabs	104	m2		
4.72	Broom finish to external stair treads :[9 m]	3	m2		
4.73	Broom finish to external pedestrian pavement slabs	112	m2		
4.74	Approved integral finish to the following surfaces				
4.75	Finish to slab	278	m2		
4.76	Finish to roof slab	147	m2		
4.77	Finish to stair treads :[27 m]	8	m2		
4.78	Finish to stair landings	5	m2		
4.79	Finish to drain :[2 m]	1	m2		
4.80	Finish to hob, 0-250 wide	70	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
4	IN-SITU CONCRETE					(Continued)

#### COLLECTION

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IN-SITU CONCRETE Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
5	FORMWORK				
5.1	GENERALLY				
5.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
5.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
5.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
5.5	SPECIFICATION				
5.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
5.7	DRAWINGS				
5.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
5.9	PREAMBLE				
5.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
5.11	Fabrication, erecting and stripping		item		
5.12	Boarding, framing, ties, supports and strutting, etc		item		
5.13	Hoisting and lowering to all levels		item		
5.14	Cleaning, wetting, form oil, etc		item		
5.15	Formations up to 2500mm2 sectional area		item		
5.16	Setting out to required cambers		item		
5.17	Forming cambers other than design cambers		item		
5.18	Forming setdowns in tops of slabs to a maximum 50 deep including all necessary formwork		item		
5.19	Straight, raking and circular cutting		item		
5.20	Cutting around plain and circular columns		item		
5.21	Waste		item		
5.22	Forming minor penetrations up to 0.25m2		item		
5.23	Temporary inspection openings		item		
5.24	Linings and supports that remain in position		item		
5.25	Allow for propping		item		
5.26	Formwork and strutting to support slabs and drop panels within the range of thickness's stated		item		
5.27	Strutting of all heights		item		
5.28	Strutting off level or sloping concrete slabs and level or sloping ground		item		
5.29	Strutting left after removal of forms		item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
5	FORMWORK				(Continued)
5.30	Forming chamfered, splayed, rounded and moulded external angles and splayed internal angles, rebates, projecting nibs, drip grooves and the like		item		
5.31	Perforations for pipes, reinforcing rods and the like		item		
5.32	Forming pockets and mortices		item		
5.33	Forming setdowns less than or equal to 50mm		item		
5.34	Forming penetrations for service pipes etc in slabs, beams and walls		item		
5.35	Testing and inspections		item		
5.36	Filling tie bolt holes		item		
5.37	Allow for forming concrete blinding layer beneath pad and strip footings placed between excavated faces to a depth to achieve bearing capacity		item		
5.38	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
5.39	FORMWORK				
5.40	Approved formwork to the following locations wholly in ground				
5.41	Note: maintaining faces in Groundworks trade has also been measured, therefore depending on the construction methodology, either select 'maintaining faces' or 'formwork'				
5.42	Face of strip footings and ground-tie beams	129	m2		
5.43	Face of ground beams	36	m2		
5.44	Face of pad footings	18	m2		
5.45	Class 2 formwork to the following locations				
5.46	Soffit of floor slab including strutting	134	m2		
5.47	Sides and soffit of attached beams	19	m2		
5.48	Soffit of floor roof slab including strutting	141	m2		
5.49	Sides and soffit of attached roof beams	33	m2		
5.50	Edge of slab	20	m2		
5.51	Face of isolated column	8	m2		
5.52	Face of upturn beams	24	m2		
5.53	Soffit of stair flight	9	m2		
5.54	Soffit of stair landing	5	m2		
5.55	Side of stringer including cutting to profile of treads and riser	3	m2		
5.56	Face of undercut stair riser, 0-250 high	36	m		
5.57	Edge of slab, 0-250 high	38	m		
5.58	Edge of slab on ground, 0-250 high	202	m		
5.59	Edge of setdown in slab, 0-100 high	40	m		
5.60	Edge of grated drain as typical detail on dwg S060	3	m		
5.61	Edge of hob, 0-250 high	89	m		
5.62	Form opening 1000 x 1200 in roof slab for access hatch	1	no		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
5	FORMWORK				(Continued)
5.63	Form opening 300 x 100 high in hob for drainage cutout	8	no		
5.64	Form rebate for floor box	8	no		
5.65	Form rebate for sumps	2	no		
5.66	Form rebate for SHS column as typical detail on dwg S060	3	no		
5.67	Allow to form rebates and/or setdowns for tactile indicators and recessed stair nosings as required	1	item		
5.68	Note: Edge formwork to slabs takes into account the use of the C block to create the edge form		note		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
5	FORMWORK					(Continued)

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**FORMWORK** 

**Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

s: National Disaster Management Οπice Ebeye Island, Kwajalein Atoll

Code Unit Rate Total Description Quantity 6 REINFORCEMENT 6.1 **GENERALLY** 6.2 Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities. 6.3 The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities. M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of 6.4 Quantities by any party. 6.5 **SPECIFICATION** 6.6 The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith. 6.7 **DRAWINGS** 6.8 The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document. 6.9 **PREAMBLE** 6.10 Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications 6.11 Cleaning, cutting, bending and fabricating item 6.12 Rolling margin (no allowance has been made for rolling margin) item 6.13 Making and delivery to site in the sequence as nominated by the Builder item 6.14 Welding item 6.15 Fixing including temporary supports other than tie wire and chair supports item 6.16 Tie wire including tying at all intersections and passings item 6.17 Hoisting and lowering to all levels item 6.18 Samples and testing item 6.19 Inspections item 6.20 Submissions item 6.21 Bars of varying lengths, grades and diameters as required by the contract item documents 6.22 Bars curved or specially bent to radius as required by the contract documents item 6.23 Bars curved or adapted to suit cambered beams item 6.24 Links, ties, spacers, stirrups, bindings, ligatures and the like (mass is included item in the measured quantities) 6.25 Laps and waste on fabric reinforcement (quantities are measured net) item 6.26 Straight, raking and circular cutting of fabric reinforcement item 6.27 Tie wire and chair supports item 6.28 Dowel to joints as required item 6.29 Preparation of a bending schedule item



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
6	REINFORCEMENT				(Continued)
6.30	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
6.31	REINFORCEMENT				
6.32	Allow for preparing and submitting bending schedules as described in the specification for the following total quantities of reinforcement:	1	item		
6.33	MESH REINFORCEMENT				
6.34	SL72 mesh to slab on ground	112	m2		
6.35	SL82 mesh to roof slab	145	m2		
6.36	SL92 mesh to slab on ground	341	m2		
6.37	3-L111TM trench mesh to edge beams	28	m		
6.38	EPOXY COATED BAR REINFORCEMENT				
6.39	Note: The following have been provided by the engineers to determine the indicative quantities only, the contractor must satisfy themselves with the design as documented				
6.40	Pad footings, based on 80kg/m3	0.98	t		
6.41	Ground tie beam footings, based on 80kg/m3	0.14	t		
6.42	Ground beams, based on 100-150kg/m3	1.45	t		
6.43	Slab on ground, misc/distribution reinforcement, based on 10kg/m3	0.40	t		
6.44	Strip footings, based on 95-130kg/m3	6.61	t		
6.45	Upturn beams, based on 180kg/m3	0.43	t		
6.46	Floor hobs based on 110kg/m3	0.06	t		
6.47	Isolated column, based on 180kg/m3	0.16	t		
6.48	Stairs and landings on ground, based on 150kg/m3	0.12	t		
6.49	Stairs including landings, stringers and treads, based on 150kg/m3	0.47	t		
6.50	Suspended slab, based on 120kg/m3	3.64	t		
6.51	Attached beams, based on 150kg/m3	0.55	t		
6.52	Suspended roof slab, based on 115-120kg/m3	3.71	t		
6.53	Attached roof beams, based on 150kg/m3	0.84	t		
6.54	Roof hobs based on 110kg/m3	0.44	t		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Desc	ription	Quantity	Unit	Rate	Total
6	REINFORCEMENT					(Continued)

#### COLLECTION

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REINFORCEMENT Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
7	TANKING & WATERPROOFING				
7.1	GENERALLY				
7.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
7.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
7.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
7.5	SPECIFICATION				
7.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
7.7	DRAWINGS				
7.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
7.9	PREAMBLE				
7.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
7.11	Preparation of tanking surfaces, junctions/angles, laps and waste, labours, fillets, joints, accessories etc.		item		
7.12	Forming penetrations and openings in tanked material including flashings, collars and dressing into grooves.		item		
7.13	Flashings, jointing, sealing, fillets, reglets and the like as applicable to meet manufacturers requirements as specified		item		
7.14	Circular work to tanking will be deemed to include for all such work.		item		
7.15	Warranties and guarantees		item		
7.16	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
7.17	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
7.18	TANKING MEMBRANE SYSTEM				
7.19	Parchem 'Fosroc Nitoproof 210' waterproof membrane system including substrate preparation, 'Fosroc Proofex Sheetdrain 81' drainage sheet protection, all lapped and jointed in accordance with manufacturer's instructions and as specified				
7.20	Vertical tanking applied on block wall	92	m2		
7.21	Parchem 'Fosroc Nitoproof 810' waterproof membrane system including 'Fosroc Nitoprime 120' substrate preparation, all lapped and jointed in accordance with manufacturer's instructions and as specified				
7.22	Reveals to blockwork walls :[90 m]	36	m2		
7.23	WATERPROOFING MEMBRANE SYSTEM				
7.24	Mapei waterproof membrane system including substrate preparation, lapped and jointed in accordance with manufacturer's instructions and as specified				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

Building: Ebeye Emergency Operations Centre Ebeye Isla

Code	Description	Quantity	Unit	Rate	Total
7	TANKING & WATERPROOFING				(Continued)
7.25	Vertical membrane applied to vinyl sheet walls	5	m2		
7.26	Vertical membrane applied to tiled walls	51	m2		
7.27	Horizontal membrane applied to concrete slab including the bonded screed laid to falls and crossfalls	41	m2		
7.28	Turn-ups not exceeding 250 high including any angle fillet and dressing over fillets at bottom	44	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

