Tender documents for manpower supply for O&M work from chharlla to Manharpur MGR system maintenance for WDG4D LOCO O&M , 135 wagon , 3 RRI cabin and 46 ETKM track for OPGC II MGR at three location from Chainage 9/500 KM to 48/000 KM for the period of 12 month.

Brief Description of Merry Go Round (MGR) System at 1b Thermal Power Station:

Odisha power generation corporation ltd (OPGC Ltd) a 100 % Government of Odisha owned PSU has Ib thermal power station (ITPS) at Banharpali, Dist Jharsuguda of Odisha. ITPS has a comprehensive MGR private track network for transporting coal from M/s Mahanadi Coalfields Ltd Lakhanpur (A subsidiary of Coal India Ltd) mines to our siding at distance about 10 Kilometer. The MGR network takes off from new chharlla coal loading yard to OPGC Coal handling plant track hopper and back to chharlla loading yard. The MGR System is to transport coal from M/s MCL, Lakhanpur area to OPGC Power Plant.

The Power Station has two generating stations of 2x 210 MW since the year 1994 and uses fossil fuel (Coal) to meet its requirement of steam and also completed 2x660 MW thermal power plant in July 2019. The present 2X210 MW & 2 x 660 MW units use about 30000 MT of coal daily. The transportation of coal is facilitated through an elaborate railway network called the Semi-Merry-Go-Round Railway System (SEMI -MGR) owned by the OPGC. The future plan is to transport coal from mines at Manharpur, District Sundergarh located at about 50 Km through a dedicated railway track owned by OPGC Ltd. Now OPGC has own 2 WDM2A(2600HP) LOCO, 3 WDG4D loco (4500HP) ,135 BOBR / BOBRN coal hopper wagon, about 36 ETKM track at present and two RRI signal system used for coal transportation.

The SEMI MGR System has at present a total of about 36 ETKM of Broad Gauge track up to chharlla coal loading yard and touching MCL line for connection Indian railway network at Chainage 14/800 KM and connecting the power plant passing through the present coal loading siding at chharlla at chainage 9 /800 KM. The 36 ETKM of Broad Gauge (1676 mm) track consists of 60 Kg Rail & 37 PSC layout 1 81/2 points & crossing in loading and unloading yard (chharlla loading yard 14, workshop unloading yard 17 and 6 hand points), single and SWR length railway track, associated accessories, S&T System (Route Relay Inter-locking arrangement at two signal panel) & MGR Workshop / Loco maintenance work shop.

At present loaded coal wagons travel from Chharlla to the Power plant and discharge the coal on the two track hoppers located at 10 KM of the coal handling area inside the plant. The coal rake travels on a single track and takes a loop inside the plant area from the workshop panel building to enable the weighment of coal and discharge of coal on the hoppers. The entire movement of locomotives and wagons are controlled from two signal panel buildings through a Signaling and Telecommunications network.

OPGC II has planned to transport coal from Manharpur coal project of M/s OCPL at Chainage 48/000 Km to OPGC II hopper at Chainage 0/000 KM. The workman of this tender shall be engaged from 9/500 Km to 48/000 KM as per requirement to carry out operation and maintenance work.

SCOPE OF WORK AND TECHNICAL SPECIFICATION for OPGC II asset

The agency shall have to carry out the O & M work for the following items of the MGR system. The details are mentioned for each category of work as under. The general scope of work and services to be rendered by the contractor shall broadly be as follows but not limited to the following: The detail for BoQ for manpower supply for OPGC II shall be as under

OPGC II:

- 1) 3 nos. WDG4D Diesel loco of DLW Varanasi make of year 2017& 2018
- 2) 110 BOBR & 3 Brake van coal hopper wagon of TITAGARH make.

BOQ

	BoQ for supply of manpower for O&M work of MGR sys yard for operation & maintainance of WDG4D LOCO, & telecomm system of RRI technology and 46 ETKM tra	maintenno	ce of 135 was							
SI No	Category of work and manpower	Unit	Category of manpower	Qty per day	Qty. per year	Total (Rs) for one year				
A	Description of manpower of LOCO operation and maintenance, Assistance /helper to LOCO operation, rake checking and LOCO wagon maintenance work									
1	Providing experienced manpower for LOCO operation	Manday	JE level	6	2190					
2	Providing experienced manpower for LOCO helper	Manday	SK	6	2190					
3	Providing experienced retired manpower for LOCO electrical maintenance	Manday	JE level	2	626					
4	Providing Loco mechanical maintenance helper	Manday	SSK	2	626					
5	Providing experienced retired manpower for LOCO Mechanical maintenance	Manday	JE level	2	626					
6	Providing Loco electrical maintenance helper	Manday	SSK	2	626					
7	Providing supervisor for LOCO & wagon O&M work	Manday	HSK	1	365					
8	Providing experienced manpower for wagon rake checking	Manday	SSK	12	4380					
В	Rerailment of Wagon / Loco									
1	Providing retired railway or experienced Technician / for rerailment of loco wagon	Manday	МСМ	1	313					
2	Providing manpower of semi-skilled category for assistance of loco wagon rerailment	Manday	SSK	2	626					
С	Signal system Operation & maintenance									
1	Providing experienced / retired railway manpower for signal system maintenance	Manday	ESM	2	626					
2	Providing experienced manpower for signal maintenance at three cabin	Manday	HSK	4	1252					
3	Providing experienced manpower for signal panel operation (ASM)	Manday	ESM	9	3285					
4	Providing skilled manpower for signal panel operation assistant / points man(Asst. ASM)	Manday	SK	9	3285					

