



भारतीय राष्ट्रीय राजमार्ग प्राधिकरण

(सड़क परिवहन और राजमार्ग मंत्रालय, भारत सरकार)

National Highways Authority of India

(Ministry of Road Transport & Highways, Govt. of India)

क्षेत्रीय कार्यालय : एफ-120, जनपथ, श्याम नगर, जयपुर-302019

Regional Office : F-120, Janpath, Shyam Nagar, Jaipur-302019

Tel. (O) / फोन : (ऑ.) 0141-2292056, 2292049

E-mail / ई-मेल : rojaipur@nhai.org Web. / वेब : www.nhai.gov.in



क्रमांक: NHAI/18013/1/2021-ROJ/Permission-OH Crossing 132 KV/RVPNL/297/NH-148D, km 116-117 /2300 दिनांक: 09.11.2023

INVITATION OF PUBLIC COMMENTS

विषय: Proposal for grant of permission for overhead crossing of 132 KV S/C Shahpura-Jahajpur Transmission line between Km. 116+00 to 117+00 on Gulabpura-Uniayara section of NH-148D at Shahpura City, Distt-Bhilwara in the state of Rajasthan by RVPNL - reg.

सन्दर्भ: (i) SE (T&C), RVPNL, Bhilwara letter no. RVPN/SE/T&C/BHL/2023-24/F. Tech/D.537 dated 14.08.2023.

(ii) PD, PIU-Sawaimadhopur letter no. NHAI/PIU-SWM/NH-148D/13016/2/2023/RVPNL/7081 dated 30.10.2023 (receive in this office on 07.11.2023).

Sir,

It is to inform all concern that SE (T&C), RVPNL, Bhilwara vide letter cited under ref. (i) above has submitted a proposal for the subjected work and PD, NHAI, PIU, Sawaimadhopur has submitted the above proposal vide letter under reference (ii) for approval of the Competent Authority, Highway Administration.

2. The proposal is for grant of permission for overhead crossing of 132 KV S/C Shahpura-Jahajpur Transmission line between Km. 116+00 to 117+00 on Gulabpura-Uniayara section of NH-148D at Shahpura City, Distt-Bhilwara in the state of Rajasthan by RVPNL.

3. As per Para-4 of Ministry's Circular No. RW/NH-33044/29/2015S&R(R) dated 22.11.2016, the Highway Administration shall be put out in the public domain for 30 days for seeking claims and objections (on grounds of public inconvenience, safety and general public interest).

4. In view of the above, before approval of the competent authority, the comments/objections of affected public is hereby invited with reference to the Ministry's circular dated 22.11.2016 due to overhead crossing of 132 KV transmission line across the subjected project stretch. The objections/comments may be addressed to the below mentioned address upto 08.12.2023, beyond due date, no comments/objections will be accepted.

The Regional Officer, Regional Office - Jaipur

National Highways Authority of India,

F-120, Janpath, Shyam Nagar, Jaipur (Raj.)-302019,

Tel : 0141-2292049, 2292054 Email : rojaipur@nhai.org

This issues with the approval of Highway Administration-cum Regional Officer, NHAI, Jaipur

महोदय,
(मनोर्ज खोड़ा)
प्रबन्धक (तकनीकी)

- Copy to: (i) Web Admn., NHAI, HQ, New Delhi - for uploading in NHAI's website [web-admin@nhai.org]
(ii) Director, NIC, New Delhi - for uploading in Ministry's website. [mansoor@nic.in]
(iii) PD, PIU-Sawaimadhopur: for information.
(iv) SE (T&C), RVPNL, Bhilwara: for information.



सत्यमेव जयते

भारतीय राष्ट्रीय राजमार्ग प्राधिकरण

National Highways Authority of India

(सड़क परिवहन और राजमार्ग मंत्रालय, भारत सरकार)
(Ministry of Road Transport & Highways, Government of India)

परियोजना कार्यान्वयन इकाई-सवाई माधोपुर
मकान नं० 12, श्याम सरोवर, पटेल नगर, आलनपुर, सवाई माधोपुर - 322021 (राज.)