 Code
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 7
 TANKING & WATERPROOFING
 (Continued)

#### COLLECTION

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**TANKING & WATERPROOFING** Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
8	MASONRY				
8.1	GENERALLY				
8.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
8.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
8.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
8.5	SPECIFICATION				
8.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
8.7	DRAWINGS				
8.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
8.9	PREAMBLE				
8.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
8.11	Masonry in all classifications to any floor or slab level.		item		
8.12	Masonry will be deemed to include for cutting all grooves for turning in edges of flashings, weather bars and similar items and any pointing required.		item		
8.13	Blockwork will be deemed to include for all necessary formwork and purpose made clean out blocks associated with core filling.		item		
8.14	Compaction of core filling by internal vibration or rodding.		item		
8.15	Forming all openings including additional joint reinforcement, lintels, sleeves, packing and fire rated sealing around opening, plumbing all angles, jambs and reveals, rough straight cutting and waste, keeping cavities clear of mortar droppings.		item		
8.16	Additional wall ties at openings, T-intersections and discontinuations where required.		item		
8.17	Scabbling of structure surfaces to receive blockwork.		item		
8.18	Building in and grouting metal door frames etc.		item		
8.19	All control, movement, expansion and similar joints where not measured hereafter including all necessary special blocks and caulking.		item		
8.20	Tying top and ends of masonry wall to concrete or steel including all necessary special blocks and caulking.		item		
8.21	All fire rated and non-fire rated caulking, backing rods and the like joints as required.		item		
8.22	Damp proof courses and wire bed joint reinforcement strips built into courses of block walls.		item		
8.23	Closing all cavities at ends of hollow walls and jambs of openings with purpose made blocks including "C" blocks to slab edge		item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
8	MASONRY				(Continued)
8.24	Bands of different bricks or blocks of a course height different to that of the general course height to make up heights of walls, etc.		item		
8.25	Corrosion protection to built-in metal items		item		
8.26	Forming penetrations for services and building in vent blocks, etc.		item		
8.27	Providing samples and sample panels as required		item		
8.28	Tests and test certificates as required		item		
8.29	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
8.30	BLOCKWORK				
8.31	Standard hollow natural grey 390 x 190 x 190 strength grade 15MPa core-filled block, laid in stretcher bond with cement, lime and sand mortar (1:1:6)				
8.32	190 thick wall	623	m2		
8.33	190 thick wall as retaining wall	120	m2		
8.34	390 x 390 engaged pier	31	m2		
8.35	190 x 190 high bond beam lintel block course refer typical detail Type A on S042	15	m		
8.36	190 x 390 high bond beam lintel block course refer typical detail Type B on S042	15	m		
8.37	40 high capping to exposed top of 190 thick walls	36	m		
8.38	40 high capping to exposed end of 190 thick walls	15	m		
8.39	JOINTS				
8.40	Allow for all joints as typical details on dwg S040	1	item		
8.41	Allow for fire rated joints as typical details on dwg S040	1	item		
8.42	CONCRETE FILLING				
8.43	20MPa concrete grout				
8.44	Filling to all cores of 190 thick wall	623	m2		
8.45	Filling to all cores of 190 thick retaining wall	120	m2		
8.46	Filling to all cores of 390x390 engaged pier	31	m2		
8.47	Filling to all cores 190 x 190 high bond beam lintel	15	m		
8.48	Filling to all cores 190 x 390 high bond beam lintel	15	m		
8.49	EPOXY COATED BAR REINFORCEMENT				
8.50	Note: The following have been provided by the engineers to determine the indicative quantities only, the contractor must satisfy themselves with the design as documented		note		
8.51	Epoxy coated reinforcement to block walls, based on 15kg/m2	9.35	t		
8.52	Epoxy coated reinforcement to block retaining walls, based on 15kg/m2	1.79	t		
8.53	Epoxy coated reinforcement to block engaged piers, based on 15kg/m2	0.47	t		
8.54	BLOCKWORK SUNDRIES				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

Building: Ebeye Emergency Operations Centre Ebeye I

Code	Description	Quantity	Unit	Rate	Total
8	MASONRY				(Continued)
8.55	Clean down face of block wall on completion (net face)	1,502	m2		
8.56	Fair facing and pointing face of block wall to receive paint finish	1,299	m2		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
8	MASONRY				(Continued)

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**MASONRY** 

**Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
9	STEEL, TRUSSES & STAIRS				
9.1	GENERALLY				
9.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
9.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
9.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
9.5	SPECIFICATION				
9.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
9.7	DRAWINGS				
9.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
9.9	PREAMBLE				
9.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
9.11	Structural steelwork in all classifications to any floor or slab level		item		
9.12	Purlins, girts and battens shall include for fixing at any centres to supports		item		
9.13	Structural steel shall include for any additional splicing or fabrication necessary to facilitate transportation or erection		item		
9.14	Tapered trims to beams		item		
9.15	Shop fabrication work, making, delivery, unloading, hoisting, lowering, erection, and fixing		item		
9.16	Shop drilling for bolts, rivets or carpenters bolts which secure timbers indicated on steelwork drawings		item		
9.17	Site welding		item		
9.18	Bolts including nuts and any type of washer which may be required for bolts		item		
9.19	Riveting		item		
9.20	Casting into structure or drilling or structure for anchor bolts and the like		item		
9.21	Wedging and grouting bases and the like		item		
9.22	Rolling margin and the mass of welding materials		item		
9.23	Machining faces		item		
9.24	Shop priming and/or galvanising treatments including all preparation works		item		
9.25	Site painting or galvanising bolt heads and nuts after fabrication		item		
9.26	Temporary boxes, setting out, casting in and grouting holding down bolt assemblies		item		
9.27	Submission of quality assurance details		item		
9.28	Preparation of shop drawings		item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
9	STEEL, TRUSSES & STAIRS				(Continued)
9.29	Special trial shop assembly		item		
9.30	Provision, maintenance and removal of all necessary temporary bracing during erection		item		
9.31	Samples and tests		item		
9.32	Submissions		item		
9.33	Warranties		item		
9.34	Marking and labeling		item		
9.35	Electrical bonding as required		item		
9.36	Electrolytic barriers		item		
9.37	Inspection of welds including the use of any special techniques as required		item		
9.38	Top restraint sections fixed at top of block walls to structural steel roof framing		item		
9.39	Static line posts including bracing as per typical detail		item		
9.40	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
9.41	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
9.42	TRUSSES				
9.43	Allow for prefabricated roof trusses fixed to concrete hob with 100x8 equal angles and M20 chemsets and bolts including all other necessary fixings as detailed on Dwg S235 (Roof Area on Plan = 211m2)	1	item		
9.44	Metal cyclonic roof battens nominally 40 x 90 fixed to trusses as per manufacturer's recommendation and as specified (area taken from roof sheeting)	229	m2		
9.45	STAIRS				
9.46	Note: Balustrade measured in metalwork				
9.47	Structural steel to suit corrosive environment including shop prime coated as required				
9.48	Columns 100x6 SHS	0.28	t		
9.49	Stringers 200x100x5 RHS	0.35	t		
9.50	Landing members welded frame 200x100x5 RHS	0.55	t		
9.51	Allow for all necessary attached connections and fitted stiffeners, loose connections, bolts, holding down bolt assemblies, wedges and grouting and field work	1	item		
9.52	Staircare Australia 40mm micromesh composite fibreglass reinforced panels with slip resistance as specified (FRP)				
9.53	Stair 2 landings	12	m2		
9.54	Stair treads 280 wide with solid nosing as detail 1on dwg EB-A361 :[25 no]	34	m		
9.55	Solid kickboard riser as detail 1on dwg EB-A361 :[25 no]	34	m		
9.56	Painting				
9.57	Allow to paint structural steel framing	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

 Code
 Description
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 9
 STEEL, TRUSSES & STAIRS
 (Continued)

#### COLLECTION

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STEEL, TRUSSES & STAIRS Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
10	ROOFING & CLADDING				
10.1	GENERALLY				
10.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
10.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
10.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
10.5	SPECIFICATION				
10.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
10.7	DRAWINGS				
10.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
10.9	PREAMBLE				
10.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
10.11	Roofing in all classifications at any height above ground.		item		
10.12	Laps, painting of laps, method of fixing.		item		
10.13	Any spacing of structural supports.		item		
10.14	Raking and circular cutting.		item		
10.15	All cladding areas not exceeding 250 wide.		item		
10.16	Forming openings to cladding.		item		
10.17	All turn ups and turn downs, rolled edges at barges, turning ends of sheets up or down across troughs, bending sheets over ridges and similar.		item		
10.18	All junctions, mitres, troughs, notching over or dressing into corrugations, ends and similar items to flashings.		item		
10.19	Providing thermal movement in the roof installation including movement in joints and fastenings.		item		
10.20	All separating strips, packers, bird proofing, filler strips, foam closures, caulking, sealants and similar items.		item		
10.21	Junctions between the roof panel system and walls / penetrations to be filled with a fire rated gun applied canister urethane insulation		item		
0.22	Fill gaps with canister fire rated foam filler to all composite or sandwich panels		item		
0.23	Fascias and barges shall include for junctions, mitred at corners and the like.		item		
10.24	All necessary seismic restraints and seismic certification.		item		
10.25	Electrolytic barriers.		item		
10.26	Guarantees		item		
10.27	Shop drawings		item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
10	ROOFING & CLADDING				(Continued)
10.28	Allow for providing samples and prototypes		item		
10.29	Allow for certificates		item		
10.30	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
10.31	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
10.32	METAL ROOF SHEETING				
10.33	Aluminium roof sheeting 0.9 thick 'Dimond Veedek' complete with Trimdek profile, colorcote finish, cyclone rated fixings, all laps, trims and accessories in accordance with manufacturer's recommendations and as specified				
10.34	Metal roof sheeting fixed to metal battens as specified (MRS)	229	m2		
10.35	Safety mesh 'Ausmesh 300' or equal approved PVC coated stainless steel roof mesh as specified	229	m2		
10.36	CSR Bradford sarking or equal approved comprising 'Sarking Thermoseal 730' medium duty reflective foil with 60 thick roof blanket 'Anticon 60' insulation fixed in accordance with manufacturers recommendations and as specified	229	m2		
10.37	Aluminium flashings and cappings comprising 0.9 thick 'Dimond Alumigard Corrguate' complete with corrugated profile, colorcote finish, cyclone rated fixings, all laps, trims and accessories in accordance with manufacturer's recommendations and as specified				
10.38	Hip capping 250-500 girth fixed to metal sheeting to match roof system	7	m		
10.39	Ridge capping 250-500 girth fixed to metal sheeting to match roof system	34	m		
10.40	Fascia capping 250-500 girth fixed to and including 18 thick marine ply to match roof system	62	m		
10.41	Allow for all necessary flashing and sealing around pipes	1	item		
10.42	Allow for any necessary fall arrest system comprising of anchors and static line all in accordance with manufacturers instructions (if required)	1	item		
10.43	GUTTERS				
10.44	0.6 BMT Stramit 'Eziform' gutter system comprising 316 grade stainless steel, heavy duty powdercoated aluminium brackets at specified centres, joins, laps, supports, straps, packers, clips and similar items as specified				
10.45	250 dia. half round gutter fixed to and including gutter brackets at 1000 centres max. and over strapping	62	m		
10.46	Downpipe outlet to suit 150 dia. gutter	5	no		
10.47	DOWNPIPES				
10.48	0.6 BMT downpipe comprising 316 grade stainless steel with supports, specialised stainless steel brackets, clips and similar items				
10.49	150 dia downpipe including brackets as detailed on Dwg A310 & A320	42	m		
10.50	METAL SOFFIT CLADDING				
10.51	Aluminium soffit sheeting 0.9 thick 'Dimond Alumigard Corrguate' complete with corrugated profile, colorcote finish, cyclone rated fixings, all laps, trims and accessories in accordance with manufacturer's recommendations and as specified				
10.52	Metal sheet soffit cladding fixed to and including 40 x 90 battens	66	m2		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

