OFFICE OF THE SENIOR PROJECT ENGINEER
EXTERNAL PROJECT DIVISION,
BIHAR RAJYA PUL NIRMAN NIGAM LIMITED
7, SARDAR PATEL MARG. PATNA–800015 (BIHAR)
Web: http://brpnn.bih.nic.in, E-mail: externalprojectdivision@brpnn.co.in

(Through e-procurement mode only- www.eproc.bihar.gov.in)

Letter No.:– BRPNN/EPD/C012/363
Patna, Dated:-22.02.2019

EXPRESS  ION OF INTEREST (EOI) FOR STRUCTURAL DESIGN AND NECESSARY DESIGN DETAILING FOR BALANCE WORK OF

Swap and Grade Separated U turn based multi sectional interchange at Bailey Road, Patna (In Between Lalit Bhawan to Vidyut Bhawan) with multiple underpass, Flyover, Elevated Section, U Girders of Extra Dosed Cable stayed structures with state of the art, pavement finished road appurtenances, pedestrian crossing, software controlled Solar Light, Landscaping and integrated drainage system etc. commonly known Ram Manohar Lohia Path Chakra.


<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>State</th>
<th>Name of Project</th>
<th>Bid Security (Rs.)</th>
<th>Bid Processing Fee (Online Payment) (Rs.)</th>
<th>Time of Completion</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Bihar</td>
<td>Structural Design and Necessary Design Detailing for Balance Work of Swap and Grade Separated U-turn based multi sectional interchange at Bailey Road, Patna (In Between Lalit Bhawan to Vidyut Bhawan) with multiple underpass, Flyover, Elevated Section, U Girders of Extra Dosed Cable stayed structures with state of the art, pavement finished road appurtenances, pedestrian crossing, software controlled Solar Light, Landscaping and integrated drainage system etc. commonly known Ram Manohar Lohia Path Chakra.</td>
<td>5,00,000/-</td>
<td>5,900/-</td>
<td>09 (Nine Months)</td>
</tr>
</tbody>
</table>

The Eligibility Criteria and detailed Scope of Work etc. can be seen and downloaded from website: www.brpnn.bih.nic.in / www.eproc.bihar.gov.in

SCHEDULE :

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Activity</th>
<th>Dates &amp; Timing</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Download Date of EoI / Bid Documents</td>
<td>From 01.03.2019 To 29.03.2019 (18:00 Hrs.) (<a href="http://www.eproc.bihar.gov.in">www.eproc.bihar.gov.in</a>)</td>
</tr>
<tr>
<td>2.</td>
<td>Pre-bid Meeting</td>
<td>11.03.2019 at 15.00 Hrs. (Conference Hall of BRPNNL, 7, Sardar Patel Marg, Patna-15)</td>
</tr>
<tr>
<td>3.</td>
<td>Date/Time of Submission/ Uploading of Offer / Bid</td>
<td>30.03.2019 upto 15.00 Hrs. (<a href="http://www.eproc.bihar.gov.in">www.eproc.bihar.gov.in</a>)</td>
</tr>
<tr>
<td>4.</td>
<td>Last Date/Time for submission of Hard Copies of uploaded documents in original in sealed envelope.</td>
<td>01.04.2019 upto 15.00 Hrs. (Office of the Senior Project Engineer, External Project Division / Dy. Chief Engineer, Work Circle-1, Bihar Rajya Pul Nirman Nigam Ltd., 7, Sardar Patel Marg, Patna-800015)</td>
</tr>
<tr>
<td>5.</td>
<td>Date &amp; time for opening of Technical Bid</td>
<td>01.04.2019 at 15: 30 Hrs. (<a href="http://www.eproc.bihar.gov.in">www.eproc.bihar.gov.in</a>)</td>
</tr>
<tr>
<td>6.</td>
<td>Date, time and place of opening of Financial Bid</td>
<td>To be informed later to technically qualified bidders. (<a href="http://www.eproc.bihar.gov.in">www.eproc.bihar.gov.in</a>)</td>
</tr>
</tbody>
</table>

➢ BID should remain valid upto 120 days from the last Date of Submission of EOI.
The technical bid should accompany Earnest Money of Rs.5,00,000/- (Rupees Five Lakh only) in form of DD of any Scheduled / Nationalized Bank in favour of Senior Project Engineer, External Project Division, Bihar Rajya Pul Nirman Nigam Ltd., 7, Sardar Patel Marg, Patna-800015 Payable at Patna.