5	Providing experienced electrician for LT system maintnnce	Manday	HSK	2	626
6	Providing experienced manpower for LT system assistant	Manday	SK	2	626
7	Providing workman for Housekeeping Staff	Manday	UNSK	3	1095
8	Providing semiskilled workmen for level crossing operation	Manday	SSK	12	4380
D	46 ETKM Track maintenance from Chharlla to manharpur				
1	Providing retired railway PWI for track maintenance	Manday	JE level	1	313
2	Providing retired PWI for Bridge maintenance	Manday	JE level	1	313
3	Providing Key Man for track patroling	Manday	SK	6	2190
4	Providing Trolly Man for driving trolley in railway track for track inspection	Manday	SSK	1	313
5	Providing track mate for gangmen work for track maintained parameter measurement	Manday	HSK	3	939
6	Providing supervisor for track maintenance supervision work	Manday	HSK	1	313
7	Providing gangman semiskilled for track maintenance	Manday	SSK	30	9390
8	Providing unskilled workmen for track ballast profiling and cleaning	Manday	UNSK	30	9390

Scope of work and workman requirement:

A	Description of manpower of LOCO operation and maintenance , Assistance /helper to LOCO operation , rake checking and LOCO wagon maintenance work				
1	Providing experienced manpower for LOCO operation				
	The workman shall be retired from Indian railway and age shall be less than 65 years with physical fit to work or having 5 years experience in piloting 20 KM track in any siding				
	Education Qualification 12 th /ITI/Graduation				
	The deployed railway drivers will carry out the related works of locomotive operation as per the instruction of engineer in charge of OPGC/ MGR department.				
	The agency has to provide loco pilot for shunting operation of LOCO wagon for maintenance & refueling of diesel in LOCO in addition to normal loco pilot for LOCO 24 hours operation. The agency shall deploy retired expert railway / voluntary retired railway driver of age upto 65 years for the LOCO operation work. The agency may also engage loco drivers having three years of experience for the subject work in addition to main retired railway LOCO pilot to assist in the operation and smooth loco operation. There is no fixed starting time for rake movement and number of rake movement shall be intimated to the agency as per coal requirement at coal handling plant per day. No. of rake movements in a day depends upon coal availability at yard and coal requirement at plant side.				
	The duration of rake movement starts from empty rake departure at MGR & arrival of empty rake to MGR after unloading of loaded rake.				
	Providing experienced manpower for LOCO helper				
	The workman shall be minimum ITI or 5 year experience in loco assistance for LOCO operation work				
	Education Qualification 12 th /ITI/Graduation				
Loco Brake pipe coupling/decoupling, ensure Point movement, Rake Checking durin Stop position					

2				
	Providing experienced retired manpower for LOCO electrical maintenance			
3	Retired person having experience in WDG4D electrical maintenance of locomotive The workman shall be retired from Indian railway and age shall be less than 65 years with physical fit to work or having 10 years experience in loco electrical maintenance.			
	Minimum Retired Grade MCM/JEE/SSE			
	Daily Routine Check up from electrical /Breakdown repairs other than major accidental repairs to the extent			
	possible within the facilities available at MGR Workshop /Central workshop as per instruction of EIC			
	History sheet for each loco shall be maintained by expert, showing all major			
	renewals, repairs, accident damages etc. This record shall be the property of OPGC			
	& shall be handed over to OPGC on termination /end of contract period.			
4	Providing Loco mechanical maintenance helper			
	Minimum 2 year Mechanical maintenance Experience in Indian railway Locomotive in any public/private company (semi skilled) minimum education Qualification 10 th /12 th /ITI assisting Retired Mechanical Supervisor			
5	Providing experienced retired manpower for LOCO Mechanical maintenance			
	Retired person having experience in WDG4D Mechanical maintenance of locomotive. The workman			
	shall be retired from Indian railway and age shall be less than 65 years with physical fit to work			
	or having 10 years experience in loco Mechanical maintenance.			
	Minimum Retired Grade MCM/JEE/SSE			
	Daily Routine Check up from Mechanical /Breakdown repairs other than major accidental repairs to the extent possible within the facilities available at MGR Workshop /Central workshop as per instruction of EIC			
	History sheet for each loco shall be maintained by expert, showing all major			
renewals, repairs, accident damages etc. This record shall be the property of O				
	& shall be handed over to OPGC on termination /end of contract period.			
6	Providing Loco electrical maintenance helper			
	Minimum 2 year electrical maintenance Experience in Indian railway Locomotive in any public/private company (semi skilled) minimum education Qualification 10th/12th/ITI assisting Retired Electrical Supervisor			
7	Providing supervisor for LOCO & wagon O&M work			
	Minimum 5 year Experience in Supervision work for rake movement , daily report , (HSK)			
	Diploma/degree/Graduation in any Stream			
	Supervisor co-ordinate with operation and maintenance team to day to day activities and maintain all relevant record and submit to EIC on daily basics.			
8	Providing experienced manpower for wagon rake checking			
	Minimum 5 year Experience in Indian railway wagon of any type (semi skilled) minimum education Qualification 8 th /10 th /12 th /ITI			
	The agency shall engage semi skilled manpower of wagon maintenance experience			
	to timely placement and drawn-out of rake for loading of coal. The rake checking			
	time to start for placement after loading shall be 20 minutes except sampling			

period of coal and charging air for rake. The rake checking staff of sufficient manpower shall be deployed in LOCO & in brake van and at loading place for this job so as to coordinate the main control room of MGR for timely placement / drawn-out of rake.