Project Implementation Unit - Sawai Madhopur

House No. 12, Shyam Sarover, Patel Nagar, Alanpur, Sawai Madhopur - 322021 (Raj.)

Ph. No. : 07462-294310, E-mail / ई-मेल : piusawaimadhopur@nhai.org Web. / वेब : www.nhai.gov.in



NHAI/PIU-SWM/NH-148D/13016/2/2023/RVPNL/7081

30.10.2023

श्रीमान् क्षेत्रीय अधिकारी, महोदय
क्षेत्रीय कार्यालय, राजस्थान,
भारतीय राष्ट्रीय राजमार्ग प्राधिकरण
एफ-120, जनपथ, श्याम नगर,
जयपुर - 302019

M(T)-MK



विषय: राष्ट्रीय राजमार्ग संख्या-148 डी गुलाबपुरा उनियारा पथांश के दो लेन मय पेव्ड शोल्डर के निर्माण कार्य हेतु - **Permission for overhead crossing of 132 KV S/C Shahpura-Jahajpur Transmission Line between Km 116+000 to 117+000 on NH-148D at Shahpura City, Shahpura, Bhilwara in the state of Rajasthan - reg**

- प्रसंग- 1. SE (T&C) RVPNL, Bhilwara letter no RVPN/SE/T&C/BHL/2023-24/F. TECH/D. 537 dated 14.08.2023 (Received in this office on 16.08.2023)
2. This office letter no NHAI/PIU-SWM/NH -148D/13016 /5/2021/AP/6892 dated 22.08.2023
3. Authority Engineer letter no LNM / PIU/SWM/NH - 27/09/2023 - 24/803 dated 11.09.2023 (Received in this office 21.09.2023)
4. Govt. of Rajasthan Circular no प०/1 (4) राज -6/2001/पार्ट/02 दिनांक 25.04. 2016
- 5 RVPNL Circular no F&R no. 1277 dated 08.05.2019

Sir,

A proposal for grant permission for overhead crossing of 132 KV S/C Shahpura-Jahajpur Transmission Line between Km 116+000 to 117+000 on NH-148D at Shahpura City, Shahpura, Bhilwara in the state of Rajasthan vide Superintending Engineer (T&C) RVPNL, Bhilwara letter under reference (1).

2] The proposal was forwarded to Authority Engineer of the project vide letter dated 22.08.2023 (ref-(2)) for site verification & examination as per Ministry's guidelines issued vide letter no. RW/NH-33044/29/2015/S&R(R) dated 22.11.2016.

3] After due verification & site inspection, Authority Engineer of the project vide its letter dated 11.09.2023, which was received in this office on dated 21.09.2023 (ref-(3)) has submitted their comments and recommended the proposal for approval.

4] The permission for overhead crossing may be considered as per the details given in checklist and as per site conditions & comments as below-

Contd -2


- a. The crossing of new 132 KV transmission line is proposed to be located from km. 116.555 to 116.580, Transmission line from our project highway road is crossing toward from Left hand side to Right hand side.
- b. The location where crossing of new 132 KV Transmission line is to be laying comes in the **2-lane** section and at this location the road construction work has been done in foundation width of **12.00 Meter** and ROW available at this location is **45.00 M.**
- c. The vertical clearance of the proposed 132 KV line is 16 meters over the FRL of the project highway 148D **which complies minimum clearance of IRC32 and RVPN Circular F&R No 1277 dated 08.05.2019 i.e. 6m & 11.60m, respectively.**
- d. The tower pole of the transmission line is being erected at a Horizontal distance of 65 meters from the center line of the left side and 83 meters from the center line of the Right-hand side.

5] The checklist, undertaking as per MORTH Guideline dated 22.11.2016 is appended with the proposal.

In view of the above, the proposal for grant permission for overhead crossing of 132 KV S/C Shahpura-Jahajpur Transmission Line between Km 116+000 to 117+000 on NH-148D at Shahpura City, Shahpura, Bhilwara is herewith recommended for approval of Competent Authority.

Thanking you,

भवदीय


(मनोज कुमार शर्मा) 30/10/23
परियोजना निदेशक

Encl: As above.