The Bid Security in original will have to be deposited in the Office of the Senior Project Engineer, External Project Division / Dy. Chief Engineer, Work Circle-1, Bihar Rajya Pul Nirman Nigam Ltd., 7, Sardar Patel Marg, Patna-800015 upto 15:00hrs.(IST)on 01.04.2019

The applicants may download the EoI document from e-procurement website: www.eproc.bihar.gov.in

For participating in e-tendering process, the consultant shall have to get themselves registered to get user ID, Password and digital signature. This will enable them to access the website www.eproc.bihar.gov.in and download/participate in e-tender. Those who are not registered in e-tendering systems, they may contact “e-Procurement HELP DESK, First Floor, Plot No.– M/22, Road No.– 25, Sri Krishna Nagar, Bank of India Compound, Patna–800 001, Contact no.– 0612– 2523006, 9939035696” for registration.

For support related to e-tendering process, bidders may contact at following address “e-Procurement HELP DESK, First Floor, Plot No.- M/22, Road No.-25, Sri Krishna Nagar, Bank of India Compound, Patna-800001, Contact No: 0612-2523006; 9939035696”. Vendor may visit the link “Vendor Info” at www.eproc.bihar.gov.in

Bihar Rajya Pul Nirman Nigam Limited reserves the right to accept or reject any or all applicants without assigning any reason thereof.

Detailed EoI can be seen on website: www.brpnn.bih.nic.in or www.eproc.bihar.gov.in

For any queries please contact:
(i) Prof A. Chawla, IIT Delhi
   Mob No:- +91-9810754507
   Email: achawla64@gmail.com
(ii) Mr. Arun Kumar
    Senior Project Engineer
    External Project Division, B.R.P.N.N. Ltd.
    Mob. No.:+91-9431820171
    E-mail: externalprojectdivision@brpnn.co.in

Sd/-
Senior Project Engineer,
External Project Division,
Bihar Rajya Pul Nirman Nigam Ltd.,
7, Sardar Patel Marg, Patna–800015
1. **Firm Credentials**:
   
   **A. Experience**:
   
   (i) The Designer/Firm must have experience of Design of such interchange structure earlier. The designer/Firm must have more than 20 years of Professional experience in the field of structural design of bridges and interchanges.

   (ii) The Designer/Firm should have key Personnel such as Road Infrastructure Planner or Equivalent, Highway Design Engineer, Bridge & Structural Design Engineer, Mechanical Electro & Plumbing (MEP) expert in its team. Details of such members and their CVs should be included in the technical bid.

   **B. Turnover of the Firm**:

   Annual turnover of the Firm should be equal to or more than 1 (One) Crore in any one of last three financial years.

2. **Last Date of Submission of EOI**:

   Expression Of Interest with all relevant Information including technical and financial bids), must be submitted online on [www.eproc.bihar.gov.in](http://www.eproc.bihar.gov.in) In addition a hardcopy of the technical bid along with necessary documents should be submitted in a sealed envelope to the Office of The Senior Project Engineer, External Project Division / Dy. Chief Engineer, Work Circle-1, Bihar Rajya Pul Nirman Nigam Ltd., 7, Sardar Patel Marg, Patna-800015 by not later than 01.04.2019 upto 3:00 p.m. in the event of this last date being declared as a holiday by the State Government, due date for Submission of above EOI will be the next working day.

3. **Earnest Money**:

   The EOI will accompany an Earnest Money Deposit (EMD) of Rs.5,00,000/- (Rupees Five Lakh Only) in favour of “Senior Project Engineer, External Project Division, Bihar Rajya Pul Nirman Nigam Ltd., payable at Patna” in the following forms:

   a.) Indian Post Office Term Deposit 1 Year / 2 Year / 3 Year; National Saving Certificate; Kishan Vikash Patra-VIIIth Issue duly endorsed by the competent Postal Authority in Bihar;

   b.) Fixed Deposit Receipt of any scheduled Bank which should be valid till 45 days beyond the validity of Bid.

   c.) 6 Year National Development Bond / State Development Loan Certificate.

   d.) Bank Guarantee of any Scheduled Bank in Bihar valid till 45 days beyond the validity of Bid.

   e.) Demand Draft of any scheduled bank having validity till 45 days beyond the validity of Bid.

