

Volume-2

SECTION 6

BILL OF QUANTITIES

PREAMBLE

Bill of Quantities for the Works:

1. The Bill of Quantities shall be read in conjunction with the Instructions to Bidders, General and Special Conditions of Contract, Technical Specifications and Drawings.
2. The quantities given in the Bill of Quantities are estimated and are given to provide a common basis for bidding. The Contractor to measure the work under the observation and control of the Engineer, which shall be valued at the rates provided in the priced Bill of Quantities, where applicable, and otherwise at such rates as the Engineer may fix within the terms of the Contract, which shall form the basis for payments to the Contractor.
3. The rates in the priced Bill of Quantities shall, except in so far as it is otherwise provided under the Contract, include all construction plant, labour, supervision, materials, all temporary works and false works, erection, transportation, maintenance, insurance, administrative overheads, profit, taxes and duties, together with all general risks, liabilities and obligations set out or implied in the Contract, and including remedy of any defects during the Defects Liability Period.
4. A rate shall be entered against each item in the priced Bill of Quantities, whether quantities are stated or not. The cost of items against which the Contractor has failed to enter a rate or price shall be deemed to be covered by other rates entered in the Bill of Quantities. Unless mutually agreed between the Parties, in the event the construction works do not entail exhausting the quantities of any item stated in the Bill of Quantities, the Contract Price shall stand correspondingly reduced.
5. The costs of complying with the provisions of the Contract shall be included in the items provided in the priced Bill of Quantities. Where no items are provided, the cost shall be deemed to be distributed among the rates and prices entered for the related items of work.
6. General directions and descriptions of work and materials are not necessarily repeated nor summarized in the Bill of Quantities. References to the relevant sections of the Contract documentation shall be made before entering rates against each item in the priced Bill of Quantities.
7. The Bill of Quantities of the Work is comprised of the various Bills of construction activities. During execution, however, the items existing in any of the Bills can be made applicable for execution elsewhere also on the Works if considered appropriate and directed by the Engineer.
8. The method of measurement of completed work for payment shall be as per Specification.
9. Errors, if any, shall be corrected by Employer in terms of Clause 27 of ITB.

Annexure -1

**Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of
NH 24 from Km from Km 190.000 to Km 238.000 in the State of Uttar Pradesh**

Bill of Quantities

Sr No.	Brief Description	Unit	Quantity	Rate in Rs.		Amount in Rs.	
				Figure	Words	Figure	Words
1	Milling of existing wearing course upto 50mm using fine milling drum and disposal of milled material incl. all leads with suitable place disposal. The rate quoted shall be inclusive of the rebate for the salvage value of the milled material.	Sqm	3,65,488				
2	Providing and applying tack coat with bitumen emulsion using emulsion pressure distributor at the rate of 0.25 kg per sqm on the prepared bituminous/granular surface cleaned with mechanical broom	Sqm	12,34,117				
3	Providing and laying dense bituminous macadam with batch type HMP producing mix using crushed aggregates of specified grading, premixed with bituminous binder VG 40 (Grading -II- Bituminous binder content as per approved Job mix formula but not lesser than that specified in relevant clause of MoRT&H Specifications) and filler, transporting the hot mix to work site, laying with a hydrostatic paver finisher with sensor control to the required grade, level and alignment, rolling with smooth wheeled, vibratory and tandem rollers to achieve the	Cum	18,274				

	desired compaction as per MoRT&H specifications complete in all respects. Item rate shall be inclusive of all material, taxes, duties, manpower, equipment cost, royalties, transportation, etc.						
4	Providing and laying bituminous concrete with VG-40 with 100-120 TPH batch type hot mix plant producing an average output of 75 tonnes per hour using crushed aggregates of specified grading, premixed with bituminous binder @ 5.4 to 5.6 per cent of mix and filler, transporting the hot mix to work site, laying with a hydrostatic paver finisher with sensor control to the required grade, level and alignment, rolling with smooth wheeled, vibratory and tandem rollers to achieve the desired compaction as per MORTH/IRC/NHAI specifications complete in all respects. Item rate shall be inclusive of all material, taxes, duties, manpower, equipment cost, royalties, transportation, etc.	Cum	34,745				
5	Providing and applying two coats of enamel paint as per IS:133-1975 and approved by the Engineer and over a primer coat on concrete surface complete as indicated in the drawing, Technical Specifications Section 800 and as directed by the Engineer	Sqm	1,15,200				
6	Providing and laying of hot applied thermoplastic compound 2.5 mm thick including reflectorising glass beads @ 250 gms per sqm area, thickness of 2.5 mm is exclusive of surface	Sqm	40,093				

