

TENDER/BID ADDENDUM: 02

BID REF NO: ORTIA7282/2023/RFP

REPLACEMENT OF NAVIGATIONAL AIDS FIBRE OPTIC CABLE WITHIN A PERIOD OF 12 MONTHS AT O R TAMBO INTERNATIONAL AIRPORT.

Important: Bidders are required to acknowledge this Addendum in their bid submission in table for **RECORD OF ADDENDA TO TENDER DOCUMENTS**.

Bidders to take note of the following changes to the bid document and it's appendices.

Scope of Works: (Appendix 1 – Contract)

C3.2.4.3 Sleeves/duct – (This clause REPLACES that which is in the bid document-contract appendix)

The sleeves have a diameter related to the number of installed cables in the same sleeve and be installed in a trench 1m below the ground. The sleeves are be manufactured from HDPE corrugated pipe or similar material with a wall thickness of not less than 10mm. The sleeve's connections are specially designed for the application. The trench is be backfilled and compacted with the excavated material with the provision that no stone having any dimension of more than 75mm. Imported soil maybe required to top up areas of sagging. The inner duct shall be made of 4x400mm diameter sleeves with a wall thickness of 4mm.

The trench shall be 300mm wide, 1m deep and approximately 65km long. This translate to approximately $(03 \times 1 \times 65)m^3 \approx 20m^3$ of trench excavations on soft soil.

C3.2.4.4 Drilling under Taxiway/Runway

(This clause REPLACES that which is in the bid document - contract appendix)

The fibre optic communication network crosses underneath 9 taxiways that are 60m in width. Directional bore drilling shall be used to drill underneath at a minimum depth of 1m depending on existing services. The services also run underneath a tunnel linking the Apron A and Apron B, the fibre cable inside the tunnel is mounted on a rack separate from electrical cables. This tunnel provides a link for the AWOS network feeding through new domtex substation and linking the South African Weather.

Drilling underneath a taxiway/runway shall be done at a depth not less than 1m. taxiway are runways ways are finished with a top layer of flexible asphalt, the subgrade is of a high strength ($k=150MN/m^3$) with a California Bearing Ratio (CBR) of 15. Considerations shall be made for hard rock drilling for all areas crossing underneath a taxiway/runway.

C3.2.4.10 Cabinet

(This clause is ADDITIONAL Information to that which is in the bid document - contract appendix)

A new cabinet will be required to terminate all the 2x24core fibre cable at the AGL training room.

Cabinet dimensions:

- Doors shall be Perforated Front & Back Door
- Cabinet depth shall be 1000mm.
- Cabinet height shall be 2055mm.
- Cabinet width shall be 600mm.
- Cabinet shelves shall be 3x full depth shelves.
- Side panels shall Solid Panels - Removable and Lockable.

C2.2 THE BILL OF QUANTITIES (BOQ)

Find below the replacement BOQs for BOQ2 and BOQ3

The BOQs hereafter replaces that which is in the bid document - contract appendix.

BOQ NO2: MATERIAL SUPPLY AND ACCESSORIES (Revised)

Item	Description	Unit	QTY	Rate	Total
2.1	24 core Rodent Proof Optical Fibre	km	65	R	R
2.2	Supply standard patch panel for a 24 core fibre optical cable	Each	14		
2.3	Supply standard patch panel for a 12 core fibre optical cable	Each	12		
2.4	Manholes	Each	35		
2.5	Supply Cable sleeves 110mmx6m	Each	35		
2.6	Machinery to drill under 9 x 60m wide taxiway and laying of duct	Sum	1		
2.7	Dome connectors	Sum	1		
2.8	Fibre optic patch cord	Sum	1		
2.9	Fibre optic pig tails	Sum	1		
2.10	Fiber patch panel cabinet	Each	1		
Sub-Total 2: Carried Forward to Summary					R

BOQ NO3: INSTALLATION AND COMMISSIONING (Revised)

Item	Description	Unit	QTY	Rate	Total
3.1	Provisional Sum: Location and protection of existing underground services and route assessment.	Sum	1	R650 000	R650 000
3.2	Provisional Sum: Issuance of construction drawings and setting out the works with provision GIS coordinates	Sum	1	R950 000	R950 000
3.3	Excavate, laying cable sleeves, back filling and compacting soft soil	Cubic meter	25		
3.4	Installation of manholes	sum	1		
3.5	Fibre installation, splicing and installation of dome connectors	Sum	1		
3.6	Drilling under 9 x 60m wide taxiways	Sum	1		
3.7	Testing and commissioning	Sum	1		
3.8	Installation of Fiber patch panel cabinet	Each	1		
3.9	As-built Documentation	Each	2		
Sub-Total 3: Carried Forward to Summary					R