4. **Pre Bid Meeting**:

   A Pre Bid meeting will be held in Conference Hall of BRPNNL, 7 Sardar Patel Marg, Patna -15, at 03:00pm on 11.03.2019

5. **Technical & Financial bid Opening**:

   Technical Bid should consist of Technical submission as per Sl. No.1 to 6 of TABLE-1 of Clause 6. Designer/Firm be invited to make their presentation before the committee mentioned below in Clause 7 after opening of the Bid. The Bid of Firms having credentials as per serial No.1 above will be opened on a date to be communicated later to the shortlisted bidders. The Bidders or their authorized representatives should be present at the time of opening of Bid in the undersigned Office.

6. **Format Of Bid Evaluation & Validity Of Bid**:

   The technical bid should contain information on the following items:

   i. Proposed High Level Overall Integrated Plan with Structural Design Overview

   ii. Proposed Individual Highlighted Elements

   iii. Proposed Amenities & Ancillary Facilities Plan

   iv. Proposed Smart Integration Plan
v. Key Personnel to be employed in the project, and their CVs.

vi. Proposed completion Time

The bidders shall be asked to make a presentation on the above at the time of the technical evaluation.

Since the project is Multidisciplinary in nature and requires special emphasis on technical input, including design and construction of reasonable complexity, technical evaluation shall be done on the basis of the marks allotted in different categories as follows:

**TABLE-1**

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Evaluation Criteria</th>
<th>Max. Marks</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Proposed High Level Overall Integrated Plan with Structural Design Overview</td>
<td>20</td>
</tr>
<tr>
<td>2.</td>
<td>Proposed Individual Highlighted Elements</td>
<td>20</td>
</tr>
<tr>
<td>3.</td>
<td>Proposed Amenities &amp; Ancillary Facilities Plan</td>
<td>20</td>
</tr>
<tr>
<td>4.</td>
<td>Proposed Smart Integration Plan</td>
<td>20</td>
</tr>
<tr>
<td>5.</td>
<td>Key Personnel</td>
<td>10</td>
</tr>
<tr>
<td>6.</td>
<td>Completion Time</td>
<td>10</td>
</tr>
</tbody>
</table>

**Total Marks**  

100

A minimum of 60 marks, and a minimum of 40% in each category, shall be required for qualification for opening of financial bid.

Financial quotation must be submitted as a Lumpsum Amount in INR (excluding applicable taxes), with separate amount being quoted for the scope of the works categorized in two parts as mentioned in Clause.10.

At the financial stage the lowest bidder for combined cost of Clause 10 amongst the technically qualified bidders shall be considered.

BID should remain valid upto 120 days from the last Date of Submission of EOI.

7. **Evaluation Of Bid :**

The Bid will be evaluated by a committee consisting of Dy. Chief Engineer (Planning Circle), Dy. Chief Engineer (Work Circle-1), Dy. Chief Engineer (Work Circle-2), Sr. Project Engineer, External Project Division, BRPNNL, Patna and Prof. Anoop Chawla, Consultant Incharge from IIT Delhi or his nominee. The date of presentation will be communicated later on or will be uploaded on website www.brpnn.bih.nic.in

8. The Bihar Rajya Pul Nirman Nigam Ltd. reserves the right to accept or reject any or all proposals without assigning any reason thereof.

9. Corrigendum / Addendum if any will be uploaded on the website www.brpnn.bih.nic.in / www.eproc.bihar.gov.in or at the office of the undersigned.

10. Anticipated time of submission of structural designs of required structures, MEP, land scaping with other ancillary works required for the project is nine months.

    As per Clause 6 the scope of work is categorized as follows;

    (i) **Structural Design of different components e.g. Bridges, Underpass, U turns etc.**

    (ii) **Mechanical Electro & Plumbing (MEP), land scaping with other ancillary works required for the project (as detailed in attached annexure).**

11. The Plan & Profile (P & P) of the project developed by Consultant-In-Charge (CI) Prof. Anoop Chawla, IIIT Delhi, will be made available to the selected Firm/Designer to decide the suitable structures with the consultation of Prof. Anoop Chawla. The CI shall oversee/mentor the activities to the development of the concept and drawing thereof. He will enforce any protocol necessary for the same and may give conceptual guidance as and when required.
12. All submissions are to be made in soft copy (pdf, dwg, excel, model input files, word or any other format, as desired) digitally signed by an authorized representative of the bidder, along with 8 hardcopies of the documents (drawings size A0, B&W or coloured as required). The design and drawings shall be approved by BRPNNL only after due vetting by an authorized person and approval by IIT Delhi.