Building: Ebeye Emergency Operations Centre Ebeye Islan

Code	Description	Quantity	Unit	Rate	Total
10	ROOFING & CLADDING				(Continued)
10.53	Trim flashing to perimeter 0-250 girth fixed to metal sheeting to match cladding system	110	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

 Code
 Description
 Quantity
 Unit
 Rate
 Total

 10
 ROOFING & CLADDING
 (Continued)

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ROOFING & CLADDING Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
11	METALWORK				
11.1	GENERALLY				
11.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
11.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
11.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
11.5	SPECIFICATION				
11.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
11.7	DRAWINGS				
11.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
11.9	PREAMBLE				
11.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
11.11	Metalwork terminals, scrolls, mitres and similar items to balustrades and handrails will be deemed included.		item		
11.12	Metalwork items will be deemed to include for all fixings including any necessary drilling in any background whatsoever.		item		
11.13	All necessary seismic restraints and seismic certification.		item		
11.14	Inspections		item		
11.15	Samples		item		
11.16	Submission of shop drawings		item		
11.17	Submission of tests, manufacturer's data and certificates		item		
11.18	Providing maintenance manuals		item		
11.19	Removal and cleaning of temporary coatings		item		
11.20	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
11.21	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
11.22	LOUVRES				
11.23	Austral Monsoon or equal approved 'AME100HV' two stage louvres with powdercoat finish and 316 grade stainless steel vermin mesh as specified				
11.24	Louvre 800 x 2200 high	2	no		
11.25	Louvre 817 x 2400 high	3	no		
11.26	Louvre 825 x 800 high	1	no		
11.27	Louvre clad Kensington Series two stage louvres with powdercoat finish and 316 grade stainless steel vermin mesh as specified				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
11	METALWORK				(Continued)
11.28	Louvre 400 x 400 high	1	no		
11.29	Louvre 400 x 800 high	2	no		
11.30	Louvre 817 x 2400 high	3	no		
11.31	SCREENS & GATES				
11.32	Metal screen enclosure comprising powdercoated SHS steel frame, stainless steel mesh sides and 4 thick folded aluminium roof lining fixed to and including top hats all fixed to the slab and blockwork wall including all necessary hardware as per Dwg A372				
11.33	Metal screen enclosure to air-conditioning units approx. 4200 long x 2400 high x 625 wide as per Dwg A372	1	no		
11.34	Single metal gate to air-conditioning unit enclosure, 1200 wide x 2350 high including all necessary hardware fixed to metal screen enclosure	3	no		
11.35	Window debris protection screens approx. 425 deep comprising 1.2mm 316 grade stainless steel mesh front similar to 'Alspec Invisi-maxx Cyclonic Screen' with 10 thick trespa panel surrounding the frame fixed to and including powdercoated SHS framing as detailed on Dwg A370 & 371				
11.36	To suit window unit 600 x 1800 high overall	2	no		
11.37	To suit window unit 2410 x 1800 high overall	3	no		
11.38	FENCING & GATES				
11.39	Commercial aluminium chain link mesh fencing or PVC coated galv wire chain link mesh fencing comprising top-mid-bottom rails and posts complete with concrete footings including all hardware, fixings and accessories as specified				
11.40	Pair of metal mesh gates, 2600 x 2350 high overall including all necessary hardware fixed to blockwork wall	1	no		
11.41	BALUSTRADES & HANDRAILS				
11.42	50 dia x 2mm stainless steel grade 316 handrail including tactile dome button, raking, turns, ends and all fixings and brackets as detailed on Dwgs A350 and as specified (HR1, HR2, BAL)	29	m		
11.43	50 dia x 2mm stainless steel grade 316 handrail 'Bridco or equal approved' to external ramp and stairs including tactile dome button, raking, turns, ends and all fixings and brackets as detailed on Dwgs A352 and as specified	44	m		
11.44	50 dia x 2mm stainless steel grade 316 balustrade 'Bridco or equal approved' to external stairs including tactile dome button, raking, turns, ends and all fixings and brackets as detailed on Dwgs A351 & 361 and as specified	42	m		
11.45	LADDERS				
11.46	Aluminium 'Safya' ladders installed as per manufacturer's recommendations and as specified				
11.47	Roof access ladder nominal 2700 long comprising 'Safya' ceiling retractable ladder and sliding access hatch including flashing kit 'LD498T' as specified (LDR1)	1	no		
11.48	MISCELLANEOUS METALWORK				
11.49	Wall duct 'ECD' with clip-on cover approx. 125 wide x 40 deep mounted on fibre cement lining as specified	21	m		
11.50	Drainage outlet stainless steel mesh cover approx. 300 wide x 100 high fixed to concrete hob as detailed on Dwg A310	8	no		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
11	METALWORK				(Continued)
11.51	Galvanised metal grate approx. 1200 long x 300 wide over open concrete trench as specified and detailed on Dwg C010	2	no		
11.52	Spitter overflow outlet stainless steel to balcony fixed to concrete hob as detailed on Dwg A310	2	no		
11.53	Floor boxes as specified	8	no		
11.54	Flagpole as specified	1	no		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
11	METALWORK				(Continued)

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**METALWORK** 

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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
12	PARTITIONS & LININGS				
12.1	GENERALLY				
12.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
12.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
12.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
12.5	SPECIFICATION				
12.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
12.7	DRAWINGS				
12.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
12.9	PREAMBLE				
12.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
12.11	Metal framing shall be deemed to include for everything necessary to complete the framing systems including seismic loads, methods of fixing, intersections, special noggings and similar such as deflection heads and the like, acoustic and fire rating sealants etc.		item		
12.12	Special noggings will be deemed to include all additional framing, plywood sheeting, timber, cleats, fixings and similar items required to support all fixtures and equipment.		item		
12.13	Providing any necessary additional channels, studs, trimmers, noggings and furrings at angles, intersections, around all sides of openings and where required for fixing of fittings and the like to stud framing.		item		
12.14	Channels, studs, trimmers, noggings, fixings etc in forming angles, corner mullions, free ends and fixed ends to metal framing.		item		
12.15	All necessary sealants, caulking, acoustic and fire rated seals and fillers and all similar accessories.		item		
12.16	Forming openings in metal framing including linings.		item		
12.17	Bolts complete with nuts and any type of washer including drilling members to be fixed		item		
12.18	Drilling structure for masonry bolt anchors and the like		item		
12.19	Factory finishes including touching up on completion		item		
12.20	Temporary grounds and the like		item		
12.21	Preparation of base		item		
12.22	Cutting and/or making good around pipes, sanitary fixtures and the like		item		
12.23	Expansion/movement joints		item		
12.24	Metal trims or similar reinforcement to external and internal angles and edges		item		
12.25	Extra labour in work to narrow widths		item		



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
12	PARTITIONS & LININGS				(Continued)
12.26	Arrises, rounded or splayed external angles, fair edges, rounded or splayed edges, internal angles, intersections to groins and the like		item		
12.27	Quirks, grooves, V-joints and the like next to frames etc, or at junction with other finishes		item		
12.28	Forming flush joints with other finishes in the same plane		item		
12.29	Metal lathing over chases, recesses or reveals to provide key		item		
12.30	All necessary elements to achieve the acoustic requirements		item		
12.31	All necessary seismic restraints and seismic certification		item		
12.32	Shop drawings		item		
12.33	Quality assurance		item		
12.34	Inspections		item		
12.35	Data submission		item		
12.36	Warranties		item		
12.37	Curing of finished work		item		
12.38	Covering, protecting and masking adjacent surfaces		item		
12.39	Cleaning on completion		item		
12.40	Stainless steel trims to joints, junctions and corners		item		
12.41	Allow for additional marine-ply noggings to enable satisfactory fixing behind all fixtures		Item		
12.42	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
12.43	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
12.44	PARTITION SYSTEMS				
12.45	Partition systems comprising Rondo framing as specified; types nominated in assist in locating specification				
12.46	Partition system comprising 92 stud fixed to underside of concrete slab with 9 thick FC lining to 2800 high on one side (quantity measured to 2.8m)	12	m2		
12.47	Partition system comprising 92 stud fixed to underside of concrete slab with 9 thick FC lining to 2800 high on both sides (quantity measured to 2.8m)	25	m2		
12.48	Partition system comprising 92 stud fixed to underside of concrete slab with 9 thick FC lining to 2800 high on one side and 9 thick FC lining to underside of slab on other side and fully sealed (quantity measured to u/s of slab)	59	m2		
12.49	Partition system comprising 16 furring channels and 9 thick FC lining on one side fixed to concrete column (quantity measured to 2.8m)	4	m2		
12.50	Partition system comprising 92 stud fixed to underside of concrete slab with 9 thick FC lining to underside of slab (quantity measured to u/s of slab)	126	m2		
12.51	Partition system comprising 92 stud fixed to underside of concrete slab with 9 thick FC lining to underside of slab (quantity measured to u/s of slab)	105	m2		
12.52	Allow for additional marine-ply noggings to enable satisfactory fixing behind all fixtures	1	Item		
12.53	INSULATION AND SARKING				