Copy to- Superintending Engineer (T&C) RVPNL Bhilwara- for your kind information please

CHECK -LIST

Guidelines for processing the proposal for lying of utility line in the land along National Highways vested with NRIAI/PWD/BRO.

General Information

1. Name and address of the Applicant/Agency :- Rajasthan Rajya Vidyut
Prasaran Nigam Ltd. Jaipur
2. National Highways No. :- NH-148 D
3. State :- Rajasthan
4. Location :- Near Shahpura City.


Uniyara-Gulabpura Highway, Distt.-Shahpura

5. Chainage in KM :- Between 116.555-116.580
6. Length in M :- Overhead crossing
7. Width of available ROW in both side :- 45 Mtrs (22.5 Mtr either
side from centre of line)
8. Side of NH(Left or right side of NH towards
Increasing change/KM direction) :- Overhead crossing


9. Name of Highways Authority of NHA1/PWD/BRO :- NHAI

10. Highway Administration address :- Highway administration
Cum Regional Officer MORTH, DCM,
Ajmer Road, Jaipur
Project Implementation Unit, PD (SWM),
H. No. 12, Shyam Sarovar, Patel Nagar,
Alanpur, Sawai Madhopur - 322021



Executive Engineer (T&C)
RRVNL, BHILWARA


Junior Engineer-I (T&C)
RRVNL, Bhilwara


Assistant Engineer-I (T&C)
RRVNL, Bhilwara


SUPERINTENDING ENGINEER (T&C)
RRVNL, BHILWARA


Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.


उप प्रबंधक (तक)
भा.रा.रा.प्रा., पकाई-रावाई माधोपुर

**Name of the Transmission Line:-132 KV S/C Shahpura- Jahazpur Interconnection
Overhead High Tension Transmission Line**

Crossing Tower Loc. No. 17 - 132KV S/C TTDD+6 & Loc. No. 18 - 132KV S/C TTD+6 on NH-148D

ANNX- A

CROSSING DETAILS:

1	Name and Details of the NH Crossing	132 KV S/C Shahpura- Jahazpur Interconnection Overhead High Tension Transmission Line for crossing on National highway -148 D.
2	Height of crossing Towers	Loc. No. 17 132KV S/C TTD+6 = 20.43 Mtr Loc. No. 18 132KV S/C TTD+6 = 20.43 Mtr
3	Situation of the crossing	Near Shahpura City, Gulabpura Highway, Dist.- Shahpura
4	Span at crossing	150 Mtr.
5	Angle of Crossing	90°
6	Structure used to cross the existing power line and its deviation of angle	NA
7	Conductor used to cross the power line and its detail	ACSR Panther Conductor
8	Right Of Way For Line	27 mtr.
9	Minimum Sag at 0° , No wind	
10	Maximum Sag at 85° , No wind	
11	Clearance Under Maximum sag condition between lowest conductor of the proposed line and NH-148D	16.40mtr

Resonant Design
JEN (T&C)
Bhilwara
Junior Engineer-I (T&C)
RRVNL, Bhilwara

Resonant
Assistant Engineer -I (T&C)
RRVNL, Bhilwara

Resonant
Executive Engineer (T&C)
RRVNL, BHILWARA

Resonant
SUPERINTENDING ENGINEER (T&C)
RRVNL., BHILWARA

Resonant
Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.

Resonant
उप प्रबंधक (तक)
भा.रा.स.प्रा. पकाई-सवाई माधोपुर

Resonant
PROJECT DIRECTOR
NHAI, PIU Sawai Madhopur

Name of the Transmission Line:-132 KV S/C Shahpura- Jahazpur Interconnection
Overhead High Tension Transmission Line
Minimum and Maximum SAG calculation

ANN-D

Crossing Tower Loc. No. 17 132KV S/C TTD+6 & Loc. No. 18 132KV S/C TTD+6 on NH-148D

$$\text{SAG FORMULA} = \frac{WL^2}{8T}$$

Where : W = Unit Weight of Conductor in Kg/mtr
 L = Span length in mtr
 T = Tension of conductor at 0° C temp.
 and 35° C temp.

