Coonamble Shire Council

REQUEST FOR TENDER No.TEN230712DJ
VOLUME 1A - Specification

BOX RIDGE ROAD AND GULARGAMBONE ROAD RENEWAL PROJECT

Closing 10 am – Wednesday, 12 July 2023

Version 1.0

Contents

1 Background Information

1.1 Coonamble Shire

Home to 3,907 people, the Coonamble Local Government Area supports 1,416 jobs and has an annual economic output of $400 million.

The Coonamble LGA spans 10,000 square kilometres, from the edge of the Warrumbungle mountain range, across the Castlereagh Plains, to the Macquarie Marshes. Coonamble is 165km north of Dubbo, roughly 6 hours from Sydney and 8 hours from Brisbane.

Coonamble is the centre of a productive agricultural region, based on sustainable, dryland livestock grazing and cropping industries, supported by modern management practices. A robust business sector offers a range of investment and employment opportunities.

1.2 About the Project

Council (the Principal) is seeking Tenders from appropriately qualified and experienced Contractors to conduct a full width rehabilitation which means reconstructing the roads to the new full width and completion of the associated construction work on the all seven road segments along these two roads, as shown in the set of drawings number 11551, produced by Ardill Payne. Both projects are in the vicinity of the regional township of Gulargambone – NSW, which is approximately 46 km south from the Coonamble township.
This set of drawings is attached to the document Vol-1a in Appendix – 1.

Notes:

1. The road chainage 0.00 for Box Ridge Road project starts from the intersection of Castlereagh Hwy and Box Ridge Road. This intersection is shown on Fig. 01.
2. The road chainage 0.00 for Gulargambone road project starts from the intersection of Gulargambone and Bourbah Sts Gulargambone. This intersection is also shown on Fig. 01.
3.

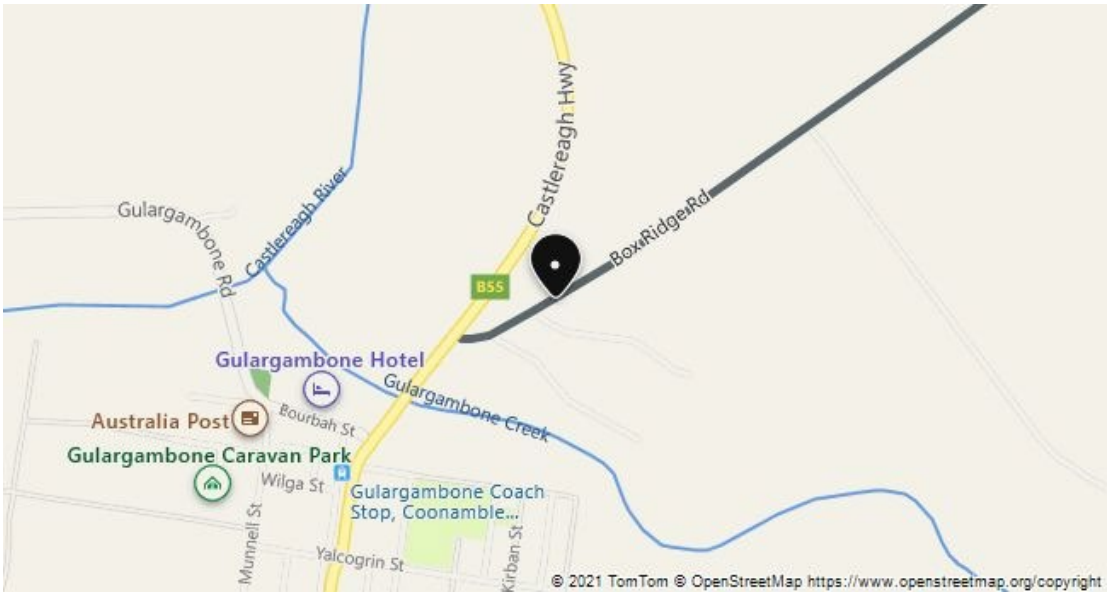

Fig. 01

1.3 Overview of Services Required

This contract includes all aspects scope of work, **including <u>but not restricted</u>:**

- Traffic control, construction plants and machinery,
- Provision/construction of side tracks,
- Construction / installation of the culvert and headwalls and wingwalls,
- Rock protection at the culverts' inlets and outlets
- Road pavement regulation and construction,
- Restoration of site, and
- Everything else which is required for successful completion of the project, materials, and labour to complete the work to the scope, design and standard specified, other than that described (in Ch. 3), which is to be supplied by Coonamble Shire Council.