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**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
12	PARTITIONS & LININGS				(Continued)
12.54	CSR Bradford insulation or equal approved comprising 90 thick R2.2 minimum Acoustigard wall batts fixed within walls in accordance with manufacturers recommendations and as specified				
12.55	90 thick wall insulation to internal partitions	70	m2		
12.56	CSR Bradford insulation or equal approved comprising 90 thick R2.7 Gold High Performance wall batts fixed within walls in accordance with manufacturers recommendations and as specified				
12.57	90 thick wall insulation to partition types (inside face of blockwork walls)	231	m2		
12.58	CSR Bradford insulation or equal approved comprising 25 thick Acoustigard 18 wall insulation fixed to and including Rondo clips and furring channels in accordance with manufacturers recommendations and as specified				
12.59	25 thick wall insulation to partition (inside face of blockwork walls)	105	m2		
12.60	CSR Bradford vapour permeable insulation or equal approved comprising 'Polyair Performa 8.0 XHD' wall sarking fixed in accordance with manufacturers recommendations and as specified				
12.61	Vapour barrier sarking to outer face of metal stud walls behind blockwork	231	m2		
12.62	WALL TRIMS AND SKIRTING				
12.63	Window reveal comprising fibre cement lining to sides and head complete with square set finish as per Dwg A410	27	m		
12.64	Window sill comprising 25 thick MDF as per Dwg A410	9	m		



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**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
12	PARTITIONS & LININGS				(Continued)

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PARTITIONS & LININGS Carried to Summary:



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
13	CEILINGS				
13.1	GENERALLY				
13.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
13.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
13.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
13.5	SPECIFICATION				
13.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
13.7	DRAWINGS				
13.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
13.9	PREAMBLE				
13.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
13.11	Suspended ceilings shall include for the type and spacing of supporting metalwork, method of securing brackets hangers, seismic loads and similar items.		item		
13.12	The method of securing brackets and hangers to any background.		item		
13.13	Metal trims, reinforcement and similar to external angles, internal angles, shadow line angles, edges etc. to suspended ceilings and linings.		item		
13.14	Cutting and making good around sprinkler heads, pipes and the like		item		
13.15	Openings for access panels, lighting recesses, air grilles and the like		item		
13.16	Junction of ceilings with walls, columns, pelmets and the like including any cutting, edge trims, accessories, shadowline angles and additional suspension		item		
13.17	All necessary sealants, caulking, acoustic and fire rated seals and fillers and all similar accessories.		item		
13.18	All necessary elements to achieve the acoustic requirements.		item		
13.19	All necessary seismic restraints and seismic certification.		item		
13.20	Expansion joints, control joints and similar		item		
13.21	Access panels and hatches including necessary battens, fasteners and edge trims		item		
13.22	Shop drawings		item		
13.23	Quality assurance		item		
13.24	Data submission		item		
13.25	Maintenance manual		item		
13.26	Samples		item		
13.27	Tests		item		



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
13	CEILINGS				(Continued)
13.28	Inspections		item		
13.29	Prototypes		item		
13.30	Supply of spare tiles and accessories		item		
13.31	Protection		item		
13.32	Warranties		item		
13.33	Seismic requirements		item		
13.34	Allow for stainless steel trims to joints, junctions and corners		item		
13.35	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
13.36	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
13.37	SUSPENDED CEILING SYSTEM				
13.38	Suspended ceiling system comprising 9 thick fibre cement lining with flush set joints fixed to and including concealed suspension system as specified				
13.39	Suspended ceiling system, 0-1000 below structure (FC1 & FC2)	80	m2		
13.40	Suspended acoustic tiled ceiling system comprising 'Armstrong RH100 Bioguard OP' system with 'BP1611G' anti-microbial tiles and 'Peakform' suspension grid system as specified				
13.41	Suspended ceiling system, 0-1000 below structure (ACT1)	68	m2		
13.42	BULKHEADS				
13.43	Bulkhead comprising square set 9 thick fibre cement lining fixed on and including supporting framing system as specified				
13.44	Vertical bulkhead 250-500 high (BHD)	5	m		
13.45	INSULATION				
13.46	CSR Bradford insulation comprising 75 thick Supertel R2.2 with Thermoseal 750 heavy duty foil laminate or equal approved insulation fixed to concrete slab in accordance with manufacturers recommendations and nominated fasteners and anchors as specified				
13.47	75 thick ceiling insulation fixed to underside of slab (INS-S)	73	m2		
13.48	CSR Bradford insulation comprising 40 thick Supertel R1.2 with Thermoseal 730 medium duty foil laminate or equal approved insulation fixed to concrete slab in accordance with manufacturers recommendations and nominated fasteners and anchors as specified				
13.49	40 thick ceiling insulation fixed to underside of concrete roof slab (INS-R)	135	m2		
13.50	ACCESS PANELS				
13.51	Access panel system complete with provision for roof access ladder (ladder measured in metalwork) and weatherproof sliding cover on roof side of hatch including all necessary framing, trims, fittings, hardware and similar as specified				
13.52	Access panel for roof access ladder including sliding cover as detailed on Dwg A380	1	no		
13.53	Access panel system to match ceiling including all necessary framing, trims, fittings, hardware and similar as specified				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
13	CEILINGS				(Continued)
13.54	450 x 450 access panel to fibre cement flush set ceiling	3	no		
13.55	600 x 600 access panel to fibre cement flush set ceiling	1	no		



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**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
13	CEILINGS					(Continued)

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**CEILINGS** 

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Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
14	ALUMINIUM WINDOWS & DOORS				
14.1	GENERALLY				
14.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
14.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
14.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
14.5	SPECIFICATION				
14.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
14.7	DRAWINGS				
14.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
14.9	PREAMBLE				
14.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
14.11	All cover plates, reveal capping and trims, flashings, coloured caulking, backing rods, etc. as required by the drawings and as specified between units, at junctions with adjacent structure etc.		item		
14.12	All necessary aluminium, steel or timber angles, trims, beads, plates, packers and blocks, fixings and accessories.		item		
14.13	All fixing of units to surrounding substrate of whatever nature including all brackets and fasteners.		item		
14.14	All standard and non-standard sill and sub-sill sections, end closure pieces and the like as shown and detailed on the drawings.		item		
14.15	Hardware to windows including hinges, locks, weather seals, sash operators, sliding tracks, handles and the like.		item		
14.16	Isolation of dissimilar materials including weather seal gasket separation strips.		item		
14.17	Cleaning down upon completion including removing all temporary protective coatings.		item		
14.18	Under flashing and flashings to heads, jambs and sills and their building in.		item		
14.19	Weatherstrips, weather bars, weather moulds, stops, packers and the like.		item		
14.20	All glass, glazing and glazing compounds, sealant and caulking and pointing, gaskets, glazing tapes, spacing strips, spacing tapes, spacers, setting blocks, compression wedges and the like.		item		
14.21	Matching cover plate fixed between glass louvre window system and glass window system		item		
14.22	All safety marking.		item		
14.23	Samples and prototypes		item		
14.24	Inspections		item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
14	ALUMINIUM WINDOWS & DOORS				(Continued)
14.25	Submissions		item		
14.26	Shop drawings		item		
14.27	Design, testing and certifications		item		
14.28	Warranties and guarantees		item		
14.29	Maintenance manuals		item		
14.30	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
14.31	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
14.32	INTERNAL GLAZING UNITS				
14.33	Internal glazing system 'BrisAluminium Supreme 92' or equal approved with powdercoat finish and glass thickness as specified and fixed in accordance with manufacturers instructions and as specified				
14.34	Window unit 2100 x 600 high overall	1	no		
14.35	Window unit 2100 x 1600 high overall	1	no		
14.36	EXTERNAL GLAZING UNITS				
14.37	Aluminium framed glazing units 'Alspec glazing with Alspec Hunter Evo 150 framing' or equal approved with powdercoat finish and with Modern Glass as specified and fixed in accordance with manufacturers instructions and as specified				
14.38	Window unit 600 x 1800 high overall	2	no		
14.39	Window unit 2410 x 1800 high overall	3	no		
14.40	SUNDRY ITEMS				
14.41	Safety film '3M Fasara' glazing film as specified	1	m2		
14.42	Safety film '3M Fasara' glazing film in a band as specified	2	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