Minimum "Sag" (0° C No wind)

Where : W = 0.974Kg/mtr
 L = 150.00 m
 T = 2650Kg

$$\text{Sag} = \frac{0.974 \times 150 \times 150}{8 \times 2650} \quad \begin{matrix} 21915 \\ 21200 \end{matrix}$$

$$= 1.034 \text{ Mtr}$$

Maximum "Sag" (35° C No wind)

Where : W = 0.974 Kg/mtr
 L = 150.00 m
 T = 1450 Kg

$$\text{Sag} = \frac{0.974 \times 150 \times 150}{8 \times 1450} \quad \begin{matrix} 21915 \\ 11600 \end{matrix}$$

$$= 1.889 \text{ Mtr}$$

Pranod Desai
 JEn (T&C)
 Bhilwara

Junior Engineer - I (T&C)
 RRVPNL, Bhilwara

Pranod
 Assistant Engineer - I (T&C)
 RRVPNL, Bhilwara

Pranod
 Executive Engineer (T&C)
 RRVPNL, BHILWARA

Pranod
 Resident Engineer
 L.N. Malviya Infra Projects Pvt. Ltd.

Pranod
 SUPERINTENDING ENGINEER (T&C)
 RRVPNL., BHILWARA

उप प्रबंधक (तक)
 भा.सा.सा.प्रा. पकाई-सवाई माधोपुर

CHECK-LIST

Sr. No.	Item	Measurement Observations as per site conditions.	Month Norms
1	Details of already laid utility service, if any	NIL	Enclosed
2	Whether up gradation of the stretch in near future is proposed or not	NO	
	(a) if yes, provision of utility adversely affect the plan of up gradation	NA	Not affect plan of up-gradation
3	Laying of the utility service along the National Highways.		
3.1	Location of proposed utility service along the stretch	NA	Utility Duct/beyond the toe line of the embankment and drains, and close to the extreme edge of the ROW
3.2	Depth of top of utility service from ground level	NA	0.6 meter
3.3	Mechanism for crossing water channel	NA	Through utility duct (if provision exists) or beneath the bed of water channel
3.4	Whether ROW is restricted in this stretch?	NA	
3.4.1	If yes, whether provision of land acquisition is required to lay utility	NA	
	(a) if yes, whether undertaking for land acquisition along with relevant L.A. details has been furnished	NA	
3.4.2	Width of concrete duct, if utility service are proposed to be laid in concrete ducts	NA	Not less than one lane
4	Laying of utility service across the NH	NA (Overhead Electrical Power Line crossing)	
4.1	Whether Existing drainage structures is allowed to carry the utility lines.		Not to be allowed
4.2	Proposed crossing of utility service	Overhead Electrical Power Line crossing	Perpendicular to NPH
4.3	Type of casing pipe/conduit carrying the utility line	NO	Steel, cast iron, or reinforced cement concrete and have adequate strength
4.4	Whether ends of the casing/conduit pipe are sealed from the outside	NA	Sealed
4.5	Length of casing/conduit pipe crossing NH	NA	Extend from drain to drain in cuts and toe to toe of slope in the fills

SUPERINTENDING ENGINEER (T&C)
RRVPNL., BHILWARA

Executive Engineer (T&C)
RRVPNL, BHILWARA

Junior Engineer-I (T&C)
RRVPNL, Bhilwara

Assistant Engineer-I (T&C)
RRVPNL, Bhilwara

Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.