Note: A thorough scope description for each culvert is given in Chapter 3.

1.4 General Conditions of Contract

Australian Standard AS 4000-1997 General Conditions of Contract will be used for this Project. A copy of AS 4000-1997 has not been included with the Tender documents but is deemed to form part of the Tender documentation.

Copies are available from SAI Global http://infostore.saiglobal.com/store/ .

1.5 Additional Documents

Volume 1a of this Specification includes the following documents:

- **Appendix A** – Full set of design drawings number 11551, issued by Ardill Payne Pty Ltd.
- **Appendix B** – Geotech Report from Macquarie Geotech

2 Technical Specification

The work shall be carried out in accordance with Coonamble Shire Council's Development Construction Specifications.

The Specifications are downloadable using the OneDrive link below:
Specifications

The following specifications are relevant to this project:

- C101 (General)
- C201 (Control of Traffic)
- C211 (Control of Erosion and Sedimentation)
- C212 (Clearing & Grubbing)
- C213 (Earthworks)
- C242 (Flexible Pavements)
- C245 (Asphaltic Concrete)
- C248 (Plain or Reinforced Concrete Base)
- C271 (Minor Concrete Works)
- CQC (Quality Control Requirements)
- CQS (Quality System Requirements)

This is a Lump Sum contract. Pricing schedule is nominated in Volume 3.

Tender prices shall include the provision of all plant, equipment, labour, supervision, applicable materials, testing and quality assurance to carry out the complete project work.

Road base may be purchased from the Council operated quarry on Tooraweenah Rd, at the rate applicable at the time.

NOTES:

1. **This is a Lump Sum contract. Pricing schedule is nominated in Volume 3;**
2. **This project involves road recycling construction methodology only, thus the Ardill Payne drawings are with limited validity - for the overall dimensions of the reconstructed road only, but not for the structural design of the pavement.**
3. **This project is for the re-construction of the pre-determined road segments and the installation of the metal culvert structure and all material and labour to execute and complete the required construction work in accordance with dwg's 11551 produced by Ardill Payne design office.**

3 Job Specific Requirements

3.1 Scope of Works

The site is situated 46 kms from Coonamble, and is situated as shown in the civil design plans in **Appendix A**.

The Scope of Works for the project includes, **but <u>it is not limited</u> to the following:**

- Obtain a Fisheries Permit and comply with conditions of the permit;
- Site establishment;
- Provision of Traffic Control;
- Provide temporary erosion and sediment control;
- Strip, clear and grub current surface;
- Demolish and dispose of current road pavement;
- Excavate, shape, and prepare subgrade for culvert slab and road base;
- Supply, install, and construct culverts & wingwall systems in accordance with construction specifications;
- Install subsoil drainage, as shown in the drawings number 11551 – Ardill Payne;
- Installation of scour protection;
- Supply, place, 2-coat seal (3-coat over the culvert only);
- Line marking activities;
- Installation of signage and guide posts;
- Removal of side track and traffic control;
- Disestablishment.

<u>NOTES:</u>

1. **It is the Contractor's ultimate responsibility to familiarise themselves with all aspect of the project related road recycling construction methodology and quantity of materials and to complete their own checks, in order to complete the project in accordance with road overall dimensions shown in the dwg's 11551 produced by Ardill Payne design office.**
2. **The Contractor will supply all "SINTAKOTE®" metal pipes for the construction of the culvert structures. <u>The Council will not accept any other type of metal pipes or metal pipes from manufacturers other than "Steel Mains";</u>**
3. **The Contractor shall provide geo-textile Bidim or other material in equivalent;**
4. **The Contractor shall provide Rip – Rap protection for both culverts' inlet and the outlet with rock with min. of 300mm dia.**

3.2 Fisheries Permit

The proposed Works may involve dredging and reclamation works and may / will require a permit under Section 200 of the Fisheries Management Act 1994. The Contractor is to apply for and obtain the permit and is to comply with the conditions of the permit.

3.3 Site Preparation

- **The Contractor to prepare the mobile plant(s) necessary for the road recycling**, which would be followed by

- **Proof rolling,** by both pad-foot and smooth drum roller should involve compacting the site with an 8-ton roller, trimming the rolled surface to level and clean finish.
  Note: Where there are areas indicating excessive deflection then these may require over-excavation and backfilling with an approved select material – DGS40.