В	Description of manpower for Rerailment of Wagon / Loco							
1	1 Providing retired railway or experienced Technician for rerailment of loco wagon							
	Minimum 2 year Experience to operate rerailing equipment or retired Railway tech							
	Education Qualification 10 th /12 th /ITI/Graduation							
	Providing manpower of semi skilled category for assistance of loco wagon rerailment							
2	Assisting in re railment at any location to retore the wagon and loco with retired technician experience staff							

C							
	Description of manpower of Signal system Operation & maintainance at Gidigara, Khechobahal , Manoharpur						
1	Providing experienced / retired railway manpower for signal system maintenance						
	The workman shall be retired from Indian railway ESM and age shall be less than 65 years with physical fit to work or having 10 years experience signal system maintenance						
	Education Qualification 12th/ITI/Graduation						
	The deployed staff will carry out the related works of maintenance of RRI panel/IPS as per the instruction of engineer in charge of OPGC/ MGR department.						
2	Providing experienced manpower for signal maintenance at three cabins						
	High Skilled worker is required for Maintenance for RRI Panel having minimum 5 year experience in RRI/SSI panel assist ESM/experience staff during maintenance						
	Providing experienced manpower for signal panel operation (ASM) ESM						
3	The workman shall be minimum diploma or 5 year experience in signal operation in anyRailway /Private/PSU sector						
	Education Qualification Diploma/Graduation						
	The deployed staff will carry out the related works of operation of RRI panel/IPS as per the instruction of engineer in charge of OPGC/ MGR department.						
4	Providing skilled manpower for signal panel operation assistant / points man(Asst. ASM)						
	Minimum 1 year experience in RRI/SSI panel operation in any Railway /Private/PSU assist ESM/experience staff during operation rectification of point during failure /providing clamp to points etc						
5	Providing experienced electrician for LT system maintenance						
	The workman shall be minimum diploma or 10 year experience in LT maintenace						

	Education Qualification Diploma
	Maintenance of LT panel at all station as per instruction of EIC
6	Providing experienced manpower for LT system assistant
	Minimum 5-year experience in LT panel maintenance to assist LT maintenance team
7	Providing workman for Housekeeping Staff
	Unskilled labour to daily housekeeping at Station building at instructed by EIC
8	Providing semiskilled workmen for level crossing operation
	Minimum 1 year Experience point Man/gang man to operate manual point at addapada level crossing

D	Description of manpower 46 ETKM Track maintainance from Chharlla to manharpur				
1	Providing retired railway PWI for track maintnnace				
	The workman shall be retired from Indian railway and age shall be less than 65 years with physical fit to work and minimum SSE level for track maintenance				
	Day to day inspection of Railway track as per IRPWM or as per instruction of EIC				
2	Providing retired PWI for Bridge maintnnace				
	The workman shall be retired from Indian railway and age shall be less than 65 years with physical fit to work and minimum SSE level for bridge maintenance Retired Railway PWI/JE level, day to day inspection of Bridges as per IRPWM or as per instruction of EIC				
	Providing Key Man for track patroling				
3	Minimum 2-year experience in track patrolling n in any Railway /Private/PSU				
	Education Qualification 12th/ITI/Diploma/Graduation				
4	Providing Trolly Man for driving trolley in railway track for track inspection				
	Minimum 1 year experience in driving trolley in any Railway /Private/PSU Workman should capable to operate trolley in railway track as per instruction of EIC				
5	Providing track mate for gagmen work for track maintance parameter measurement				
	The workman shall be retired from Indian railway and age shall be less than 65 years with				
	physical fit to work or having 10 years experience in track maintenance.				
	Education Qualification ITI/Diploma/Graduation				
6	Providing supervisor for track maintenace supervision work				
	The workman shall be retired from Indian railway and age shall be less than 65 years with				
	physical fit to work or having 10 years experience in track maintenance.				
7	Providing gangman semiskilled for track maintnnace				

	The workman shall have 5 years experience in track maintenance Semiskilled labour to daily maintenance of track through packing , slack packing pulling back, etc as per IRPWM or instructed by EIC			
8	Providing unskilled workmen for track ballast profiling and cleaning			
Minimum 1 year Experience point Man/gang man for track cleaning work as per instruction				

Special terms & conditions for LOCO operation for both OPGC II:

- The agency shall deploy retired expert railway / voluntary retired railway driver of age upto 65 years for the LOCO operation work. The agency may also engage loco drivers having five years of experience in WDM2A, WDG4D for OPGC I & OPGC II respectively loco operation.
- Prior to deployment of any Loco driver/pilot, their bio data should be submitted to engineer in charge of OPGC where after trade test & interview will be carried out to determine fitness of the person for the job.
- 3. Once the person has been declared technically fit, he has to undergo medical check-up at OPGC ITPS hospital. The person will be appointed only if he is declared medically fit.
- 4. The deployed railway driver will be allowed to work only unto maximum age of 65 years, after which their services will be continued based on their medical fitness.
- 5. The entire railway driver to undergo compulsory medical check-up at ITPS hospital once in every six months & the medical records are to be submitted to engineer in charge.
- 6. All registers as per statutory requirement including daily attendance register/registers as required for the job shall be maintained by the agency.
- 7. The agency shall deploy the driver in general shift / in shift for all working days including holidays.
- 8. The agency shall submit wage sheet photocopies of driver deployed and shall be verified with the original.
- 9. All railway drivers are to be provided with insurance coverage by the agency .Copy of the insurance to be submitted to engineer in charge.
- 10. Penalty for unsafe operation of the LOCO of the MGR system by the railway driver will be recovered from the agencies bills @ Rs 10000/-per incident. The decision of engineer in charge in this regard will be final & binding.