	applied glass beads as per IRC:35 .The finished surface to be level, uniform and free from streaks and holes.						
7	Supply & Installation of Raised Pavement Markers meeting with following. Made of Single mold twin shank poly carbonate or ABS body only. The RPM should have micro prismatic lens capable of providing total internal reflection of the light entering the lens face. The RPM should support a load of 13,635 kg tested in accordance with ASTM D 4280 and a test certificate confirming the same from an independent laboratory shall be submitted by the converter /applicator to the authorities before the start of work. The height, width and length of the stud shall not exceed 20 mm, 130 mm and 105 mm respectively. The slope of retro-reflecting surface shall be 35±5° to the base and the area of retro-reflecting surface shall not be less than 13 Sq.cm, Bi-directional Make :- 3M (Epoxy) Grade A or Equivalent, Warranty - As per OEM.	No	25,100				
Total Estimated Cost							

Note:

1. Quoted rates are inclusive of GST as per ITB Clause 42.1 and other applicable taxes
2. Item rate shall be inclusive of all material, manpower, equipment cost, royalties, transportation, etc.
3. Contractor shall arrange all the necessary equipment required to execute the work as per the Standards and Specifications and as per good industrial practice
4. The Construction Performance Security shall be provided by the Contractor to MBEL as per Tender document before signing of contract.

5. Retention Money shall be deducted and withheld by MBEL as per Contract Condition. The retention money shall be released interest free to contractor by MBEL upon successful completion of Defects Liability Period.
6. The Contractor shall solely be responsible for implementation of Traffic Management and Diversion during execution of awarded work as per IRC:SP:55-2014 “Guidelines on Traffic Management in Work Zones, other relevant IRC Codes, Clause 112 of Specifications for Road & Bridge Works (5th Revision) and as per Annexure -5B of RFB Volume I. ***Failing to adhere to implement Traffic Management, Diversion and Safety as per agreed & defined norms shall result in imposition of penalty equivalent to 2% of amount from each Running Account Bill of the Contractor.***
7. TDS shall be deducted at the rates applicable as per provisions of Income Tax Act from contractor’s running bills. For this purpose, Contractor shall submit necessary documents / details / information’s as may be required to MBEL from time to time.
8. The contractor shall be responsible for compliance as per prevalent Labour Laws including the labour cess compliances and its payment to Authority.
9. Contractor shall arrange for all insurances including contractor’s equipment, if any, and its own surrounding property, workmen’s compensation, group accident, and group Mediclaim. MBEL will not be liable for any compensation towards loss of life & property.
10. Above Bill of Quantities with rates shall be submitted on letterhead of the Bidder with signature of authorized signatory and company stamp

SECTION 7 SECURITIES AND OTHER FORMS

SECTION 7: SECURITIES AND OTHER FORMS

Form – 7A	:	Form of Bid
Form – 7B	:	Bid Security (Bank Guarantee)
Form – 7C	:	Letter of Acceptance
Form – 7D	:	Deleted
Form – 7E	:	Deleted
Form – 7F	:	Deleted
Form – 7G	:	Deleted
Form – 7H	:	Bank Guarantee for Advance Payment
Form – 7I	:	Performance Bank Guarantee

Forms of Securities

Acceptable forms of securities are annexed. Bidders should not complete Advance Payment Security forms at this time. Only the successful Bidder will be required to provide Advance Payment Securities in accordance with one of the forms, or in a similar form acceptable to the Employer.