13. Payment to the Consultant shall be made in a stagewise manner as mutually decided between selected Consultant/Firm and BRPNNL.

14. Existing Plan along with the traffic flow plan and the probable list of the structures (.pdf & .dwg format) can be downloaded from link below for preparation of technical submissions. The Consultant can modify and expand the list of structures based on their vision, if it does not change the existing traffic flow plan attached above in anyway.

https://drive.google.com/open?id=14W04mzFbBLzJaS2uM58YrwHVIVzJZGI_

The Participant Consultants are advised to get completely familiar with the existing site conditions and limitations through their own time and effort, before the BID submission.

For any queries please contact.

(i) Prof. A. Chawla, IIT Delhi  
Mob No:- +91-9810754507  
Email: achawla64@gmail.com

(ii) Mr. Arun Kumar  
Senior Project Engineer  
External Project Division, B.R.P.N.N. Ltd.  
Mob. No.: +91-9431820171  
E-mail: externalprojectdivision@brpnn.co.in

Sd/-  
Senior Project Engineer,  
External Project Division,  
Bihar Rajya Pul Nirman Nigam Ltd.,  
7, Sardar Patel Marg, Patna–800015
Terms & Condition:

1. The Unconditional Bank Guarantee from Scheduled/Nationalized Bank should be valid upto 45 days beyond the validity of the Bid.

2. The Bid Processing Fee through online mode i.e. internet payment gateway (Credit Card / Debit Card, Net Banking, NEFT/RTGS) is compulsory.

3. Bids along with necessary online payments must be submitted through e-Procurement portal www.eproc.bihar.gov.in before the date and time specified in the NIT. The department does not take any responsibility for delay/Non submission of tender/Non Reconciliation of online payment caused due to non-availability of internet connection, Network Traffic/Holidays or any other reason.

4. GSTN registration certificate along with Income Tax PAN must be submitted.

5. Copies of original documents defining the constitution or legal status, place of registration, date of incorporation and principal place of business; written power of attorney of the signatory of the Bid to commit the Bidder.

6. Bidder must submit an Affidavit mentioning (a) No Blacklisting (b) No Debbarment by any Government Institutions or BRPNNL (c) Non Rescined of any contract in last one year.

7. An affidavit that the information furnished with the bid document is correct in all respects.

8. It is mandatory to have a minimum turnover of INR 1Cr. (One Crore) related to Design of Civil Construction (Highways & Bridges) work in any of the last three financial years. For verification of such turnover, annual audited account of past three years must be submitted.

9. The bidder is advised that prior to submission of the bid, the Project Site must be visited & inspected so as to get acquainted with the site conditions as well as any other existing conditions. Once the work has been awarded no claim related to project site would be entertained.

10. If the work is not completed within the agreed time frame appropriate action would be taken.

11. The Original documents has to be produced by the bidder upon demand by Compliant Official of BRPNNL.

12. The work quantum may marginally increase or decrease. The documents uploaded are for Bid/Tender purposes only and should not be considered as final.

13. Conditional bids will not be accepted. Work will be completed under rules & regulation of BRPNNL.

14. Bidder must demonstrate an Experience in works of similar nature.

15. Earnest Money will be forfitted if the bidder is found to furnish any wrong certificate/document or claim.

16. The Bihar Rajya Pul Nirman Nigam Ltd. reserves the right to accept or reject any or all proposals without assigning any reason thereof.
Explanation of technical bid items (i) to (iv)

i) Proposed high level overall integrated plan with structural design overview

**What BRPNN expects:**

A comprehensive understanding of the project at high level, demonstrated through basic line drawings (over all plan and typical cross sections)

How the form of structural elements are conceptualised, keeping in mind the site constraints, needs for aesthetics and cost, construction feasibility etc.