- 11. In case of death of staff on duty, then the agency has to incur all the expenditure related to post-mortem, calling upon the family members of the deceased from their native place, transportation cost towards the family of the deceased from their native place to OPGC & back & also cost towards transportation of the deceased body from OPGC to his native place & various other incidental charges. These charges will not be reimbursed to the agency. No compensation whatsoever will be paid by OPGC.
- 12. The following T & P shall be provided by the agency to the entire railway driver (per person):
 - i) flag-green 01 no once in 03 month. ii) flag-red 01no once in 03 months ,iii) . 3 cell torch light 01no during the contract period .iv) torch cells 03 nos once in a month. v). water flask 01 no once during the contract period. vi). soap 01 no once in a month. vii) 1 metre cloth/ towel 01 no once in a month. viii) Dust /nose mask 03 nos once in a month.

The agency has to provide an alcohol detector at MGR control room for checking of alcohol consumption during duty hour.

- 13) There is no fixed starting time for rake movement and number of rake movement shall be intimated to the agency as per coal requirement at coal handling plant per day.
- 14) No. of rake movements in a day depends upon coal availability at yard and coal requirement at plant side.
- 15) The duration of rake movement starts from empty rake departure at MGR & arrival of empty rake to MGR after unloading of loaded rake.
- 16) If contractor did not supply hand T & P as per maintenance requirement and safety item as per OPGC requirement the same shall be procured by OPGC at contractor's risk and cost and overhead of 25% shall be charged to actual cost of procurement & necessary deduction shall be done from running bills.
- 17) The accidental insurance of their staff shall be done by contractor at their own cost.
- 18) All statutory obligations fulfilment is the responsibility of the contractor.
- 19) Rake checking for loading and unloading and assistance to LOCO operation in MGR rake for timely drawn out and placement as per OPGC coal requirement.
- **20)** The agency shall engage skilled manpower of wagon maintenance experience to timely placement and drawn-out of rake for loading and unloading of coal. The **rake checking time** to start for placement after unloading of coal shall be 20 minutes for 45 wagons and after loading shall be 20 minutes except sampling period of coal and charging air for rake. The rake checking staff should be skilled manpower to be deployed in LOCO & in brake van and at loading and unloading place for this job so as to coordinate the main control room of MGR for timely placement / drawn-out of rake.
- **21)** Penalty of Rs 5000.00 for delay in placement of rake or drawn out due to reasons attributable to the agency for poor performance of operation staff shall be imposed and deducted from the monthly bill.

SPARE PARTS & MATERIALS:

Hand Tools shall be arranged by the agency and consumable items shall be provided by OPGC. The agency shall make available the list of T&P items to EIC before commencement of the contract. All specialised tools, spares and materials for maintenance of locos and wagons will be identified and

assessed by agency giving description and quantity details well in advance and OPGC will supply them free of cost during maintenance as per requirement.

Agency shall furnish a list of inventory requirement for specific period for consumables and non-consumables both to avoid delay and blockage of high cost capital items.

Essential services like water, oxygen, acetylene, power & electrodes, in MGR workshop shall be provided by OPGC free of cost.

Agency will organize the collection and transport of required materials from OPGC main store to site stores and to attend troubleshooting in rake

In case Crane, Trailer, Truck, Hydra, etc. is required for transportation of heavy materials, OPGC will provide such facilities free of cost. The manpower required for loading /unloading in central stores / MGR store shall be arranged by agency at their own cost. The procedure for the above shall be followed by agency as done by other contractors.

Site stores for LOCO & wagon spares shall be maintained by agency. All materials (Spares & consumables related to Loco & Wagon maintenance) shall be drawn and transported from main stores by agency on clearance from EIC. Storage facilities at site shall be provided by OPGC.

Agency shall keep storekeepers for issue/receipt of spares and consumable items and maintain proper record for the same. A monthly statement of the material drawn from the main store / site store and quantity consumed and balance on hand shall be submitted to EIC.

PLANT AND EQUIPMENT:

Machinery, plant, tools and equipment required for satisfactory maintenance shall be provided by OPGC free of cost. Agency will assist OPGC in procurement of such spares/equipments (for preparation of specifications of materials etc.) without any extra financial implication.

Agency will assist for installation of testing equipments/jigs/ fixtures required for the job. The components, spares and equipments which can be repaired / finished / machined at MGR workshop shall be done by OPGC with the assistance of agency. If such components are urgently required and not available in stores, shall be arranged by OPGC

All the shunting of locos & wagons required for maintenance and fuelling inside MGR workshop yard shall be carried out by agency's loco driver & shunter. Damage of LOCO spare /equipments due to shunting operation is to be borne by the agency and the agency shall rectify at their cost.