3.4 Side Track Construction

No side track is required for any culvert reconstruction.
However, the Contractor shall prepare a suitable traffic control plan which would be implemented during the culverts' construction. **This TCP shall be also submitted to the Council for revision and ultimate approval.**

3.5 Culvert Procurement, Installation, & Construction

Culverts procurement process is included in the contract. The Contractor shall procure the culverts pipes and allow to receive and unload the culverts to site, store as necessary, and place on the cost-in-situ base slab. If storage onsite is required, storage shall be in a location agreed to by the Principal and the Contractor.

SITE – 01: In this design/construction site there are two culverts which shall be replaced, as follows:

- The culvert at approx. ch.2.70 – excavate the existing one and replace with a 900mm class 4 RCP pipe of equivalent.
- The culvert at approx. ch.3.90 – excavate the existing culvert and replace it with 450mm Class 4 RCP pipe or equivalent.

Gulargambone Road:

SITE 06: At ch. 630 remove the old culvert and replace it with "400mm Class 4 RCP including headwalls.

Note: Each culvert's inlet and outlet, except the culvert on Site -3 shall include 300mm dia. rock protection with Bidim or similar type of geo-fabrics.

3.6 Reconstruction of Pavement

3.6.1. General Considerations:

The existing seal shall be recycled (milling, stabilising and roll-proofing) for all sites, which are part of this project. Then as a part of the road rehabilitation one recycled layer of material shall apply:

- One layer of min 160mm thick DGB20 to form the base layer, then apply
- Spray sealing: 14/7 DD seal.

Notes:

- Estimated Quantities of this material usage are shown on the design drawings and should be noted as estimates only. **Contractors should complete their own checks for**

the road recycling construction methodology, as no variation for additional road base usage will be considered due to incorrectly scheduled quantities.

- **The reuse of existing road materials in encouraged where sustainable.**
- **Spray sealing: 14/7 DD seal applies to all road rehabilitation surfaces and the resealing only surfaces in this project.**

3.6.2. Re-Sealing Requirements:

The resealing without and other remedial actions is also required at these road sections:

Box Ridge Road:

- **From Ch. 0.00 – 0.600 km from intersection with Castlereagh Hwy;**
- **From Ch. 1.200 – 2.000 km from intersection with Castlereagh Hwy;**
- **From Ch. 4500 – 7.330 km from intersection with Castlereagh Hwy;**

Gulargambone Road:

- **From Ch. 4.1 – 5.743 km from intersection with Bourbah Street, Gulargambone;**

3.6.3. Specific Considerations:

Box Ridge Road:

SITE – 01: It spreads over between ch.2.2 and ch.3.5, from intersection with Castlereagh Hwy, as shown on the drawing 11551 - S1 – C01. The construction work within this site involves full width rehabilitation.
SITE – 02: It spreads over between ch.2.0 and ch.2.2, from intersection with Castlereagh Hwy, as shown on the drawing 11551 – S2 – C01. The construction work within this site involves road widening and sealing.
SITE – 3 – Existing Culvert Upgrade - CANCELLED
SITE – 04: It spreads over between ch.5.1 and ch.6.3, from intersection with Castlereagh Hwy, as shown on the drawing 11551 – S4 – C01. The construction work within this site involves road widening and sealing.
SITE – 05: It spreads over between ch.13.10 and ch.13.67, from intersection with Castlereagh Hwy, as shown on the drawing 11551 – S5 – C01. The construction work within this site involves full width rehabilitation.

Gulargambone Road:

SITE – 06: It spreads over between ch.0.55 and ch.1.45, from intersection with Bourbah St, as shown on the drawing 11551 – S6 – C02. The construction work within this site involves full width rehabilitation.
SITE – 07: It spreads over between ch.1.9 and ch.2.8, from intersection with Bourbah St, as shown on the drawing 11551 – S7 – C02. The construction work within this site involves road widening and sealing.

Notes:

1. The Contractor shall comply with geometrical, strength, materials and other requirements outlined in the Ardell Payne set of drawings 11551. This is particularly important for the seamless transition joint between the existing seal and the newly constructed one – as shown on the corresponding detail on these drawings.
2. In case of any inconsistency between the Council's specifications and the design drawings, then **the Contractor shall contact the Council representatives for this project.**

3.7 Working Areas

The areas of construction works is limited to the Construction sites 1 to 7, as shown on detailed design drawings No 11551 – Ardill Payne.