High level thought on structure type, span arrangement envisaged

High level geo tech data can be shared with consultants, upon request.

ii) Proposed individual highlighted elements

**What BRPNN expects:**

We expect innovative ideas interwoven into whole scheme. We would evaluate and value individual innovations envisaged by the consultant and would like them to explain their innovations through very basic drawings or sketches.

iii) Proposed Amenity and Ancillary plan

**What BRPNN expects:**

There are a number of amenities and ancillary items listed in the Scope of Work - RMLPC (ancillary) document

We expect you to understand their need and express your vision of how to best incorporate them to raise the quality of the project to a global standard. Each such amenity listed in the document mentioned above can be discussed separately

iv) Proposed Smart integration Plan

**What BRPNN expects:**

This has two components. First: we would like to understand, with so many amenities and conduits and elements present in the project, how the consultant proposes to integrate them at various levels, such as, physical layout, aesthetics, functionality etc.

Second: We also want to integrate the operations and maintenance through smart IT solutions. We would like to the consultant to address their vision for that at high level.
List of Structure for Balance Work.

1. Major Structural Design for bridges and underpasses: Below is the list of structures yet to be designed with its tentative locations highlighted in fig 5.

Starting from the eastern end of the project:

**High Court Junction:**
A) Two vehicular underpass along the bailey road to cater to the staggered tri junctions near Patna High Court and Bihar Museum. These underpasses are to be designed below the OGL for vehicular clearances of minimum 5.5 m. The underpasses need to be equipped with large sumps of enough capacity as part of the mitigation strategy in case of chances of water accumulation develops in the underpasses. Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”. Out of two, one vehicular underpass near Income Tax Golumbia is partly designed. Details can be obtained from Undersigned Office.

**Hartali Mor junction**
B) (i) Two bridges, along the bailey road at Hartali Mor junction (Integral Spine Beam: As envisaged in the tender document). Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

   (ii) Two underpasses perpendicular to Bailey road connecting serpentine road and Boring Canal road below the Bridges mentioned above. Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

   (iii) Two ramps and part of underpasses connecting right turning movements (4 in number). Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

**Boring Canal Road**
C) (i) One Swap Bridge and (ii) one swap underpass along Boring Canal road. Please refer attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”. The swap bridge was envisaged in tender was of extradosed kind. Because the road geometry has already changed at this location from what was envisaged in the tender, designer can take a call on bridge type.

**Punai Chak Junction**
D) (i) Two bridges along bailey road (Envisaged as Integral Spine Beam type in the tender document). Please refer the attached .dwg drawing with file name “Traffic Flow Plan and road geometry.dwg”.
(ii) A depressed rotary at Punai Chak, below the above mentioned bridges. Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

(iii) Ramps connecting the depressed rotary from all sides of the road (8 in number). Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

(iv) Design of Vehicular cum pedestrian underpass nos. 2 between Vikas Bhawan to Visveswaraya Bhawan and Suchana Bhawan to Open land near PunaiChack

E) Lalit Bhawan Junction
De-linking of ramp portion for the right turning movement and the ramp of bridge at Lalit Bhawan, so that stage wise construction can be achieved, facilitating a better traffic flow during construction. Please refer the attached drawing in .dwg format with file name “Traffic Flow Plan and road geometry.dwg”.

Providing a provision for opening in the ramp of right turning movement from Bailey road towards Circular road (please refer .dwg drawing with file name “Traffic Flow Plan and road geometry.dwg”), for facilitating pedestrian movement.

F) Pedestrian Cum Vehicular Underpass connecting a) Vishwesrariyabhawan (near PunaiChak) and Vikas Bhawan & b) Pedestrian cum vehicular underpass connecting Soochna Bhawan with Vacant land across Bailey road. The allowable height should be only for small vehicles. Shown in Fig 5

G) Pedestrian underpass near High Court connecting the Bus Bays on the bailey road across each other. Shown in Fig. 5
FIG. 2

Already Completed and should not be considered as part of scope.

Rest of the drawing is part of scope.

Please make special note that at location 2 in the fig 1, only roads marked as R-17 and R-18 are complete till the bridge and underpass structures, hence out of the current scope. Rest of the roads for left turning movements are still part of the scope.
Already Completed and should not be considered as part of scope.

Rest of the drawing is part of scope.

Please make special note that at location 2 in the fig 1, only sump below R-17 has been considered and side drains along with utility corridors are yet to be designed, hence they remain as part of scope.
Already Completed and should not be considered as part of scope.

Rest of the drawing is completely part of scope.