 Code
 Description
 Quantity
 Unit
 Rate
 Total

 14
 ALUMINIUM WINDOWS & DOORS
 (Continued)

#### COLLECTION

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**ALUMINIUM WINDOWS & DOORS** Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
15	DOORS & HARDWARE				
15.1	GENERALLY				
15.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
15.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
15.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
15.5	SPECIFICATION				
15.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
15.7	DRAWINGS				
15.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
15.9	PREAMBLE				
15.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
15.11	Fabricating door frames to the required profile and dimensions to suit thickness of the door and the wall, framing, linings etc in which it is to be fixed		item		
15.12	Grout filling to door frames and all sealants, insulation packed into frames, fixings and all other sundries and accessories required		item		
15.13	Glass and glazing to glazed panels including fixing in position, timber sub-frame around openings for glazing and louvres		item		
15.14	Weatherstrips, weather bars, weather moulds, stops, fixing angles, packers and the like		item		
15.15	Fixing hardware to any background		item		
15.16	Samples and prototypes		item		
15.17	Design, testing and certifications		item		
15.18	Submissions		item		
15.19	Provision of a key schedule		item		
15.20	Maintenance manuals		item		
15.21	Warranties		item		
15.22	Master keying, keying alike, construction keying or similar systems for the keying of locks		item		
15.23	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
15.24	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
15.25	FIRE RATED TIMBER DOORS				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
15	DOORS & HARDWARE				(Continued)
15.26	Fire door and frame set 'Pyropanel or equal approved' comprising 48 thick fire rated solid core door, sheeted both sides with 4.0 thick exterior grade plywood and 1.5 thick minimum steel door frames as specified				
15.27	Door 920 x 2040 high	2	no		
15.28	TIMBER DOORS				
15.29	40-45 thick solid core door sheeted both sides with 4 thick exterior grade plywood including minimum 10 thick edge strips to all edges as specified				
15.30	Door 770 x 1200 high	1	no		
15.31	Door 770 x 2040 high	1	no		
15.32	Door 820 x 2040 high	1	no		
15.33	Door 920 x 2040 high	6	no		
15.34	Door 920 x 2040 high with mechanical grille	2	no		
15.35	Door 920 x 2040 high with viewing panel	3	no		
15.36	Door 970 x 2040 high	2	no		
15.37	Pairs of doors 1840 x 2040 high with equal leaves	1	no		
15.38	METAL DOOR FRAMES				
15.39	Steel door frame 1.1 thick minimum internal and 1.6 thick minimum external comprising head and jambs including latch keeps, striking plates and similar items				
15.40	Frame to suit door 770 x 1200 high, external	1	no		
15.41	Frame to suit door 770 x 2040 high	1	no		
15.42	Frame to suit door 820 x 2040 high	1	no		
15.43	Frame to suit door 920 x 2040 high	9	no		
15.44	Frame to suit door 920 x 2040 high, external	2	no		
15.45	Frame to suit door 970 x 2040 high	1	no		
15.46	Frame to suit door 970 x 2040 high, external	1	no		
15.47	Frame to suit pair of doors 1840 x 2040 high with equal leaves	1	no		
15.48	DOOR HARDWARE				
15.49	Allow for door hardware comprising hinges, closers, locks, furniture, hooks, bolts, catches, stops, threshold plates, electric strikes, smoke seals, acoustic seals and kickplates to doors including master keying	1	item		
15.50	ACCORDIAN DOOR				
15.51	Accordian door 'Unifold Soundguard 40' to suit space 2030 long x 2400 high comprising 12 thick HMR MDF with selected finish, fixed to and including track, head and jambs as detailed on Dwg A500	2	no		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
15	DOORS & HARDWARE					(Continued)

#### COLLECTION

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DOORS & HARDWARE Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
16	RESILENT FINISHES				
16.1	GENERALLY				
16.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
16.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
16.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
16.5	SPECIFICATION				
16.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
16.7	DRAWINGS				
16.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
16.9	PREAMBLE				
16.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
16.11	Floor finishes shall include for all base treatment and preparation		item		
16.12	All raking and circular cutting		item		
16.13	Floor finishes shall be deemed to include for any width of carpet and sheeting required		item		
16.14	Internal and external angles to skirtings		item		
16.15	Stop ends and outlets to channels, ducts and similar items		item		
16.16	Expansion joints, control joints, movement joints and similar items to sheet and carpet finishes		item		
16.17	Cover strips, wall trims, division strips, joints and general accessories		item		
16.18	Sealants and similar accessories to floor finishes		item		
16.19	Inspections		item		
16.20	Submissions		item		
16.21	Provision of samples		item		
16.22	Warranties		item		
16.23	Maintenance manuals		item		
16.24	Spares (minimum 1% of total quantity installed)		item		
16.25	Substrate leveling as required		item		
16.26	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
16.27	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
16.28	RESILIENT FINISHES				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

thick acoustic vinyl flooring 'Gerflor Taralay Impressions' with R10 finish dwelded butt joints fixed with approved adhesive in accordance with inufacturer's recommendations  byl flooring including any necessary preparation work and leveling impound applied to substrate (RF1,2,3)  byl flooring including any necessary preparation work and leveling impound applied to substrate (RF7,8)  byl flooring applied to stairs and landing including any necessary exparation work and leveling compound applied to substrate (RF1)  by high skirting to match above  by thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations  byl safety flooring laid to falls and/or cross falls including any necessary	70 26 20 110	m2 m2 m2		(Continued)
d welded butt joints fixed with approved adhesive in accordance with unufacturer's recommendations  anyl flooring including any necessary preparation work and leveling mpound applied to substrate (RF1,2,3)  anyl flooring including any necessary preparation work and leveling mpound applied to substrate (RF7,8)  anyl flooring applied to stairs and landing including any necessary exparation work and leveling compound applied to substrate (RF1)  by high skirting to match above  a thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations  by safety flooring laid to falls and/or cross falls including any necessary	26	m2 m2		
mpound applied to substrate (RF1,2,3)  nyl flooring including any necessary preparation work and leveling mpound applied to substrate (RF7,8)  nyl flooring applied to stairs and landing including any necessary eparation work and leveling compound applied to substrate (RF1)  nyl high skirting to match above  nyl thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations  nyl safety flooring laid to falls and/or cross falls including any necessary	26	m2 m2		
inpound applied to substrate (RF7,8)  Inly flooring applied to stairs and landing including any necessary exparation work and leveling compound applied to substrate (RF1)  In high skirting to match above  In thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations  In safety flooring laid to falls and/or cross falls including any necessary	20	m2		
D high skirting to match above  Thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations  Thick safety flooring laid to falls and/or cross falls including any necessary				
thick safety vinyl flooring 'Gerflor Ultra' with welded butt joints fixed with proved adhesive in accordance with manufacturer's recommendations by safety flooring laid to falls and/or cross falls including any necessary	110	m		
oroved adhesive in accordance with manufacturer's recommendations  anyl safety flooring laid to falls and/or cross falls including any necessary		1		
eparation work and leveling compound applied to substrate (RF4)	2	m2		
0 high coved skirting to match above	4	m		
thick anti-static vinyl flooring 'Mipolam Affinity EL7' with R10 finish and lded butt joints fixed with approved adhesive in accordance with inufacturer's recommendations				
nyl anti-static flooring including any necessary preparation work and leveling mpound applied to substrate (RF5)	20	m2		
0 high skirting to match above	38	m		
nyl wall sheeting 'Gerflor Mural Calypso' fixed with approved adhesive in cordance with manufacturer's recommendations				
nyl wall sheeting (WV1)	5	m2		
NDRIES				
trance mat 'Miliken Ontera OBEX' complete with aluminium frame as ecified (EM1)	10	m2		
aille tactile signs' ceramic tactile 300 x 300 laid in 300mm wide strips as ecified	11	m		
ton 'Polypad' rubber tactile 300 x 600 laid in 300mm wide strips as specified	3	m		
tham' or equal approved external stair nosing as specified (NS1)	8	m		
	27	m		
tie	NDRIES  rance mat 'Miliken Ontera OBEX' complete with aluminium frame as cified (EM1)  ille tactile signs' ceramic tactile 300 x 300 laid in 300mm wide strips as cified on 'Polypad' rubber tactile 300 x 600 laid in 300mm wide strips as specified	yl wall sheeting (WV1)  NDRIES  rance mat 'Miliken Ontera OBEX' complete with aluminium frame as cified (EM1)  ille tactile signs' ceramic tactile 300 x 300 laid in 300mm wide strips as cified  on 'Polypad' rubber tactile 300 x 600 laid in 300mm wide strips as specified  nam' or equal approved external stair nosing as specified (NS1)  dsafe' or equal approved internal stair nosing to vinyl flooring as specified  27	NDRIES  rance mat 'Miliken Ontera OBEX' complete with aluminium frame as cified (EM1)  ille tactile signs' ceramic tactile 300 x 300 laid in 300mm wide strips as cified  on 'Polypad' rubber tactile 300 x 600 laid in 300mm wide strips as specified  anam' or equal approved external stair nosing as specified (NS1)  dsafe' or equal approved internal stair nosing to vinyl flooring as specified  7 m	NDRIES  rance mat 'Miliken Ontera OBEX' complete with aluminium frame as cified (EM1)  ille tactile signs' ceramic tactile 300 x 300 laid in 300mm wide strips as cified  on 'Polypad' rubber tactile 300 x 600 laid in 300mm wide strips as specified  anam' or equal approved external stair nosing as specified (NS1)  dsafe' or equal approved internal stair nosing to vinyl flooring as specified  7 m



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
16	RESILENT FINISHES					(Continued)

#### COLLECTION

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RESILENT FINISHES Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
17	TILING				
17.1	GENERALLY				
17.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
17.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
17.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
17.5	SPECIFICATION				
17.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
17.7	DRAWINGS				
17.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
17.9	PREAMBLE				
17.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
17.11	Tiling shall include for all base treatment and preparation.		item		
17.12	All raking and circular cutting to tile and stone finishes.		item		
17.13	Internal and external angles.		item		
17.14	Tiling shall include for trims, special edge finished tiles and finishes to all exposed tile edges		item		
17.15	Expansion joints, control joints, movement joints and similar items to tiling.		item		
17.16	Sealants and similar accessories to tiling.		item		
17.17	Inspections		item		
17.18	Submissions		item		
17.19	Provision of samples		item		
17.20	Spares (minimum 1% of total quantity installed)		item		
17.21	Operation and maintenance manuals		item		
17.22	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
17.23	FLOOR & WALL TILES				
17.24	Metz 'Artistry Pearl' 300 x 300 floor tile with P5/R12 microgrip finish fixed with approved adhesive and Kerapoxy grout as specified (Note: bonded screed bed part of the waterproofing system)				
17.25	Internal floor tiling graded to falls and/or cross falls (FT1)	14	m2		
17.26	External floor tiling graded to falls and/or cross falls (FT1)	16	m2		
17.27	External 150 high skirting tile (FT1)	20	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
17	TILING				(Continued)
17.28	Metz 'Europave Cove Grigio'200 x 105 coved skirting tile with approved adhesive and grout as specified				
17.29	Coved skirting tile (SK2)	20	m		
17.30	Metz 'Artistry White' 300 x 600 wall tiles with Plain P1 finish fixed with approved adhesive and grout as specified				
17.31	600 x 300 wall tiles (WT1)	51	m2		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Desci	iption Quantity	Unit	Rate	Total
17	TILING				(Continued)