Notes:

1. The geo-tech report issued by MacQuarie Geotech, shows some slight traces of Sulphate soil only at boreholes BO1 and BO2, which are located at the intersection of Castlereagh Hwy and Box-Ridge Rd. This spot is safely far away from the nearest construction site, the "Stand Alone Culvert" (see p.5). However, should the Contractor find sulphate soils, he should notify the Project Superintendent immediately.
2. Plant shall not be moved beyond this area or parked under the drip lines of trees.
3. The Contractor shall examine the DBYD drawings for all the areas affected by the construction and to advise if the construction work potentially collides with any underground or aboveground services.

4 Requirements Under the Contract

4.1 Project Construction Works Program

The Project Program, as required to be provided in the Response Schedules, must be presented so as to enable Council to make an assessment of the proposed sequence of implementation of the proposed Contract and the estimated duration and completion time for each phase.

The Construction Program should include the sequence of work, the crucial path of activities related to the work, the dates by which or the time within which the various parts of the work are to be executed, and any other information specified to be provided.

4.2 Existing Underground Services

The Contractor is responsible for locating existing underground services and isolating them where necessary to prevent unplanned contact with live services. In doing so, the Contractor must comply with the NSW Government Construction Work Code of Practice.

4.3 Project Quality Management Plan

The successful Contractor must develop and implement a Project Quality Management Plan that complies with the current NSW Government Quality Management Systems Guidelines (QMS Guidelines). The QMS Guidelines are available on the ProcurePoint website.

The Project Quality Management Plan must cover the relevant elements of the Contractor's Quality Management System and include an index of the Contractor's quality procedures and proposed Inspection and Test Plans and associated checklists.

4.4 Inspection and Test Plans

The Contractor must prepare and implement Inspection and Test Plans, complying with the QMS Guidelines, incorporating the Hold and Witness points specified in the Contract and submit to the Principal for revision and approval.

The Contractor must not proceed beyond a Hold Point without endorsement by the Principal or their authorised Representative.

The Principal, at their discretion, may inspect the work at a Witness Point, but work may proceed without endorsement.

Endorsement by the Principal at a Hold or Witness Point does not release the Contractor from their obligations to achieve the specified requirements of the Contract.

The Principal, at their discretion, may undertake surveillance (monitoring) of any or all work associated with the Contract.

4.5 WHS Management Plan

Develop and implement a Project WHS Management Plan that covers the work under the Contract and complies with the NSW Government Work Health and Safety Management Systems and Auditing Guidelines 5th Edition (WHSMS Guidelines).

Prepare and submit Safe Work Method Statements for Council's approval.

4.6 Environmental Management Plan

The contractor must develop and implement an Environmental Management Plan that complies with the current NSW Government Environmental Management Systems Guidelines (EMS Guidelines). The EMS Guidelines are available on the *ProcurePoint* website.

The erosion and sedimentation plan is given for each site in the set of drawings no 11551 – issued by Ardill Payne design office. The Contractor shall implement these erosion and sedimentation plan related activities unconditionally and before the commencement of the site work for each site.

The Contractor shall comply with the NSW Clean Waters Act 1970, the Soil Conservation Act 1938, the Water Act 1912, the Clean Air Act 1961, as amended and the Noise Control Act 1975.

The operation of all motor vehicles and plant must comply with the requirements of the Protection of Environment Operation Act 1997 (POEO).

4.7 Traffic Management Plan

The Contractor shall be responsible for providing a safe work site for the public and site personnel in all conditions. It is the Contractor's responsibility to design and implement the Traffic Management Plan.

A Traffic Management Plan (TMP), for pedestrian and vehicular movements, shall be prepared by an RMS Accredited Prepare a Work Zone Traffic Management Plan person.

Traffic Management will comply with the requirements of Council Specification C201 – Control of Traffic, latest edition of the RMS Manual Traffic Control at Work Sites (Formally RTA) and AS172.3.

Traffic Management Plans shall include traffic control measures and procedures to be implemented during all stages of the work including:

- Identification of requested road closures, including basis of request, duration of closure and works programmed for completion during such closure;
- Methods and labour to ensure safe passage of pedestrians and traffic at all times;
- Details of appropriate signage;
- Temporary delineation;
- Supply and installation of aftercare signs; and
- Take all necessary steps to avoid or minimise delays and inconvenience to road users during the course of the work. Divert all traffic to the side track while the work is in progress.

When developing the Traffic Control Plans, the Contractor shall give careful consideration to the level of visibility, sight distance and advance warning available at the end of queues created as a result of stopping traffic.

The Contractor must submit Traffic Control Plans to Council's Representative for approval within seven (7) days prior to work commencing.

The Traffic Management Plan must be approved by Coonamble Shire Council.