Please make special note that At location 1 & 2 in the fig 1, only sumps below R-17 and R-05 and R-02 has been considered and side drains along with utility corridors are yet to be considered for necessary water proofing

In part highlighted as 1 in fig 3, the drainage of the bridge protonions are not provisioned for as of now, hence they would be part of the scope.

Also no provision for cross drainage is provided, hence would constitute the part of current scope
Highlighted portion, partially not part of scope. The structure is erected but the aesthetic rendering and landscaping still remain in scope.
pedestrian cum vehicular underpass (3.0 m height and 15 m width)
Bus bay canopies
Design of ancillary items.

1. Drainage related structures: The plan and profile of the drainage related items will be provided along with the highway plan and profile. Design needs to be submitted for construction of the drainage related components. For highlighted part only, (as shown in fig. 2), the design has been completed, rest of it remains in the scope of work. This includes drainage and utility corridors subject to cross and parallel vehicular movement.
2. Waterproofing: Fool proof water proofing mechanism must be planned and should be part of drainage mechanism. Water proofing plan scope is available corresponding to the figure 3.
3. Electrical Conduit Plan: Plan for laying of electrical conduits encompassing all the items needing electrical supply and control. This needs to be completed for whole of the project. Conduits needs to be provided for future addendums such as electric BRTS etc.
4. Electro-mechanical-plumbing: There are provisions of establishing electro mechanical plumbing equipment’s and systems across the project at suitable junctions. This needs to be completed for the whole of the project. Major points needing such design would be the sumps below underpasses.
5. Lighting Plan: Illumination plan and subsequent lighting provisions (road + pedestrian + landscaping areas) has to planned, this illumination plan should not only cater to the mandatory lighting requirements as per IRC, but also should serve towards creating aesthetic lighting and lighting of involved structures. This has to be done for the whole of the project.
6. Light Design: The lighting infrastructure has to be designed for each of its elements. (To be done for the whole of the project)
7. Solid Waste Disposal Plan: As the project is planned for intensive public movement and use, all kind of waste generation and its disposal must be planned. (to be done for whole of the project)
8. Solid Waste Bin Design: Individual items included in the plan needs to be designed (to be done for the whole of the project)
9. Road Signages: Road signages for vehicles and pedestrians needs to be planned and designed.(to be done for the whole of the project)
10. Road Marking: Road markings needs to be placed suitably for this type of interchange and concept. (to be done for the whole of the project)
11. Pedestrian facilities have to be planned for safe movement and easy accessibility of pedestrians across the project. This includes provision for paths, staircases, lifts, escalators, over bridges, underpasses (two highlighted in fig 5) etc. (to be done for the whole of the project)
12. Pedestrian Pavement Design: Pedestrian paths, staircases and linkages has to be provisioned for and needs to be designed for its material, aesthetics and surface treatment, installation process, maintenance system and process. (To be done for the whole of the project)
13. Landscaping: Landscaping must be provided for the project in terms of design, installation and maintenance. (To be done for the whole of the project)
14. Overall Aesthetics structures and surfaces open for public view: This project not being a typical bridge structure, and due to its position in middle of the urban environment at a very important stretch of Patna, with the kind of importance it has received by its patrons, special attention to its aesthetics needs to be provided: which includes, Cladding of Structures, finished of structures, Architectural Grooving’s in structures and form and shape of structures involved. (To be done for the whole of the project)

15. Solar Panel Installation Plan: The project envisaged harnessing of solar energy to reduce its overall carbon footprint and gather green credentials. (To be done for the whole of the project)

16. Panic button provisions: For enhanced public safety panic button systems needs to be placed and installed across the project. (To be done for the whole of the project)

17. IT System Plan: For smooth operations and maintenance, the systems discussed above needs to be software controlled and smartly integrated, that includes lighting as well. (To be done for the whole of the project)

18. Bus bay design: Bus bays need to be designed for its functionality and aesthetics. (To be done for whole of the project)

19. Design of canopy above bus bay: Project has provisions of high canopied for complete weather protection of its users and enhanced aesthetics. These canopies need to be designed for its full functionality, structural strength and aesthetics. (To be done for the whole of the project). Please see Figure7.

20. Design of any minor building structure such as pump room, system control room, structure above pedestrian facilities. etc as envisaged.