Quarterly statement shall be submitted by agency, indicating the working condition of all the LOCO wagon & the maintenance done during the quarter, with full details of spares required for such machinery/ equipments which are under break down. At the end of the contract period, agency shall hand over all the plant & equipment in good working condition.

HOUSEKEEPING

Housekeeping of entire premises in & around MGR workshop will be done by the agency. The agency shall clean oil, lubricants and grease from the surfaces of maintenance pits/bays, fuel injection room, lubricant room etc. Agency shall dispose of all the waste and keep the premises totally clean. All scrap shall be neatly stacked at a nominated place shown by E.I.C.

RECORD KEEPING

History sheet for each loco and wagon shall be maintained by agency, showing all major renewals, repairs, accident damages etc. This record shall be the property of OPGC & shall be handed over to OPGC on termination /end of contract period.

Any additional record in connection with rolling stock required by OPGC shall be maintained by the agency.

PERFORMANCE GUARANTEE:

Loco availability will be maintained at monthly average of 90% of effective numbers of locomotives physically available at OPGC subject to availability of spares from OPGC. However breakdown Loco / Locos are to be released on the same day.

Wagon availability will be maintained by agency at monthly average of 90% of the effective numbers of wagons physically available at OPGC subject to availability of spares from OPGC. On daily basis 90% of the effective number of wagons should be in operational condition. If agency is not able to fulfil the above conditions due to reasons not beyond their control and attributed directly to the sub standard maintenance of Locos and wagons which shall be established through a joint enquiry having representative of agency, a penalty subject to maximum of 5% of the monthly bill shall be imposed on agency.

In case any accident of locos & wagons occurs due to bad workmanship of agency which shall be determined by an enquiry committee consisting of at least one member of agency, the liability of agency shall be limited to maximum of 5% of monthly RA Bill or as decided by EIC.

MULTIPLE UNIT OPERATION OF LOCOS: Whenever felt required, rakes will be moved with two locos coupled together through multiple unit & the agency has to depute one electrical & one air brake expert to accompany the rake with locos working in multiple unit operation.

CONSULTANCY AND LIAISONING:

Consultancy and liaison services for maintenance of locos and wagons, spare parts procurement, inventory, rectification of defects and necessary modification shall be extended to OPGC by the agency.

Taking over of any equipment / workshop machinery shall be done jointly by OPGC & agency. Equipment shall be given to agency in good working condition & shall be jointly recorded at the time of handing over. Agency will hand over the equipment to OPGC in good working condition, except for normal wear and tear in event of termination / end of contract.

All Tools & Plants purchased for MGR except agency's scope of supply shall be given to agency for their use during the contract period. However agency shall hand over the T&P with proper account to OPGC after expiry of the contract period.

Agency will ensure timely maintenance of the rolling stock and will give specific attention to the items which require frequent maintenance. However if there is shortage of spares /sub-assemblies, agency shall not be responsible for any set back. Spare requirement shall be projected by agency well in time. Agency will maintain proper preventive schedule charts. The jobs undertaken shall be recorded and full report shall be submitted to OPGC every month.

Agency's Chief project manager (CPM) shall inform OPGC EIC while leaving station. A competent person is to be nominated to look after various maintenance activities in case of long absence of CPM as per the instruction of EIC. Daily progress report of work along with the manpower status shall be submitted to EIC.

SPECIAL CONDITIONS OF CONTRACT

- Special conditions of contract shall be read in conjunction with the NIT, General Conditions of Contract, Specifications and scope of work, drawings and any other documents forming part of this contract wherever the contract so requires. Notwithstanding the sub-division of the documents into these separate sections and volumes every part of each shall be deemed to be supplementary to and complementary to every other part and shall be read with and into the contract so far as it may be practicable to do so.
- 2) Where any portion of the Special Conditions of Contract is repugnant to or at variance with any provisions of the General Conditions of Contract, then unless a different intention appears, the provisions of the special conditions of contract shall be deemed to over-ride the provisions of the General Conditions of Contract, only to the extent such repugnance's or variations in the special conditions of contract, as are not possible of being reconciled with the provisions of General Conditions of Contract.
- 3) In case of contradiction between Indian Standard Specifications, General Conditions of Contract, Special Conditions of Contract, Specifications, Drawings and BoQ, the following shall prevail in order of precedence.

Detailed Letter of Acceptance with BOQ & its enclosures.

Technical Specifications.

RDSO Standards

Indian Standards

- 4) Bidders are advised to submit quotations strictly based on the terms & conditions and specifications contained in the tender documents. Owner reserves the right to evaluate the quotations on such deviations having financial implications by adding the costs determined by owner.
- 5) Wherever it is mentioned in the specifications that the contractor shall perform certain work or provide certain facilities, it is understood that the contractor shall do so within the quoted rate. This being an Operation & Maintenance contract, it has been considered that contractors are quoting the rates inclusive of all hand tools, tackles, and manpower including supervision.
- 6) The work men shall have thorough knowledge for relevant works in maintenance and the technical competency to be checked by EIC before putting the workman in each job.
- 7) The Contractor shall have to deploy a Site in charge (SIC)/ Chief Project Manager (CPM) who should always be available in this Power Station during the period of Contract to ensure the quality of O & M work. The in-charge must possess inline knowledge, experience of 10

years, workmen safety standard and skill to execute the maintenance of LOCO, Wagon and signal /electrical installation at Ib Thermal Power Station.

