

# PROFESSIONAL SERVICES CONTRACT (CONSTRUCTION INDUSTRY) SCHEDULE 4 – DESCRIPTION OF SERVICES

### M12 MOTORWAY

PROJECT MANAGEMENT SUPPORT SERVICES (ESTIMATING, CONSTRUCTABILITY, SCHEDULING & RISK MANAGEMENT)

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VERSION FOR: M12 Motorway

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## M12 MOTORWAY - PROJECT MANAGEMENT SUPPORT SERVICES (Estimating, Constructability, Scheduling and Risk Management)

#### 1 GENERAL

#### 1.1 SCOPE

This specification applies to the provision of Estimating, Constructability, Scheduling and Risk Management services

#### 1.2 PROJECT INFORMATION

Project specific information is provided in Annexure A.

#### 1.3 **DEFINITIONS**

The following interpretations apply to terms used in this Specification:

**Conditions of Contract** Schedule 3 of Professional Services Contract (Construction Industry)

(C71) between RMS and Professional Services Contractor

Means "the Contractor" as defined in the Professional Services

**Professional Services** 

Contractor (PSC) Contract Agreement

**Services** All the necessary services and activities required to complete the works

detailed in this Schedule 4 – Description of Services

**Contract Works** All elements of the work to be implemented for the project to ensure

compliance with the requirements of the Professional Services Contract

Agreement and the RMS's contract management policies

#### 1.4 FUNDAMENTAL OBLIGATIONS OF PSC

The PSC must share the RMS's commitment to the provision of best practice in the delivery of the project.

The PSC must operate a quality management system to meet the requirements of AS/NZS ISO 9001:2008.

The PSC's services must reflect the requirements of value for money, environmental management, work health and safety, innovation and quality.

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The PSC must provide the services as and when requested by the RMS Representative and in accordance with the requirements of this specification.

The PSC must provide the Services in accordance with the following:

- (i) Contract Documents;
- (ii) RMS and TfNSW policy and guidelines.
- (iii) The RMS ProjectPack procedures
- (iv) This specification;

#### 2 DESCRIPTION OF SERVICES

#### 2.1 ROLE OF PROFESSIONAL SERVICES CONTRACTOR (PSC)

The role of the PSC is to provide estimating, constructability, scheduling and risk management services to RMS to support the project management of the M12 Motorway project.

The PSC is to nominate resources for the following roles:

- Estimater
- Senior Estimator
- Constructability Advisor (Bridgeworks)
- Constructability Advisor (Roadworks)
- Scheduler
- Senior Scheduler
- Risk Assessment

#### 2.2 WORKING DAYS AND HOURS

The normal working days will be Monday to Friday excluding proclaimed public holidays. The normal hours worked will be 8 hours per day.

The quantities shown in the Pricing Schedule (schedule 2 of the contract) are estimates only. Some work outside normal hours may be required. Payments will be made based on agreed actual hours. The RMS Representative may request an estimated upper limit for specific tasks during the term of the contract.

The Services are to be provided as and when required as directed by the RMS Representative

The Principal will not be liable for any additional costs associated with extending or reducing the quantity of hours set out in the Pricing Schedule.

#### 2.3 AVAILABILITY OF PSC KEY PERSONNEL

The PSC must not change the personnel unless otherwise agreed in writing by the RMS.

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Upon the PSC becoming aware that any of the key personnel engaged in the performance of the work will cease to be so engaged (excepting normal absences), the PSC must, within seven (7) days of becoming aware:

- (i) advise the RMS of the name, classification, qualifications and experience of the person proposed to replace the key personnel in the performance of the work ("proposed person").
- (ii) obtain the RMS's prior written approval to the engagement of the proposed person.

If the RMS is not satisfied that a proposed person has at least equivalent qualifications, experience and competence to the original key personnel it must advise the PSC of such in writing as soon as practicable. Within seven (7) days of receipt of such advice, the PSC must advise the RMS of the name, classification, qualifications and experience of another proposed person for the RMS's approval in accordance with this clause. If a suitable replacement, to the satisfaction of RMS, is not able to be provided by the PSC, RMS reserves the right to obtain the relavant services from another party.

#### 2.4 LOCATION

RMS may require the nominated PSC resources to attend at RMS Offices or the M12 site for meetings, workshops, inspections or to undertake the services. Otherwise the PSC resources are to be located in the PSC's premises.

#### 2.5 DURATION OF SERVICES

The Services are to be provided as and when directed by the RMS representative over a period of up to 4 years.

#### 3 QUALIFICATIONS OF PSC PERSONNEL

The PSC must propose suitable personnel for each of the positions listed in section 2.1 and include a resume of the career experience of each person in the Tender or when proposing a replacement.