21. Design of any structure demolished and to be reconstructed by BRPNL for execution of this project. (Part of it has been done as shown in fig 4)

22. Pavement design for vehicular movement as and when necessary. There is an existing design for rigid pavement available, This needs to be designed only if the need for departure from existing design is envisaged.

23. Utility Corridor: A utility corridor has to be provided throughout the project (along and across). From Chainage 0 till 700 hundred such corridors are provisioned for hence out of the scope of the project. For rest of the project this is still in the current scope of work.

24. Fire Fighting and ventilation: If at all required at any stretch. The possibility must be kept open until ruled out completely by a relevant expert.

25. Provisions for installation of escalators, lifts or travellators as needed to enhance pedestrian facilities.
Already Completed and should not be considered as part of scope.

Rest of the drawing is part of scope.

Please make special note that at location 2 in fig 1, only roads marked as R-17 and R-18 are complete till the bridge and underpass structures, hence out of the current scope. Rest of the roads for left turning movements are still part of the scope.
Already Completed and should not be considered as part of scope.

Rest of the drawing is part of scope.

Please make special note that at location 2 in the fig 1, only sump below R-17 has been considered and side drains along with utility corridors are yet to be designed, hence they remain as part of scope.
Already Completed and should not be considered as part of scope.

Rest of the drawing is completely part of scope.

Please make special note that At location 1 & 2 in the fig 1, only sumps below R-17 and R-05 and R-02 has been considered and side drains along with utility corridors are yet to be considered for necessary water proofing

In part highlighted as 1 in fig 3, the drainage of the bridge protions are not provisioned for as of now, hence they would be part of the scope.

Also no provision for cross drainage is provided, hence would constitute the part of current scope
Highlighted portion, partially not part of scope. The structure is erected but the aesthetic rendering and landscaping still remain in scope.
FIG 5

- pedestrian underpass

- North
- Boring Canal
- High Court
- East
- West
- Punai Chak
- Hartali Mor
- South
Bus bay canopies

FIG 7
Bid Security (Unconditional Bank Guarantee)

WHEREAS, ________________________________ [Name of Bidder] (hereinafter called "the Bidder") has submitted his bid dated __________ [Date] for the ________________________________ [Name of Contract] (hereinafter called "the Bid").

KNOW ALL MEN by these presents that We ________________________________ [Name of Bank] of ________________________________ [Name of Country] having our registered office at ________________________________ (hereinafter called "the Bank") are bound unto ________________________________ [Name of Employer] (hereinafter called "the Employer") in the sum of ________________________________*1 for which payment well and truly to be made to the said Employer the Bank binds himself, his successors and assigns by these presents.

SEALED with the Common Seal of the said Bank this ___ day of_______ 20__.

THE CONDITIONS of this obligation are:

(1) If the bidder withdraws his Bid during the period of bid validity specified in the Form of Bid:

OR

(2) If the Bidder refuses to accept the correction of errors in his Bid:

OR

(3) 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 Contract Agreement in accordance with the Instructions to Bidders, if required; or

(b) fails or refuses to furnish the Performance Security, in accordance with the Instructions to Bidders;

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

This Guarantee will remain in force up to and including the date __________ days after the deadline for submission of bids as such deadline is 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 _________________________________________
I Ravish Kumar S/o Sri Rajendra Prasad Singh age 38 resident of Village/Mohalla Road No-9 Rajeev Nagar, P.O. Keshri Nagar, P.S. Rajeev Nagar Dist. Patna, Pin Code 800024 do hereby solemnly affirm and declare as under :-

(1) That I am the Proprietor of M/s. Ravish Kumar

(2) That the above named prop./firm/company is not blacklisted by Central Govt. / any department of any State Govt. / any PSU of any State govt. or Central Govt.

(3) That the said prop./firm/company is presently not debarred from tendering by Central Govt. / any department of any State Govt. / any PSU of any State govt. or Central Govt.

(4) That I also hereby certify that any contract awarded to us has not been rescinded, during last one year prior to the date of this bid by Central Govt. / any department of any State Govt. / any PSU of any State govt. or Central Govt.

(5) That I also affirm/undertake that all the facts and documents submitted by me are genuine and also signed by the genuine person(s).

In the case of any documents and / or information furnished is found false or is objected to by any of the persons concerned, the Department/Nigam will be at liberty to take appropriate action.

Deponent

Place :

Date :