Form : 7A
(Please refer Clause 18 of ITB)

Form of Moradabad Bareilly Expressway Limited

The IL&FS Financial Center,
Plot C-22, G Block,
Bandra Kurla Complex,
Mumbai- 400051, Maharashtra
Tel.: +91 022-26593609,

Gentlemen,

Sub.: Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of NH 24 from Km 190.000 to Km 238.000 in the State of Uttar Pradesh

1. We offer to execute the Works described above in accordance with the Bidding Documents including Invitation for Bid, Instructions to Bidders, Conditions of Contract, Specifications and Drawings, Bill of Quantities, Annexures and Addenda for the Prices and sum mentioned in Annexure 1(a) of Section 6 of the Bidding Document attached with this letter.
As per this, the payment for Works is ₹ _____ as per the sum total as given in Annexure 1(a) of Section 6.
2. We understand that you are not bound to accept the lowest or any Bid you receive.
3. Unless and until an Agreement is prepared and executed, this Bid, together with your written acceptance thereof, shall constitute a binding Contract between us, but without prejudice to your right to withdraw such acceptance under the provisions of the Bid Document.
4. We assure you that the criteria based on which we are qualified are valid.
5. We agree to abide by this Bid for the period of ***One Hundred Twenty (120) days*** from the closing date of Bid Submission, and it shall remain binding upon us and may be accepted at any time before the expiry of that period.
6. We understand that for this Bid, we shall comply with the Eligibility, Bid Validity and Bid Security required as stated in the Bidding documents. We attach herewith our current Income Tax clearance certificate.

7. We undertake that, in competing for (and, if the award is made to us, in executing) the above contract, we will strictly observe the laws against fraud and corruption in force in India namely "Prevention of Corruption Act 1988".

Yours faithfully,

Authorized Signature:

Name & Title of Signatory:

Name of Bidder with official seal:

Address :

BID SECURITY (BANK GUARANTEE)

WHEREAS, _____ [name of Bidder] (hereinafter called "the Bidder") has submitted his Bid dated _____ [date] for the works **“Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of NH 24 from Km 190.000 to Km 238.000 in the State of Uttar Pradesh**

” (Hereinafter called "the Bid").

KNOW ALL PEOPLE by these presents that We _____ [name of bank] having our registered office at _____ (hereinafter called "the Bank") are bound unto **Moradabad Bareilly Expressway Ltd** (hereinafter called "the Employer") in the sum of _____ for which payment well and truly to be made to the said Employer the Bank binds itself, his successors and assigns by these presents.

SEALED with the Common Seal of the said Bank this _____ day of _____ 2022

THE CONDITIONS of this obligation are:

- (1) If after Bid opening, the Bidder withdraws his Bid during the period of Bid validity specified in the Form of Bid; or
- (2) If the Bidder, having been notified of the acceptance of his Bid by the Employer during the period of Bid validity:
 - (a) fails or refuses to execute the Form of Agreement in accordance with the Instructions to Bidders, if required; or
 - (b) Deleted
 - (c) does not accept the correction of the Bid Price pursuant to Clause 27 of ITB;

we undertake to pay to the Employer up to the above amount upon receipt of his first written demand, without the Employer having to substantiate his demand, provided that in his demand the Employer will note that the amount claimed by him is due to him owing to the occurrence of one or any of the three conditions, specifying the occurred condition or conditions.

This Guarantee will remain in force up to and including 60 days after the Bid validity period as stated in the Instructions to Bidders or as it may be extended by the Employer, notice of which extension(s) to the Bank is hereby waived. Any demand in respect of this guarantee should reach the Bank not later than the above date.