Personnel are required to possess the qualifications specified below.

#### 3.1 ESTIMATORS

The Senior Estimator must have appropriate qualifications and minimum 10 years relevant experience including 5 years experience in estimation of major road infrastructure projects. The Senior Estimator is to have extensive knowledge and experience in RMS and / or TfNSW estimating policies and procedures.

The Estimator must have appropriate qualifications and minimum 5 years relevant experience including 2 years experience in estimation of major road infrastructure projects. The Estimator is to have knowledge of RMS and / or TfNSW estimating policies and procedures

#### 3.2 CONSTRUCTABILITY ENGINEERS

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The Constructability Engineers must have degree qualification, proven competence and minimum 10 years practical construction experience in major road/bridge infrastructure projects. Experience in previous RMS contract management is desirable. Knowledge of contract requirements, technical specifications, design standards, quality, environmental and work health and safety management that applies to major contracts is essential. The Constructability Engineers must have competence and experience in the provision of constructability advice on relevant aspects of major infrastructure projects similar to M12 Motorway project.

#### 3.3 SCHEDULERS

The Senior Scheduler must have minimum 8 years experience in undertaking scheduling on major infrastructure projects or equivalent. The Senior Scheduler must be proficient in use of P6 and Microsoft Project and have extensive knowledge and experience on RMS and/or TfNSW project scheduling requirements.

The Scheduler must have minimum 4 years experience in undertaking scheduling on infrastructure projects or equivalent. The Scheduler must be proficient in use of P6 and Microsoft Project and have knowledge of RMS and/or TfNSW project scheduling requirements.

#### 3.4 RISK MANAGER

The Risk Manager must have relevant qualifications and minimum 5 years experience in risk management on major infrastructure projects or equivalent experience. The Risk Manager is to have knowledge of RMS and/or TfNSW risk management processes and procedures.

The Risk Manager must have competence and experience in risk management of major infrastructure projects similar to M12 Motorway project.

#### 4 PAYMENT

The unit rates for payment will be deemed to include all costs necessary to undertake the work required, including travel to the M12 site or RMS offices as required; safety equipment, provision of mobiles, provision of laptops, insurances, workers compensation and superannuation contributions, overheads (including office accommodation), personal expenses and other applicable costs.

The hourly rates submitted for the services will be deemed to include all costs necessary to undetertake the work required. Overtime will only be paid if pre-agreed with the RMS Representative. The rate for overtime will be the same as the hourly rate.

The PSC is to provide rates for the resources identified in Scheule 2 Fees.

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#### ANNEXURE A -PROJECT INFORMATION

#### A1 CONSTRUCTION PROJECT DESCRIPTION

Project Name	M12 Motorway	
Location	From M7 to The Northern Road	
Project features	Four lane divided Motorway with grade separated interchanges at M7 and Western Sydney Airport accesss road.	

#### A2 SCOPE OF SERVICES

The scope of Services is to include:

#### **Estimating**

- Critically reviewing and reporting on the concept estimate for the project, including bulk quantity checks as appropriate
- Preparation of full or part cost estimates as directed by RMS
- Providing valuation of proposals and claims from the D&C Contractor
- Provision of advice in relation to estimating including estimated cash flows in consultation with the Scheduler
- Provision of advice in relation to proposed "Escalation and Risk" allowances

#### **Constructability Advice**

- Undertake Constructability review of the concept design
- Provide input into the HSiD process
- Provision of advice in realation to constructability of major bridges
- Provision of advice in relation to constructability and staging proposals
- Undertake a review of earthworks management and mass haul
- Undertake a review of proposed construction compound and lay down areas for adequacy

#### **Scheduling**

- Review current M12 delivery program / master schedule for the M12 project in P6
- Develop cash flow estimates from the P6 program in consultation with the Estimator
- Review of tender program provided by contractors during procurement stage
- Validate RMS construction program (critical path analysis and resourcing)
- Updating the master schedule/ program and providing reports (monthly)
- Review design and construction program (critical path analysis and resourcing etc) from tenderers
- Reviewing and report on D&C Contractor's contract program and cashflow
- Provide cash flow forecasts aligned to the Contract Program

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- Provide monthly review of Contractors monthly report.
- Maintain / prepare "As-Built" programs on a monthly basis
- Provision of advice in relation to scheduling / programing.

#### **Risk Assessments**

- Undertake reviews and advise on risk assesssment's prepared by the Project Team
- Facilitate risk workshops to improive on risk identification and management
- Provide advice to the Project Team in preparation and maintenance of risk registers
- Provision of advice in relation to risk assessments