#### COLLECTION

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**TILING** 

**Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
18	PAINTING				
18.1	GENERALLY				
18.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
18.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
18.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
18.5	SPECIFICATION				
18.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
18.7	DRAWINGS				
18.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
18.9	PREAMBLE				
18.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
18.11	Painting to ceilings at any height.		item		
18.12	Painting shall include for all preparatory work.		item		
18.13	Painting systems shall include for all necessary primers, undercoats, sealers and finishing coats as required to complete the paint system as specified.		item		
18.14	Painting to door frames shall include for all frames irrespective of girth.		item		
18.15	Making good pre-primed surfaces before applying the paint system.		item		
18.16	Painting to stopping beads, shadowline edge trims and all other trims to ceilings, partitions and walls.		item		
18.17	Painting to circular work.		item		
18.18	Provision of sample finishes, colours and similar.		item		
18.19	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
18.20	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
18.21	INTERNAL & EXTERNAL PAINTING				
18.22	Prepare and apply specified Dulux Professional Interior paint system to the following				
18.23	Internal fibre cement wall lining including chair rail	356	m2		
18.24	Internal fibre cement ceiling lining including bulkheads and access panels	82	m2		
18.25	Internal fibre cement window sill and reveal, 0-250 high	35	m		
18.26	Timber doors including frame, generally	20	no		
18.27	Dulux system comprising Professional Total Prep primer and two coats of Dulux Wash & Wear Low Sheen				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
18	PAINTING				(Continued)
18.28	Internal blockwork walls	120	m2		
18.29	Internal concrete column	2	m2		
18.30	Internal concrete stair soffits	14	m2		
18.31	External concrete soffits	3	m2		
18.32	Dulux system comprising prep coat AcraTex Renderwall Float Finish, primer AcraTex Green Render Sealer and two coats AcraTex AcraShield Advance				
18.33	Internal blockwork walls	34	m2		
18.34	Dulux system comprising two coats AcraTex Sedona with fine-medium texture roller finish and final coat AcraTex AcraShield Advance Matt				
18.35	External blockwork walls	580	m2		
18.36	External concrete roof	5	m2		
18.37	External concrete slab edges	20	m2		
18.38	Dulux system comprising prep coat AcraTex Tiltwash Cleaner, primer AcraTex Green Render Sealer and two coats AcraTex AcraShield Advance				
18.39	Internal concrete columns	4	m2		
18.40	APPLIED FINISHES				
18.41	Dulux system comprising anti-graffiti two coats App Surfaceshield HD Clear				
18.42	Internal blockwork walls	141	m2		
18.43	External blockwork walls	296	m2		
18.44	Parchem 'Fosroc Nitoflr FC100' floor sealer as specified and applied in accordance with manufacturer's instructions				
18.45	Sealer to concrete slab (AFP1)	92	m2		
18.46	Sealer to internal blockwork walls, 100 high turn-up	66	m		
18.47	DryTreat 'Stainproof' floor sealer as specified and applied in accordance with manufacturer's instructions				
18.48	Sealer to concrete slab (BFC)	146	m2		
18.49	OTHER FINISHES				
18.50	Allow for an necessary line marking including disabled parking, loading and disable zones	1	item		
18.51	Allow for an necessary painting to metalwork items not already powdercoated	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
18 PAINTING					(Continued)

#### COLLECTION

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**PAINTING** 

**Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
19	SUNDRY HARDWARE				
19.1	GENERALLY				
19.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
19.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
19.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
19.5	SPECIFICATION				
19.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
19.7	DRAWINGS				
19.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
19.9	PREAMBLE				
19.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
19.11	Fixing of items, including all necessary screws, bolts (including nuts and any type of washer which may be required) and other fixing devices		item		
19.12	Drilling for bolts and drilling structure for patent expanding masonry anchors and the like		item		
19.13	Grouting, including forming all necessary mortices, rebates, etc		item		
19.14	All necessary seismic restraints and seismic certification.		item		
19.15	Wrapping finished work with paper, coating with grease or carrying out such other protective measures as may be required and for removing and cleaning on completion		item		
19.16	Guarantees		item		
19.17	Submissions		item		
19.18	Inspections		item		
19.19	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
19.20	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
19.21	SUNDRY HARDWARE				
19.22	Allow to supply and install the following as specified				
19.23	JD Macdonald 'JDM-GTP-8' stainless steel PWD grab rail set (965 x 600 with additional 300 long) with concealed fixings	2	no		
19.24	JD Macdonald stainless steel Shower grab rail set (pair of 450 x 450 L-shaped rails) with concealed fixings	2	no		
19.25	Bobrick 'B6999.60' toilet roll holder (TRH1)	2	no		
19.26	Bobrick 'B4112-316' soap dispenser (SD1)	2	no		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
19	SUNDRY HARDWARE				(Continued)
19.27	Bobrick 'B369039' paper towel dispenser (PTD1)	2	no		
19.28	Britex 'Shelf-S' cleaners wall shelf 600 x 325 wide (CSH1)	1	no		
19.29	Britex 'BTX-11-014' wall mounted shower seat 960 x 400 wide (SHRS)	2	no		
19.30	Bobrick 'B6827' coat hook (CHK)	4	no		
19.31	Bobrick 'B680' soap dish (SH1)	2	no		
19.32	RBA 'RBA4177-128' shower rod and track 1200 x 1200 wide with ceiling support and Taffeta shower curtain (SHRCUR1)	2	no		
19.33	Hafele broomstick holder 480 long with three movable clamps (BR1)	1	no		
19.34	Polytec mirror 450 x 1000 high (MR1)	2	no		
19.35	BLINDS				
19.36	Verosol R200.0 ambience semi-transparent manual roller blind including fascia as detailed on Dwg A330				
19.37	Blinds to suit window opening 2410 wide x 1800 long (BL1)	1	no		
19.38	Verosol R201.0 ambience with twin roller blinds, a block out roller blind and a semi-transparent roller blind including fascia as detailed on Dwg A330				
19.39	Blinds to suit window opening 2410 wide x 1800 long (BL2)	2	no		
19.40	SIGNAGE				
19.41	Allow for statutory signage as specified in the signage schedule	1	item		
19.42	Allow for building signage as specified in the signage schedule	1	item		
19.43	Allow for all other signage (such as room names etc) as specified in the signage schedule	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
19	SUNDRY HARDWARE					(Continued)

COLLECTION

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**SUNDRY HARDWARE** Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
20	JOINERY & CARPENTRY				
20.1	GENERALLY				
20.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
20.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
20.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
20.5	SPECIFICATION				
20.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
20.7	DRAWINGS				
20.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
20.9	PREAMBLE				
20.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
20.11	Joinery fittings and similar to special design or detail.		item		
20.12	The method of dimensioning and describing joinery fittings herein is not intended to imply any particular method of fabrication or installation procedure.		item		
20.13	All sundry packers required for the complete installation of all items.		item		
20.14	All caulking, sealant, backing rods, accessories, and trims.		item		
20.15	Joinery items and similar shall include for all sizes, priming, painting and finish, the Contractor is referred to the drawings and specification for all details, construction and finish.		item		
20.16	The Contractor will be deemed to have referred to the drawings, specification etc. and prices will deemed to include for everything required to complete the works.		item		
20.17	All necessary seismic restraints and seismic certification.		item		
20.18	All sizes given are approximate only and will be confirmed on site prior to manufacture.		item		
20.19	Inspections		item		
20.20	Submissions		item		
20.21	Providing samples		item		
20.22	Preparation of shop drawings		item		
20.23	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
20.24	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
20.25	JOINERY				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
20	JOINERY & CARPENTRY				(Continued)
20.26	Joinery as per drawings and specification including all necessary trims, hardware, cutlery trays and pull out bins				
20.27	Kitchen bench unit approx. 1500 long x 600 wide x 870 high with benchtop, set of drawers and provision for sink as detailed on Dwg A700	1	no		
20.28	Kitchen overhead unit approx. 1500 long x 300 wide x 900 high with 300 bulkhead to meet flush with ceiling as detailed on Dwg A700	1	no		
20.29	Kitchen cupboard unit 600 long x 600 deep x 2400 high with microwave shelf and bin and 300 bulkhead to meet flush with ceiling as detailed on Dwg A700	1	no		
20.30	Kitchen splashback from LAM2 approx. 1500 long x 600 high as detailed on Dwg A700	1	no		
20.31	Cleaners Room splashback from LAM7 approx. 1350 long x 1150 high as detailed on Dwg A610	1	no		
20.32	SUNDRY CARPENTRY				
20.33	Feature wall panel comprising 'Easycraft Expression series EX27 MR-CHE' panel system fixed to wall as specified (FWP1)	10	m2		
20.34	Pinnable wall panel comprising 'Acoufelt Fracture chevron series' panels complete with aluminium angle in black finish to perimeter direct fixed to wall lining including any necessary cutouts and trims as detailed on Dwg A331 (PNB1)	13	m2		
20.35	Chair rail approx. 200 high x 25 thick solid timber rail fixed to fibre cement linings with adhesive and screws as specified (CHR1)	47	m		
20.36	Timber capping fixed to top of block wall as detailed on Dwg A350	4	m		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
20	JOINERY & CARPENTRY					(Continued)

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JOINERY & CARPENTRY Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
21	EXTERNAL WORKS				
21.1	NIL, REFER OPTIONAL TRADE				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
21	EXTERNAL WORKS					(Continued)