DATE _____ SIGNATURE OF THE BANK

WITNESS _____ SEAL _____

[signature, name, and address]

(Letterhead paper of the Employer)

Letter of Acceptance

To: [name and address of the Contractor]

[date]

Sub.: Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of NH 24 from Km from Km 148.000 to Km 262.000 in the State of Uttar Pradesh

Dear Sirs,

1. It is hereby confirmed that your Bid received on _____ submitted to the Moradabad Bareilly Expressway Limited (MBEL) for the work mentioned in the subject above has been accepted for and on behalf of the MBEL for an amount mentioned below on rates quoted by you and the terms and conditions as contained in Volume-1 and Volume-2 of bidding documents and subsequently addendum/corrigendum issued.
2. The accepted amount of the bid for the above mentioned work in consideration, execution, completion and maintenance of works by you as prescribed in the bidding documents is as under:

Particulars	Bid amount indicated by you (in ₹)	Amount of Bid after arithmetical corrections (in ₹)	Rebate offered	Bid Amount after Rebate (in ₹.)
MMR Works				
TOTAL				

3. The net accepted amount of the Bid is ₹ _____ (₹ In words).
4. The date of start will be as defined in S. No. 5 of Contract Data.
5. The period of completion of whole work is as defined in S. No. 10 of Contract Data as Contract Completion Date.
6. Deleted.
7. You are also requested to sign and execute the Contract Agreement within 28 days, failing which action as stated in Para 32.3 of ITB will be taken.
8. You are requested to submit a detailed Construction Program including Environment and Traffic Management Plans as per Clause 25 of General Conditions of Contract, Section 3, Part- I within 21 days of receipt of this letter.

Yours faithfully,

Authorized Signatory
Name and Title of Signatory
Name of Agency

Form – 7D
(Please refer Clause 32 of ITB)

Deleted

Form – 7F
(Please refer Clause 31 of ITB)

Deleted

Deleted

Form – 7H (Please refer Clause
47 of GCC)

BANK GUARANTEE FOR ADVANCE PAYMENT

To,
Moradabad Bareilly Expressway Limited
The IL&FS Financial Center,
Plot C-22, G Block,
Bandra Kurla Complex,
Mumbai- 400051, Maharashtra
Tel.: +91 022-26593609,

Bank Guarantee No.-----dated ----- for ₹-----

WHEREAS vide the Contract dated ----- (hereinafter referred to as “the Contract”),
_____ [name of Contractor] a company incorporated under the Companies Act, 1956 and
having its registered office at _____ (hereinafter referred to as the ‘Contractor’
which expression shall unless repugnant to or inconsistent with the context mean and include its successors
and assigns) has been awarded by **Moradabad Bareilly Expressway Limited**, having its registered office
at The IL&FS Financial Center, Plot C-22, G Block, Bandra Kurla Complex, Mumbai- 400051,
Maharashtra, India, (hereinafter referred to as the ‘Employer’ which expression shall, unless repugnant to
or inconsistent with the context, mean and include its successors and assigns), the contract for the works
**“Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of
NH 24 from Km 190.000 to Km 238.000 in the State of Uttar Pradesh”**.

AND WHEREAS it has been stipulated by you in the said Contract that the Contractor shall
furnish you an **Advance Payment Guarantee** security, at the time of forwarding a request for
Advance payment, from a specified **nationalized/scheduled bank**, for the sum proposed to be
released as Advance Payment in accordance with the terms and conditions of the Contract.

AND WHEREAS WE, _____ [name of Bank], a body corporate, constituted under
[relevant Act] and having its head office at _____ and branch office at
_____ have agreed to furnish an Advanced Payment Guarantee for a sum of
₹ _____ (**Rupees _____ Only**) (hereinafter referred as the guaranteed amount) as
security for compliance of the Contractor’s obligations under the Contract;

NOW THEREFORE we hereby affirm that we, as the Guarantor, are responsible to you, on
behalf of the Contractor for the guaranteed amount and we irrevocably undertake to pay you,
upon your first written demand and without demur or argument, any sum or sums within the
limits of the guaranteed amount as aforesaid without your needing to prove or to show grounds
or reasons for your demand for the sum specified herein. The guaranteed amount shall be

payable merely on demand by the Employer. Any certification or letter stating that the amount claimed in the demand notice is due and payable, signed by a duly authorised official of the Employer to this effect, shall be final, binding and conclusive upon us.

We hereby agree to pay on demand the guaranteed amount without demur by crediting to the Bank Account of the Employer, the details of which are to be informed to us by you during the validity of the guarantee.