- 8) The Contractor shall deploy the workmen as mentioned above in scope of work must have adequate knowledge regarding the maintenance of LOCO & Wagon. If any of the Contractor's workmen is found unqualified / inexperienced for a work, he will not be allowed to do the jobs / works. The Workmen and other personnel engaged by the contractor for this work shall at no point of time have any liability on OPGC concerning to their employment under the Contract agreement.
- 9) In the case of any class of work for which there is no such specifications has been provided, such work shall be carried out in accordance with the RDSO drawing / Indian Railway Standard Specifications. In case there is no such specifications are also available, the work shall be carried out as per manufacturer's specifications. In case there are no such specifications as required above, the work shall be carried out in all respect in accordance with the instructions and requirements of the Engineer-in-charge.
- 10) The schedule of maintenance shall be as per Railway or as decided by our EIC.
- 11) You shall have to deploy sufficient number of skilled person as mentioned in each item category of for maintenance work of LOCO /wagon as per instruction of EIC..
- 12) You shall have to accept to other work which is not in the BOQ but the system requires for rake movement, In that case the agency has to agree the rate of Schedules of rates or of Indian Railway with 15 % overhead as decided by the EIC.
- 13) The monthly works shall be measured and payment shall be released accordingly as decided by the EIC. Penalty of 5 % or more as per discretion of EIC for non-performance of work shall be considered for deduction from bill due to substandard maintenance or nonperformance of assigned work.
- 14) You shall use proper sign, signal, flags and obstacles during maintenance and operation work for safe movement of rake.
- 15) Maintenance for 138 wagon for OPGC I & II or as per availability of BOBR coal hopper wagon of make TEXMACO / HEIL / BESCO/ TITAGARH including brake van wagon shall be handed over to agency for maintenance per month and payment shall be released proportionately.
- 16) Inspection, Testing and Management of Records:

The contractor shall provide consultancy for the various tests as required by EIC as enumerated in the Instruction Manuals/ Railway practices/ RDSO guidelines for Locos & Wagons. Proper records of such tests and inspection shall have to be maintained in formats/documentation as per instruction of Engineer-In-Charge of OPGC.

The work is subject to inspection at all times by the Engineer-In-Charge. The contractor shall carry out all the instructions given during inspection and shall ensure that the work is being carried out according to the technical specifications given in the manuals.

Any maintenance & operation not conforming to the Instruction Manual of DLW / RDSO / Manufacturer shall be rejected and the contractor shall carry out the rectification within

the quoted rates. All results of inspection and tests will be recorded in inspection reports.

The contractor shall print, provide and maintain all records like log books, registers and material reconciliation statement, store records etc. and submit reports/ records.

17) PERSONNEL: Contractor will provide details of category-wise manpower [with details of qualification & experience] to be employed for execution of the job in line with respective items requirements. However, the number and categories of workers, supervisory, managerial and consultant staff to be deployed from time to time on all activities are to be certified by EIC. In the beginning of the contract the contractor will submit a list of manpower deployed with assigned work inside the plant required to execute the jobs. Any change in position of manpower deployed is to be brought to the notice of Engineer- in- charge immediately.

The age limit of different categories of people engaged by the contractor is 65Years (in case of railway experienced personnel) and for others it is 60 years.

However, the medical fitness of the employees as required under the specifications shall be followed.

As and when a person completes the specified age he will be replaced with a suitable replacement with stipulated age criteria.

- 18) The quantity mentioned in each item of Bill of Quantity is indicative and may decrease or increase as per requirement of OPGC. The agency shall be paid accordingly.
- 19) Availbility for LOCO and wagon: The agency shall ensure the minimum monthly availability of 90% in case of locos & 90% in case of wagons throughout the currency of the contract, failing which penalty 5 % of the monthly billing value as envisaged shall be imposed on agency. The above availability is subjected to stock /spares lying under breakdown repairs but not attributable to agency.
- 20) The agency has to engage vehicle for their staff round the clock to attend the shift work, trouble shooting at any place of MGR track during rake movement and normal maintenance work.
- 21) Whenever the labour is used for other work not mentioned in SCC or SOW, payment for additional work shall be made workers, supervisor, consultant / engineer as decided by EIC.
- 22) If the agency procure spares for urgency , the cost shall be paid extra which includes the actual purchasing cost inclusive of taxes paid as per bill + Transportation charges + labour charge.
- 23) Labour Charge: it implies actual made to the labour as per payment sheet.
- 24) Fuel oil, lubricants. Hydraulic oil and spares for equipment will be provided by OPGC free of cost for smooth traffic operation. The contractor shall submit a monthly reconciliation statement of these materials along with the RA bill.
- 25) Safety of operation and keeping free from the accident, derailment and demurrage to the minimum will be the foremost responsibility of the contractor. The contractor shall take over each locomotive after completion of schedule maintenance / repair by checking it thoroughly for trouble free traffic movement.
- 26) Monthly coal transportation target will be intimated to the contractor at the beginning of every month and the contractor is to operate coal rakes to transport the required quantity of coal.

Shunting operation as per BoQ inside OPGC yard is to be carried out by the agency to load/unload/ detach /attach LOCO wagon in rake or from rake.