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**EXTERNAL WORKS Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
22	HYDRAULIC & DRAINAGE SERVICES				
22.1	GENERALLY				
22.2	The Hydraulic and Drainage Installations have been given as items and have not been measured out in detail. Prices for Hydraulic and Drainage Installations will be deemed to include for all work necessary to fully provide and commission the installations in accordance with the drawings and specifications.				
22.3	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
22.4	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
22.5	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
22.6	SPECIFICATION				
22.7	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
22.8	DRAWINGS				
22.9	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
22.10	PREAMBLE				
22.11	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
22.12	Complying with relevant acts, by-laws and regulations.		item		
22.13	Giving notices, obtaining permits, paying fees, obtaining certificates of satisfactory completion issued by a local authority where required and similar, in connection with the installations		item		
22.14	Testing installations		item		
22.15	Sterilizing of installations		item		
22.16	Marking pipes with colour bands, tags, plates, badges or lettering for identification purposes, or with arrows for indicating directions of flow for each type of installation		item		
22.17	Providing as constructed drawings as specified		item		
22.18	Allow for warranties and guarantees		item		
22.19	Providing Operator Training and Maintenance Manuals as specified		item		
22.20	All necessary seismic restraints and seismic certification.		item		
22.21	Maintenance requirements during prescribed maintenance period.		item		
22.22	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
22.23	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
22.24	HYDRAULIC AND DRAINAGE INSTALLATIONS				
22.25	Allow for all hydraulic services	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

Building: Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
22	HYDRAULIC & DRAINAGE SERVICES				(Continued)
22.26	Allow for all drainage services	1	item		
22.27	Allow for all builders work in connection with services	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

 Code
 Description
 Quantity
 Unit
 Rate
 Total

 22
 HYDRAULIC & DRAINAGE SERVICES
 (Continued)

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HYDRAULIC & DRAINAGE SERVICES Carried to Summary:



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
23	FIRE SERVICES				
23.1	GENERALLY				
23.2	The Fire Services Installations have been given as items and have not been measured out in detail. Prices for Fire Services Installations will be deemed to include for all work necessary to fully provide and commission the installations in accordance with the drawings and specifications.				
23.3	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
23.4	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
23.5	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
23.6	SPECIFICATION				
23.7	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
23.8	DRAWINGS				
23.9	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
23.10	PREAMBLE				
23.11	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
23.12	Complying with relevant acts, by-laws and regulations.		item		
23.13	Giving notices, obtaining permits and completion certificates, paying fees and charges in connection with the installations.		item		
23.14	Testing installations		item		
23.15	Samples		item		
23.16	Preparation of as-installed drawings and diagrams and instruction manuals of each installation.		item		
23.17	Maintenance requirements during prescribed maintenance period.		item		
23.18	Allow for warranties and guarantees		item		
23.19	Allow for maintenance manuals		item		
23.20	All necessary seismic restraints and seismic certification.		item		
23.21	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
23.22	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
23.23	FIRE SERVICES INSTALLATIONS				
23.24	Allow for all fire services	1	item		
23.25	Allow for all builders work in connection with services	1	item		



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**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
23	FIRE SERVICES					(Continued)

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FIRE SERVICES Carried to Summary:



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description C	Quantity	Unit	Rate	Total
24	ELECTRICAL SERVICES				
24.1	GENERALLY				
24.2	The Electrical Installations have been given as items and have not been measured out in detail. Prices for Electrical Installations will be deemed to include for all work necessary to fully provide and commission the installations in accordance with the drawings and specifications.				
24.3	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
24.4	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
24.5	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
24.6	SPECIFICATION				
24.7	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
24.8	DRAWINGS				
24.9	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
24.10	PREAMBLE				
24.11	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
24.12	Complying with relevant acts, by-laws and regulations		item		
24.13	Giving notices, obtaining permits and completion certificates, paying fees and charges in connection with the installations		item		
24.14	Testing installations		item		
24.15	Samples		item		
24.16	Preparation of as-installed drawings and diagrams and instruction manuals of each installation		item		
24.17	Maintenance requirements during prescribed maintenance period.		item		
24.18	Allow for warranties and guarantees		item		
24.19	Allow for maintenance manuals		item		
24.20	All necessary seismic restraints and seismic certification.		item		
24.21	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
24.22	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
24.23	ELECTRICAL INSTALLATIONS				
24.24	Allow for all electrical services	1	item		
24.25	Allow for all builders work in connection with services	1	item		



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**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
24	ELECTRICAL SERVICES				(Continued)

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**ELECTRICAL SERVICES**Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
25	MECHANICAL SERVICES				
25.1	GENERALLY				
25.2	The Mechanical Installations have been given as items and have not been measured out in detail. Prices for Mechanical Installations will be deemed to include for all work necessary to fully provide and commission the installations in accordance with the drawings and specifications.				
25.3	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
25.4	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
25.5	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
25.6	SPECIFICATION				
25.7	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
25.8	DRAWINGS				
25.9	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
25.10	PREAMBLE				
25.11	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
25.12	Balancing air conditioning installation and the like.		item		
25.13	Testing installations as required		item		
25.14	Giving notices, obtaining permits and completion certificates, paying fees and charges in connection with the installations		item		
25.15	Preparation of as-installed drawings and diagrams and instruction manuals of each installation.		item		
25.16	Maintenance requirements during prescribed maintenance period.		item		
25.17	Warranties, certifications and guarantees		item		
25.18	Maintenance manuals		item		
25.19	All necessary seismic restraints and seismic certification.		item		
25.20	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
25.21	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
25.22	MECHANICAL INSTALLATIONS				
25.23	Allow for all mechanical services including any gas services	1	item		
25.24	Allow for all builders work in connection with services	1	item		



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**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
25	MECHANICAL SERVICES					(Continued)

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**MECHANICAL SERVICES Carried to Summary:** 



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
26	LIFT SERVICES				
26.1	GENERALLY				
26.2	The Lift Installation have been given as items and have not been measured out in detail. Prices for Lift Installations will be deemed to include for all work necessary to fully provide and commission the installations in accordance with the drawings and specifications.				
26.3	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
26.4	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
26.5	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
26.6	SPECIFICATION				
26.7	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
26.8	DRAWINGS				
26.9	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
26.10	PREAMBLE				
26.11	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
26.12	Complying with relevant acts, by-laws and regulations		item		
26.13	Giving notices, obtaining permits and completion certificates, paying fees and charges in connection with the installations		item		
26.14	Maintenance requirements during prescribed maintenance period.		item		
26.15	Commissioning of phone		item		
26.16	Testing installations as required		item		
26.17	Preparation of as-installed drawings and diagrams and instruction manuals of each installation		item		
26.18	Warranties, certifications and guarantees		item		
26.19	Maintenance manuals		item		
26.20	All necessary seismic restraints and seismic certification.		item		
26.21	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
26.22	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
26.23	LIFT SERVICES INSTALLATIONS				
26.24	Allow for all lift services	1	item		
26.25	Allow for all lift car fitout	1	item		
26.26	Allow for all builders work in connection with services	1	item		



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
26	LIFT SERVICES				(Continued)



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code Unit Rate Description Quantity Total

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**LIFT SERVICES Carried to Summary:** 



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**Building:** Ebeye Emergency Operations Centre

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
27	APPENDICES				
27.1	DOCUMENTATION USED FOR MEASUREMENT				
27.2	These Bills of Quantities have been measured from the drawings and specifications listed below.				
27.3	ARCHITECTURAL DRAWINGS				
27.4	EB-A000 COVER SHEET B TENDER ISSUE - 17/02/2021				
27.5	EB-A001 LEGENDS & GENERAL NOTES B TENDER ISSUE - 17/02/2021				
27.6	EB-A010 SITE MASTER PLAN B TENDER ISSUE - 17/02/2021				
27.7	EB-A015 SITE PLAN B TENDER ISSUE - 17/02/2021				
27.8	EB-A020 SITE PLAN - DEMOLITION D TENDER ISSUE - 01/03/2021				
27.9	EB-A050 VISUALISATION B TENDER ISSUE - 17/02/2021				
27.10	EB-A051 VISUALISATION B TENDER ISSUE - 17/02/2021				
27.11	EB-A110 FLOOR PLAN - LEVEL 01 B TENDER ISSUE - 17/02/2021				
27.12	EB-A111 FLOOR PLAN - LEVEL 02 D TENDER ISSUE - 01/03/2021				
27.13	EB-A120 ROOF AND SLAB PLAN B TENDER ISSUE - 17/02/2021				
27.14	EB-A130 REFLECTED CEILING PLANS B TENDER ISSUE - 17/02/2021				
27.15	EB-A140 STRUCTURAL SETOUT PLANS B TENDER ISSUE - 17/02/2021				
27.16	EB-A160 FINISHES PLANS B TENDER ISSUE - 17/02/2021				
27.17	EB-A200 BUILDING ELEVATIONS B TENDER ISSUE - 17/02/2021				
27.18	EB-A201 BUILDING ELEVATIONS B TENDER ISSUE - 17/02/2021				
27.19	EB-A250 BUILDING SECTIONS B TENDER ISSUE - 17/02/2021				
27.20	EB-A300 WALL SECTION DETAILS B TENDER ISSUE - 17/02/2021				
27.21	EB-A310 SECTION DETAILS B TENDER ISSUE - 17/02/2021				
27.22	EB-A330 INTERNAL DETAILS B TENDER ISSUE - 17/02/2021				
27.23	EB-A331 INTERNAL DETAILS B TENDER ISSUE - 17/02/2021				
27.24	EB-A340 PARTITION DETAILS B TENDER ISSUE - 17/02/2021				
27.25	EB-A341 PARTITION DETAILS B TENDER ISSUE - 17/02/2021				
27.26	EB-A350 STAIR 1 DETAILS B TENDER ISSUE - 17/02/2021				
27.27	EB-A351 STAIR 2 DETAILS B TENDER ISSUE - 17/02/2021				
27.28	EB-A352 STAIR 3 & RAMP DETAILS B TENDER ISSUE - 17/02/2021				
27.29	EB-A360 HANDRAIL & BALUSTRADE DETAILS B TENDER ISSUE - 17/02/2021				
27.30	EB-A361 STAIR DETAILS B TENDER ISSUE - 17/02/2021				
27.31	EB-A370 WINDOW SCREEN DETAILS B TENDER ISSUE - 17/02/2021				
27.32	EB-A371 WINDOW SCREEN DETAILS B TENDER ISSUE - 17/02/2021				
27.33	EB-A372 MECHANICAL SCREEN DETAILS B TENDER ISSUE - 17/02/2021				
27.34	EB-A380 PREFABRICATED ACCESS LADDERS B TENDER ISSUE - 17/02/2021				