प्रबंधक (तक)
पा. पकाई-सवाई माधोपुर

4.6	Depth of top of the casing/conduit pipe	NA	At least 1.2 m below the top of subgrade
4.7	Crossing method in case of CC Pavement	NA	Only boring method (HDD)
4.8	Horizontal and vertical clearances in case utilities are allowed overhead	EHV line structure i.e towers are 65 Mtrs from road center (LHS) & 83 Mtrs from road center (RHS)	In accordance with IRC codes.
5	Document/Drawing enclosed with the proposal	NA (Overhead Electrical Power Line crossing)	
5.1	Cross-section showing the size of trench for open trenching method	NA	enclosed, if applicable
	(a) Trench width	NO	more than 30cm and less than 60cm wider than the outer diameter of the utility pipe
	(b) Filling of trench	NO	as per Ministry guidelines vide letter No. RW/NH-34044/29/2015/S&R® dated 22.11.2016
	(c) Location of trench	NA	extreme edge of the ROW
5.2	Cross section showing the size of pit and location of conduit for HDD method	NA	enclosed, if applicable
5.3	Strip plan/Route plan showing utility line, chainage, width of ROW, distance of proposed utility from the edge of ROW, important mile stone, intersections, cross drainage works etc.	Enclosed	Enclosed
5.4	Plan and profile drawing of trench showing cross section of road at 20m distance along with ROW and proposed utility	Enclosed	Enclosed
6	Methodology for laying of utility line	NA (Overhead Electrical Power Line crossing)	Enclosed
7	Draft license agreement is as per Ministry guidelines vide letter no. RW/N-34044/29/2015/S&R® dated 22.11.2016 and signed by two witness	Enclosed	Enclosed
8	License fees in favour of MORTH RPAO Jaipur		As per Ministry vide circular No. RE/NH-34044/29/2015/(S&R) dated 22.11.2016
9	Whether Bank Guarantee has been obtained		As per Ministry vide circular No. RE/NH-34044/29/2015/(S&R) dated 22.11.2016
	(a) If yes, whether confirmation of BG has been obtained as per MORTH/NHAI guidelines	Enclosed	

SUPERINTENDING ENGINEER (T&C)
RRVNL., BHILWARA

Executive Engineer (T&C)
RRVNL, BHILWARA

Junior Engineer-I (T&C)
RRVNL, BHILWARA

Resident Engineer

L.N. Malviya Infra Projects Pvt. Ltd.

Assistant Engineer-I (T&C)
RRVNL, BHILWARA

प्रबंधक (तक)
पकाई-सवाई माधोपुर

10.1	Undertaking for not to damage other existing utility, if damaged then to pay the losses to either to MORTH/NHAI or to the concerned agency	Enclosed	Enclosed
10.2	Undertaking for renewal of Bank Guarantees and when asked by NHAI/MORTH	Enclosed	Enclosed
10.3	Undertaking for confirming all standard condition of MORTH/NHAI guidelines.	Enclosed	Enclosed
10.4	Undertaking for shifting of utility as and when asked by MORTH/NHAI within a month at their own cost.	Enclosed	Enclosed
10.5	Undertaking for indemnity against all damages and claims	Enclosed	Enclosed
10.6	Undertaking for management of traffic movement during laying of utility line without hampering the traffic.	Enclosed	Enclosed
10.7	Undertaking that if any claim is raised by the concessionaire/contractor then the same has to be paid by the applicant	Enclosed	Enclosed
10.8	Undertaking that the applicant has obtained various safety clearances from the representative authorities such as directorate of electricity, Chief controller of explosive safety organization, oil industry safety Directorate, State/Control Pollution control Board and any other statutory clearances applicable, before applying to Highway administration.	Enclosed	Enclosed


The Right of the Way (ROW) of the National Highway available at the proposed location from the center line of divided carriageway is (.....) (from center of ROW to edge of ROW towards proposed utility)

The above particulars along with the drawings and documents have been verified and certified as correct as per prevailing site conditions.

Name Designation & Signature of
the authorized representative of applicant


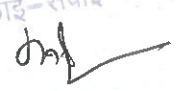
Name Designation
concerned field authority


SUPERINTENDING ENGINEER (T&C)
RRVNL., BHILWARA


Executive Engineer (T&C)
RRVNL, BHILWARA


Junior Engineer-I (T&C)
RRVNL, Bhilwara


Assistant Engineer-I (T&C)
RRVNL, Bhilwara


Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.