We hereby undertake that this Guarantee is absolute, irrevocable and unconditional and shall be enforceable against us notwithstanding any security or securities comprised in any instrument executed or to be executed by the Contractor in favour of the Employer.

We hereby also agree that this guarantee shall not be wholly or partially satisfied or exhausted by any payments made to or settled with the Employer by the Contractor and shall be valid and binding on us and operative until the expiry of this Guarantee.

We further agree that no change or addition to or other modification of the terms of the Contract or of the Works to be performed there under or of any of the Contract documents which may be made between you and the Contractor shall in any way release us from any liability under this guarantee, and we hereby waive notice of any such change, addition or modification.

The jurisdiction in relation to this Guarantee shall be the Courts at Mumbai and laws of India shall be applicable. This guarantee shall be valid up to 45 days beyond the stipulated period of complete recovery defined in S. No. 19 of Contract Data _____ (Expiry Date). We hereby agree to renew and extend the validity of this Guarantee on request from you. Unless a demand or claim is lodged within the aforesaid time, i.e. Expiry Date, your rights under this Guarantee shall be forfeited and we shall not be liable there under.

WE hereby represent that there is no litigation or arbitration or other proceedings pending against us which could reasonably be expected to have a material adverse effect or change in our ability to perform our obligation under this Guarantee.

Notwithstanding anything contained herein:

- a) our liability under this Guarantee shall not exceed the guaranteed amount i.e. ₹ _____ (Rupees _____ Only)
- b) this guarantee shall be valid up to _____ (Expiry Date) and
- c) we shall be liable to pay the guaranteed amount under this Guarantee only and only if we receive a written claim or demand duly signed by a duly authorised official of the Employer before the _____ as mentioned above or any other extended date.

IN WITNESS WHEREOF we have executed this Guarantee on this ___ day of ___,
_____.

Signature
Date and place

FORMAT FOR PERFORMANCE BANK GUARANTEE

To,
Moradabad Bareilly Expressway Limited
The IL&FS Financial Center,
Plot C-22, G Block,
Bandra Kurla Complex,
Mumbai- 400051, Maharashtra
Tel.: +91 022-26593609,

WHEREAS:

- (A) (the “**Contractor**”) and **Moradabad Bareilly Expressway Limited** (the “**Client / MBEL**”) have entered into a Contract Agreement dated (the “**Agreement**”) whereby **MBEL** has awarded **Execution of Major Maintenance and Repair Works at Moradabad – Bareilly Section of NH 24 from Km 190.000 to Km 238.000 in the State of Uttar Pradesh** subject to and in accordance with the provisions of the Agreement.
- (B) The Agreement requires the Contractor to furnish a Performance Security to the Client / MBEL in a sum of **5% of Agreed Contract Value (Excluding GST)** as security for due and faithful performance of its obligations, under and in accordance with the Agreement, during the Construction Period (as defined in the Agreement).
- (C) We, through our Branch at (the “**Bank**”) have agreed to furnish this Bank Guarantee by way of Performance Security.

NOW, THEREFORE, the Bank hereby, unconditionally and irrevocably, guarantees and affirms as follows:

1. The Bank hereby unconditionally and irrevocably guarantees the due and faithful performance of the Contractor’s obligations during the Construction Period, under and in accordance with the Agreement, and agrees and undertakes to pay to the MBEL /Client, upon its mere first written demand, and without any demur, reservation, recourse, contest or protest, and without any reference to the Contractor, such sum or sums upto an aggregate sum of the Guarantee Amount as the MBEL / Client shall claim, without the Client / MBEL being required to prove or to show grounds or reasons for its demand and/or for the sum specified therein.
2. A letter from MBEL/Client that the Contractor has committed default in the due and faithful performance of all or any of its obligations under and in accordance with the Agreement shall be conclusive, final and binding on the Bank. The Bank further agrees

that the MBEL/Client shall be the sole judge as to whether the Contractor is in default in due and faithful performance of its obligations during the Construction Period under the Agreement and its decision that the Contractor is in default shall be final, and binding on the Bank, notwithstanding any differences between the Client / MBEL and the Contractor, or any dispute between them pending before any court, tribunal, arbitrator(s) or any other authority or body, or by the discharge of the Contractor for any reason whatsoever.