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**Building:** Ebeye Emergency Operations Centre

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Code	Description	Quantity	Unit	Rate	Total
27	APPENDICES				(Continued)
27.35	EB-A400 WINDOW SCHEDULE B TENDER ISSUE - 17/02/2021				
27.36	EB-A410 WINDOW DETAILS B TENDER ISSUE - 17/02/2021				
27.37	EB-A450 DOOR SCHEDULE B TENDER ISSUE - 17/02/2021				
27.38	EB-A500 ROOM DETAIL SHEET D TENDER ISSUE - 01/03/2021				
27.39	EB-A610 WET AREA DETAIL B TENDER ISSUE - 17/02/2021				
27.40	EB-A700 JOINERY DETAILS B TENDER ISSUE - 17/02/2021				
27.41	EB-A701 JOINERY DETAILS B TENDER ISSUE - 17/02/2021				
27.42	SPECIFICATIONS & SCHEDULES				
27.43	20343 RMI EOC EBEYE - Architectural Specification (B)				
27.44	20347 RMI EOC EBEYE - Exterior Finishes Schedule (B)				
27.45	20347 RMI EOC EBEYE - Fixtures and Equipment Schedule [B]				
27.46	20347 RMI EOC EBEYE - Internal Finishes Schedule [B]				
27.47	20347 RMI EOC EBEYE - Sanitary Schedule [B]				
27.48	CIVIL DRAWINGS				
27.49	EB-C0000 COVER SHEET				
27.50	EB-C0001 PROJECT NOTES				
27.51	EB-C0100 SITE WORKS LAYOUT PLAN				
27.52	EB-C0110 CIVIL WORKS DETAILS SHEET				
27.53	STRUCTURAL DRAWINGS				
27.54	EB-S000 TITLE SHEET AND DRAWING INDEX				
27.55	EB-S005 GENERAL NOTES - SHEET 01				
27.56	EB-S010 TYPICAL FOOTING DETAILS - SHEET 01				
27.57	EB-S020 TYPICAL REINFORCED CONCRETE COLUMN DETAILS - SHEET 01				
27.58	EB-S025 TYPICAL REINFORCED CONCRETE WALL DETAILS - SHEET 01				
27.59	EB-S030 TYPICAL REINFORCED CONCRETE STAIR DETAILS - SHEET 01				
27.60	EB-S040 TYPICAL MASONRY DETAILS - SHEET 01				
27.61	EB-S042 TYPICAL MASONRY DETAILS - SHEET 02				
27.62	EB-S050 TYPICAL LANDSCAPE DETAILS - SHEET 01				
27.63	EB-S060 TYPICAL RAFT SLAB ON GROUND DETAILS - SHEET 01				
27.64	EB-S070 TYPICAL REINFORCED CONCRETE SUSPENED SLAB - SHEET 01				
27.65	EB-S090 TYPICAL STEELWORK DETAILS - SHEET 01				
27.66	EB-S200 FOUNDATION PLAN				
27.67	EB-S210 LEVEL 01 - CONCRETE GENERAL ARRANGEMENT PLAN				
27.68	EB-S215 LEVEL 01 - SECTION & DETAILS				
27.69	EB-S220 LEVEL 02 - CONCRETE GENERAL ARRANGEMENT PLAN				



Project: UNDP Enhancing Disaster+Climate Resilence

**Building:** Ebeye Emergency Operations Centre

Details: National Disaster Management Office -

Ebeye Island, Kwajalein Atoll

Code	Description	Quantity	Unit	Rate	Total
27	APPENDICES	<b>.</b>			(Continued)
27.70	EB-S221 LEVEL 02 - BOTTOM REINFORCEMENT PLAN				
27.71	EB-S222 LEVEL 02 - TOP REINFORCEMENT PLAN				
27.72	EB-S225 LEVEL 02 - SECTION & DETAILS				
27.73	EB-S230 LOWER ROOF - CONCRETE GENERAL ARRANGEMENT PLAN				
27.74	EB-S231 LOWER ROOF - BOTTOM REINFORCEMENT PLAN				
27.75	EB-S232 LOWER ROOF - TOP REINFORCEMENT PLAN				
27.76	EB-S235 LOWER ROOF - SECTION & DETAILS				
27.77	EB-S240 LIGHTWEIGHT UPPER ROOF PLAN				
27.78	HYDRAULIC DRAWINGS				
27.79	EB-H000_B				
27.80	EB-H001_B				
27.81	EB-H101_B				
27.82	EB-H102_B				
27.83	EB-H103_B				
27.84	EB-H201_B				
27.85	EB-H202_B				
27.86	FIRE DRAWINGS				
27.87	EB-F001_A				
27.88	EB-F002_A				
27.89	EB-F003_A				
27.90	EB-F101_B				
27.91	EB-F102_B				
27.92	EB-F103_A				
27.93	ELECTRICAL DRAWINGS				
27.94	EB-E000_B				
27.95	EB-E001_B				
27.96	EB-E003_A				
27.97	EB-E100_C				
27.98	EB-E101_C				
27.99	EB-E102_C				
27.10 0	EB-E103_C				
27.10 1	EB-E200_B				
27.10 2	EB-E300_C				
27.10 3	MECHANICAL DRAWINGS				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
27	APPENDICES				(Continued)
27.10 4	EB-M000_B				
27.10 5	EB-M001_B				
27.10 6	EB-M002_B				
27.10 7	EB-M003_A				
27.10 8	EB-M100_B				
27.10 9	EB-M101_B				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre Ebeye Island, Kwajalein Atoll

Code		Description	Quantity	Unit	Rate	Total
27	APPENDICES					(Continued)

#### COLLECTION

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**APPENDICES** 

**Carried to Summary:** 



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
28	OPTIONAL ITEMS				
28.1	GENERALLY				
28.2	Under the terms of the contract, no adjustment to the contract sum will be made for any errors in this Bill of Quantities.				
28.3	The drawings and specifications constituting the tender documents define the scope of works. Tenderers must satisfy themselves of the adequacy of the descriptions and quantities contained within this Bill of Quantities.				
28.4	M5 Advisors Pty Ltd accepts no liability for any reliance on or use of the Bill of Quantities by any party.				
28.5	SPECIFICATION				
28.6	The Contractor is referred to the relevant specification sections for full particulars and will be deemed to have allowed here or in the measurement rates for all costs in connection therewith.				
28.7	DRAWINGS				
28.8	The Contractor is referred to the Drawing Schedule attached to the back of the Bill of Quantities for the drawings and their revision or issue references used in the preparation of this document.				
28.9	PREAMBLE				
28.10	Allow in the following items or in the rates of measured items for all costs incurred in executing the works in accordance with the intent of the drawings and specifications				
28.11	Fixing of items, including all necessary screws, bolts (including nuts and any type of washer which may be required) and other fixing devices		item		
28.12	Drilling for bolts and drilling structure for patent expanding masonry anchors and the like		item		
28.13	Grouting, including forming all necessary mortices, rebates, etc		item		
28.14	Wrapping finished work with paper, coating with grease or carrying out such other protective measures as may be required and for removing and cleaning on completion		item		
28.15	Guarantees		item		
28.16	Submissions		item		
28.17	Inspections		item		
28.18	Allow for any additional costs necessary to complete the works and for which no specific provision is included for pricing elsewhere		item		
28.19	All necessary handling, shipping, logistics and freight including related fees and charges to ensure satisfactory completion of these works		item		
28.20	OPTIONAL PRICING				
28.21	The following items are to be priced for clients consideration inclusive of all necessary builders preliminaries and margin, as these items may be adopted within this contract or considered within a separate contract				
28.22	Option 1 for vehicular concrete pavement (nominated as blue colour) including all necessary preparation, subgrade and base course, and all necessary line marking, kerbs, grated drains and joints to complete the pavement construction - refer below to assist in pricing	1	item		
28.23	Option 1 - Vehicular Concrete Pavement				



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

**Building:** Ebeye Emergency Operations Centre

Code	Description	Quantity	Unit	Rate	Total
28	OPTIONAL ITEMS				(Continued)
28.24	Vehicular concrete pavement comprising 180 thick 25MPa concrete pavement with SL82 reinforcement, 150 thick Type 2.3 (CBR45%) base compacted to minimum 95% M.D.D and sub-grade (CBR3%) compacted to 98% standard dry density as detailed on Dwg C0110				
28.25	Vehicular concrete pavement to external driveway	68	m2		
28.26	Sawn joints as typical detail on Dwg C0110	19	m		
28.27	Allow for all expansion and isolation joints as typical details on Dwg C0110	1	item		
28.28	Note: concrete grated inlet pit part of civil drainage works		note		
28.29	Kerb and channel comprising 25MPa concrete with reinforcement as required, minimum 75 thick Type 2.3 (CBR45%) base compacted to minimum 95% M.D.D and sub-grade (CBR3%) compacted to 98% standard dry density including subsoil drainage as required, refer typical details on Dwg C0110				
28.30	Barrier kerb and channel 450 wide x 300 deep (BKC)	71	m		



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Code	Description	Quantity	Unit	Rate	Total
28	OPTIONAL ITEMS				(Continued)

#### COLLECTION

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OPTIONAL ITEMS Carried to Summary:



Project: UNDP Enhancing Disaster+Climate Resilence Details: National Disaster Management Office -

Building: Ebeye Emergency Operations Centre

Code Description Quantity Unit Rate To	Total
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