PROJECT DIRECTOR
NHAI, PIU Sawai Madhopur

CERTIFICATE

1. Undersigned has examined the proposal of the applicant for Stringing of ACSR Panther Conductor for Construction of **132 KV S/C Shahpura- Jahazpur Interconnection Overhead High Tension Transmission Line** by **Rajasthan Rajya Vidyut Prasaran Nigam Ltd. Jaipur (Raj.)** for crossing on **National highway -148 D** between chainage no. **116.555 to 116.580** (Near Shahpura City) at Shahpura, Distt-Shahpura in the state **Rajasthan** and confirm that the all standard conditions issued vide Ministry Circular No. **RW/NH-33044/29/2015/S&R®** dated **22.11.2016** has been followed.
2. It is certified that any other of utility line would be extremely difficult and unreasonable costly and installation of utility line within ROW will not adversely affect the design, stability & traffic safety of the highway nor the likely future improvement such as widening of the carriageway, easing of curve etc.
3. I will ensure supervision of the work of lying of utility and ensure that the defects in road portion after lying of utility are corrected.
4. I will notify/forfeit the BG for claims for damages done/disruption in working, if any.
5. I will ensure that proposed permission in entered the register of records.
6. The record of previous approval, if any has been considered and copy of same enclosed with the proposal.


Name Designation & Signature of
Concerned field authority of NHAI/PWD/BRO


Junior Engineer-I (T&C)
RRVNL, Bhilwara


Assistant Engineer-I (T&C)
RRVNL, Bhilwara


Executive Engineer (T&C)
RRVNL, BHILWARA


Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.


उप प्रबंधक (तक)
भा.रा.स.प्रा., पकाई-सवाई माधोपुर


SUPERINTENDING ENGINEER (T&C)
RRVNL., BHILWARA



RAJASTHAN RAJYA VIDYUT PRASARAN NIGAM LIMITED

[Corporate Identity Number (CIN):U40109RJ2000SGC016485]

Regd. Office: Vidyut Bhawan, Jyoti Nagar, Jaipur-302005

O/O THE SUPERINTENDING ENGINEER (T&C) RVPNL BHILWARA

E-mail: se.tnc.bhilwara@rvpn.co.in

Undertaking

It is to undertake that the work execution of 132 KV S/C Shahpura- Jahazpur Interconnection Overhead High Tension Transmission Line by Rajasthan Rajya Vidyut Prasaran Nigam Ltd. Jaipur (Raj.) for crossing on National Highway -148 (D) Uniyara- Gulabpura NH between chainage KM 116.555 to 116.580 near Shahpura Distt. Shahpura in the state Rajasthan is being to be carried out as per enclosed profile and drawing. Following circular/standards with the terms and condition specified by the NHAI are being strictly followed by the RVPNL for execution of this work.

1. We undertake, not to damage to other utility, if damaged then to pay the losses either to NHAI or to the concerned agency.
2. MORT&H circular no. NHIII/P/20/77 dated 08.04.1982/RW/NH-33044/29/2015/S&R(R) dated 22.11.2016 circular for accommodation of underground electric power lines on National highway land.
3. IRC32-1969-Standard for vertical and horizontal clearance of underground electric power and telecommunication lines as related to roads.
4. IS 5613(part3/sec2):1989-is code of EHV lines for road crossings.
5. For conforming standard condition of ministry circulars and NHAI guidelines will be followed.
6. We undertake shifting of EHV line as and when required by NHAI at our own cost.
- 7 We undertake shifting of EHV line due to six laning /widening of NH.
- 8 We undertake for indemnity against all damages and claims.
- 9 We undertake for traffic movement during crossing of EHV line to be managed by applicant.
- 10 We undertake that any claim is raised by the confessional then the same will be paid by the applicant.
- 11 We undertake that prior approval of the NHAI shall be obtained before undertaking any work of installation, shifting or repairs or alterations to the EHV line/any other utility located in the National Highway Right of Way.

Junior Engineer - I (T&C)
RRVPL, Bhilwara

Assistant Engineer - I (T&C)
RRVPL, Bhilwara

Executive Engineer (T&C)
RRVPL, BHILWARA

Resident Engineer
L.N. Malviya Infra Projects Pvt. Ltd.

उप प्रबंधक (तक)
भा.स.स.प्रा. पकई-सवाई माधोपुर

SUPERINTENDING ENGINEER (T&C)
RRVPL., BHILWARA