- 27) The contractor has to bring the requisite quantity of coal as per requirement of Engineer-incharge. If the contractor fails to execute the coal rake movement for a day or more due to any fault / reason attributed to the contractor, the penalty will be deducted on pro-rata basis from the subsequent RA Bill of the contractor for the days the rake movement not executed or OPGC shall cancel the contract.
- 28) Safety of the system operation and restoration of normalcy in case of derailment / accidents is the responsibility of the contractor. OPGC shall provide the T & P and rerailing equipments for restoration of derailment.
- 29) In case the rake operation is affected due to non-availability of manpower, then penalty shall be imposed @ Rs 5000/- per shift .The non-availability manpower for two shift in a month leads to poor performance and OPGC shall go for alternate arrangement and also cancel the contract
- 30) To attend the enroute problems contractor shall keep and maintain a toolbox with requisite hand tools in every rake. The defects in loco or wagons, which cannot be attended in enroute, must be communicated to MGR control room immediately.
- 31) If the coal wagon doors open during loading or in running rake, The contractor has to report to OPGC EIC immediately and OPGC shall attend immediately to clean the coal and rail track and arrange to transport the reclaimed coal from site A committee formed by OPGC will find out the cause of door opening and other damages and to fix responsibility. Any loss including the cost of coal and damages if found attributable to the contractor as per committee report shall be recovered from contractor's subsequent RA Bill.
- 32) All implements for operation such as set of flags, danger lights, token pouch, whistles, lights, signal torches, tail lamps for last vehicle etc. as per railway norms shall be supplied and maintained by the contractor.
- 33) Operating personnel of the contractor should not be above the age of 65 years for railway experienced personnel & 60 years for others and their suitability has to be assessed by qualified Medical Officer. If not found suitable, they should be immediately replaced.
- 34) Movement/Operations time: Time period from loading yard to unloading area of plant after handing over of rakes shall be 45 minutes at 9 KM distance loading yard & from plant to loading yard after receiving the line clearance shall be 45 minutes or as decided by OPGC time to time and shall be intimate to the agency as per OPGC requirement. Penalty for delay in rake movement shall be Rs 5000.00 per rake.
- 35) Fuelling of locomotives as and when required is contractor's responsibility. The diesel and lubricants (for O&M work) as required will be issued by OPGC free of cost under requisition by the contractor.
- 36) The contractor will be handed over the rolling stocks at MGR yard /siding for its maintenance and will receive it from Manager-in-charge and shift it to respective site without any delay to attach in rakes. If any delay is accounted for the negligence of the contractor, he will be liable to penal action as per the decision of the Manager-in-charge.

- 37) The Contractor shall submit daily report like HSD consumption rake movements etc to the EIC.
- 38) . We receive coal from own mines at monoharpur at 50 Km distance . The agency has to draw more than six rakes as per requirement of coal per day. The time period for 50 KM distance coal loading shall be decided by EIC and the agency has accept the time for such movement.
- 39) The broad scope of work includes but not limited to operation, maintenance supervision, including marshalling and placement of rakes / wagons at loading /unloading points at loading and unloading Yard, round the clock as per direction of the Manager/Engineer-In-Charge.
- 40) The agency has to report of any loss by damage, theft, fraud etc. not attributable to the contractor to concerned Engineer-In-Charge and assisting in lodging claims pertaining to loss of parts of OPGC as and when necessary and pursuing the claims on behalf of OPGC.
- 41) The Contractor shall provide technical advice and liaison services for the following as and when required by Engineer in charge.
- (a) Operation & maintenance LOCO & wagon
- (b) Rectification of defects in design and manufacture and suggestions / recommendations for modifications.
- (c) Assessment of all spares to be supplied by OPGC including its specifications and source of supply.
- (d) Review and assess additional safety measures required (if any) for OPGC Rail system.
- (e) If situation arises to transport the coal through Railways/Railway wagon from MCL to OPGC, the contractor is to assist OPGC for liaison and co-ordinate the work with the Railway to carry out the job smoothly and effectively for entire operation.
- f) Any repairs / replacements which are the obligation of the manufacturer under the warranty clause. Contractor shall notify such defects promptly to OPGC, if noticed within the warranty period.
- g) The contractor has to return all the used up / unserviceable material / spares/ used lubricants with its container to the central store once in every three months with free of cost.

42) LANT & MACHINERIES, JIGS, GADGETS, FIXTURES, SPECIAL TOOLS ETC:

- 44) Required Plant & machineries, Tools & tackles except hand tools, Jigs, gadgets, Fixtures, Special tools, big instruments etc shall be arranged by OPGC.
- 45) Period of Contract: The contract is initially for a period of 12 month from the date of issue of LOI.. This period may be extended on mutually discussion and accepted terms.
- 46) The Rail system is the lifeline of OPGC and the contractor is expected to give best of service to maintain zero break down in the O&M of work. Any lacuna observed which cause may for accident or derailment will be taken into consideration of penal action as deemed fit depending on the circumstances. Contractor shall carry out the services in conformity with Railway Standard / Norms / Codes and sound standard of Engineering Practices or as per decision of engineer-in-charge. The decision of engineer -in-charge will be final and binding.
- 47) The contractor shall provide necessary instruments / hand tools like measuring scales, calipers, micrometers, level, megger, avometer, tongue tester, line tester, meter checker, phase sequence meter etc at his own cost. All the above should be available with the contractor with valid testing and calibration certificate as per ISO requirement.