3. In order to give effect to this Guarantee, the Client / MBEL shall be entitled to act as if the Bank were the principal debtor and any change in the constitution of the Contractor and/or the Bank, whether by their absorption with any other body or corporation or otherwise, shall not in any way or manner affect the liability or obligation of the Bank under this Guarantee.
4. It shall not be necessary, and the Bank hereby waives any necessity, for the Client / MBEL to proceed against the Contractor before presenting to the Bank its demand under this Guarantee.
5. The Client / MBEL shall have the liberty, without affecting in any manner, the liability of the Bank under this Guarantee, to vary at any time, the terms and conditions of the Agreement or to extend the time or period for the compliance with, fulfilment and/ or performance of all or any of the obligations of the Contractor contained in the Agreement or to postpone for any time, and from time to time, any of the rights and powers exercisable by the Client / MBEL against the Contractor, and either to enforce or forbear from enforcing any of the terms and conditions contained in the Agreement and/or the securities available to the Client / MBEL, and the Bank shall not be released from its liability and obligation under these presents by any exercise by the Client / MBEL of the liberty with reference to the matters aforesaid or by reason of time being given to the Contractor or any other forbearance, indulgence, act or omission on the part of the Client/ MBEL or of any other matter or thing whatsoever which under any law relating to sureties and guarantors would but for this provision have the effect of releasing the Bank from its liability and obligation under this Guarantee and the Bank hereby waives all of its rights under any such law.
6. This Guarantee is in addition to and not in substitution of any other guarantee or security now or which may hereafter be held by the Client / MBEL in respect of or relating to the Agreement or for the fulfilment, compliance and/or performance of all or any of the obligations of the Contractor under the Agreement.
7. Notwithstanding anything contained hereinbefore, the liability of the Bank under this Guarantee is restricted to the Guarantee Amount and this Guarantee will remain in force until the successful completion of ***Defect Liability Period of 18 Months from the Date of issue of Completion Certificate*** and unless a demand or claim in writing is made by the Client / MBEL on the Bank under this Guarantee, no later than 6 (six) months from the date of expiry of this Guarantee, all rights of the Client / MBEL under this Guarantee shall be forfeited and the Bank shall be relieved from its liabilities hereunder.

8. The Bank undertakes not to revoke this Guarantee during its currency, except with the previous express consent of the Client / MBEL in writing, and declares and warrants that it has the power to issue this Guarantee and the undersigned has full powers to do so on behalf of the Bank.
9. Any notice by way of request, demand or otherwise hereunder may be sent by post addressed to the Bank at its above referred Branch, which shall be deemed to have been duly authorised to receive such notice and to effect payment thereof forthwith, and if sent by post it shall be deemed to have been given at the time when it ought to have been delivered in due course of post and in proving such notice, when given by post, it shall be sufficient to prove that the envelope containing the notice was posted and a certificate signed by an officer of the Client / MBEL that the envelope, so posted shall be conclusive.
10. This Guarantee shall come into force with immediate effect and shall remain in force and effect for a period as mentioned in point 7 or until it is released earlier by the Client / MBEL pursuant to the provisions of the Agreement.
11. This guarantee shall also be operatable at our _____ branch at Mumbai, from whom, confirmation regarding the issue of this guarantee or extension/ renewal thereof shall be made available on demand. In the contingency of this guarantee being invoked and payment hereunder claimed, the said branch shall accept such invitation letter and make payment of amounts so demanded under the said invocation.

Signed and sealed this day of, 20..... at

SIGNED, SEALED AND DELIVERED
For and on behalf of the
BANK by:

(Signature)
(Name)
(Designation)
(Code Number)
(Address)

NOTES:

- i. The bank guarantee should contain the name, designation and code number of the officer(s) signing the guarantee.
- ii. The address, telephone number and other details of the Head Office of the Bank as well as of issuing Branch should be mentioned on the covering letter of issuing Branch.