- 48) The contractor shall print, provide and maintain all records like maintenance Schedule forms, work sheets, registers and material reconciliation statement, store records etc. and submit reports/ records/returns confirming relevant ISO requirements or as required by Engineer -in-charge. Any work not conforming to the Instruction Manual of DLW/RDSO or codes shall be rejected and the contractor shall carry out the rectification at his cost. All results of inspection and tests will be recorded in inspection reports, proforma of which will be provided by the Engineer-In-Charge. These shall be submitted along with the completion documents.
- 49) Escalation: Rate quoted shall remain firm during whole period of the contract of 12 month.
- 50) Timings: The timings of OPGC / ITPS normally functions in the following 03 shifts & General shift.

'A' shift - 06.00 Hours to 14.00 Hours.
'B' shift - 14.00 Hours to 22.00 Hours.
'C' shift - 22.00 Hours to 06.00 Hours.
'G' shift - 08.00 Hours to 17.00 Hours.

The contractor has to organize the Operation Wing & Maintenance wing for round the clock operations and maintenance matching with the above timings as per instruction of Engineer-incharge.

- 51) Contractor will provide details of category wise manpower (with details of qualification & experience) to be employed while submitting tender document for execution of the job for 12 month in line with respective group requirements. However, the number and categories of workers, supervisory, managerial and consultant staff, to be deployed from time to time on all activities, can vary and will correspond to actual requirements as assessed by contractor in agreement with the Engineer-In-Charge.
- 52) Extra item not covered in NIT: If the contractor is required to do certain other work beyond the scope of NIT, contractor will be paid for cost of labour, materials, transportation, taxes, duties, transit insurance + 15% extra as overhead and profit..
- 53) Penal action will be imposed on the contractor upon lapses/errors/omissions arising from negligence on his part or on the part of his employees.
- 54) The contractor has to carry out all the maintenance / repair work free of cost arising during the defect liability period at the end of the contract. If he fails to do such work the same shall be done by some other agency and the amount of maintenance / repair charge plus 25% extra shall be deducted / recovered from his bills without any prejudice.
- 55) The operation I/C of the contractor should have close interaction with the maintenance I/C of loco / wagons maintenance wings of the contractor and OPGC EIC to ensure optimum availability/utilization of the Rail system infrastructure.

BOQ & PRICE BID FORMAT

BoQ for supply of manpower for O&M work of MGR system from chharlla yard to Manharpur coal loading yard for operation & maintenance							
of WDG4D LOCO, maintenance of 135 wagon, O & M work of signal & telecomm system of RRI technology and 46 ETKM track for OPG0							
SI			Category	Qty	Qty.	Unit	Total
No	Category of work and manpower	Unit	of	per	per	Rate	(Rs) for one
			manpower	day	year	(Rs)	year
Α	Description of manpower of LOCO operation and maintenance, Assistance						
1	/helper to LOCO operation , rake checking and LOCO wagon maintenance work	N 4 I	1E 11		0100		
1			JE level	6	2190		
2	G I	Manday		6	2190		
3	Providing experienced retired manpower for LOCO electrical maintenance		JE level	2	626		
4	Providing Loco mechanical maintenance helper	Manday		2	626		
5	Providing experienced retired manpower for LOCO Mechanical maintenance		JE level	2	626		
6	Providing Loco electrical maintenance helper	Manday		2	626		
7	Providing supervisor for LOCO & wagon O&M work	Manday		1	365		
8	Providing experienced manpower for wagon rake checking	Manday	SSK	12	4380		
В	Rerailment of Wagon / Loco						
1	g g	Manday		1	313		
2	5	Manday	SSK	2	626		
С	Signal system Operation & maintenance						
1	Providing experienced / retired railway manpower for signal system maintenance	Manday		2	626		
2	Providing experienced manpower for signal maintenance at three cabin	Manday	HSK	4	1252		
3	Providing experienced manpower for signal panel operation (ASM)	Manday	ESM	9	3285		
4	Providing skilled manpower for signal panel operation assistant / points man (Asst. ASM)	Manday	SK	9	3285		
5	Providing experienced electrician for LT system maintenance	Manday	HSK	2	626		
6	Providing experienced manpower for LT system assistant	Manday	SK	2	626		
7	Providing workman for Housekeeping Staff	Manday	UNSK	3	1095		
8	Providing semiskilled workmen for level crossing operation	Manday	SSK	12	4380		
D	46 ETKM Track maintainance from Chharlla to manharpur						
1	Providing retired railway PWI for track maintenance	Manday	JE level	1	313		
2	Providing retired PWI for Bridge maintenance	Manday	JE level	1	313		
3	Providing Key Man for track patroling	Manday	SK	6	2190		
4	Providing Trolly Man for driving trolley in railway track for track inspection	Manday	SSK	1	313		
5		Manday		3	939		
6		Manday		1	313		
7	Providing gangman semiskilled for track maintenance	Manday		30	9390		
8	Providing unskilled workmen for track ballast profiling and cleaning	Manday		30	9390		
	TOTAL VALUE IN INR (EXCLUDING GST)			•	•		
GST S	SHALL BE EXTRA AT ACTUALS, APPLICABLE GST % ALONG WITH SAC CODE TO BE	INDICA	TED IN YOUR	PRIC	E BID		
	In worde: Punge						

In words: Rupees_