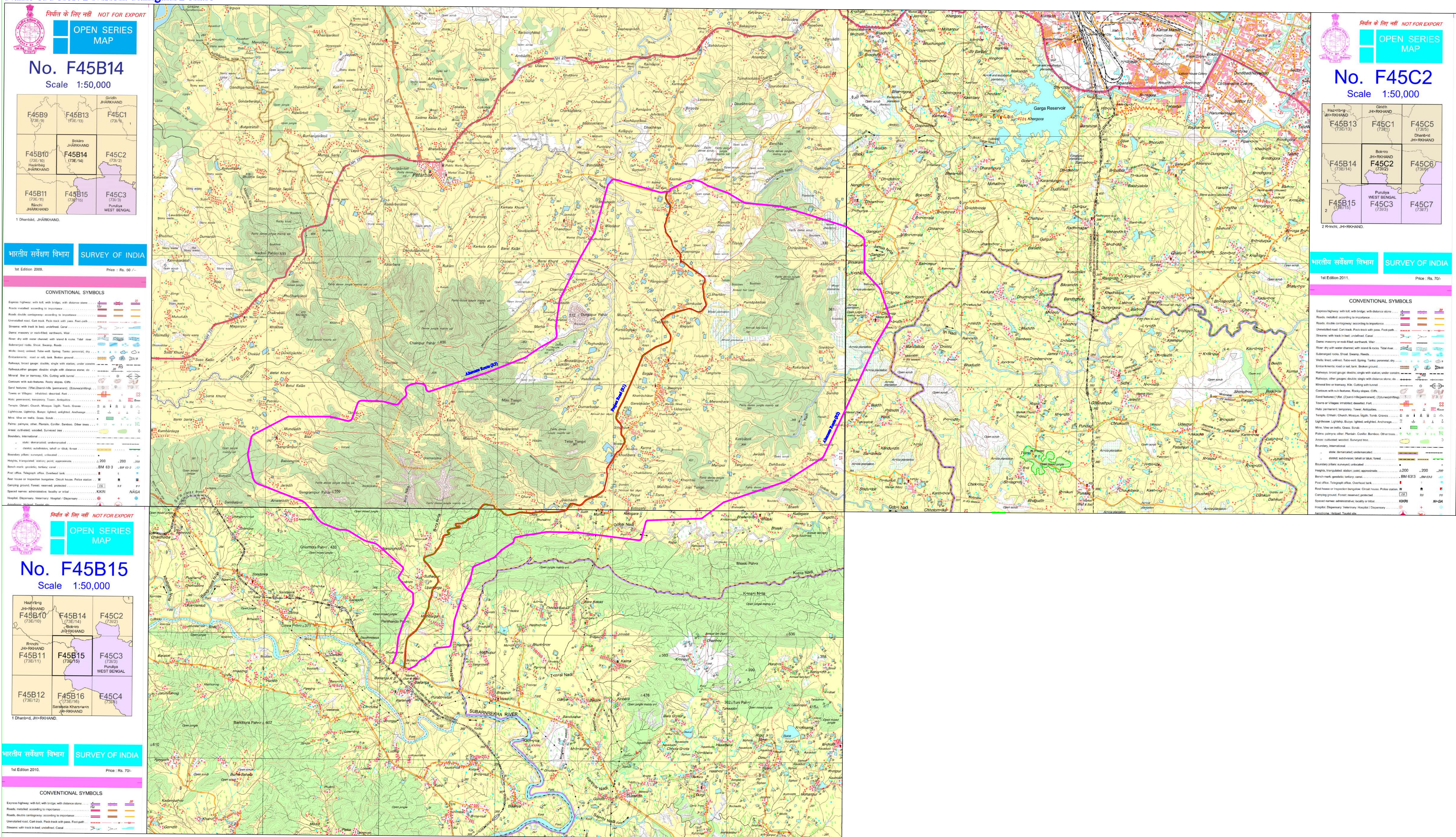


Project Name:-Widening/Strengthening & Reconstruction of Barlanga-Nemra-Pirgul-Kasmar
(Bahadurpur(on NH-23)-Kasmar kherachater Upto West Bengal Border)Road.

Name of Forest Division:-Ramgarh/Bokaro

ALTERNATE ROUTE MAP PLAN



JUSTIFICATION FOR LOCATING THE PROJECT

The project road initiated by the Road construction Department Govt. of Jharkhand.

The Govt. of Jharkhand has emphasized the need for a well-laid road network for its all rounder development. In order to achieve it, the project has been sanctioned as per ground reality is of paramount importance. The Project Name, Widening/Strengthening & Reconstruction of Barlanga - Nemra- Pirgul-Kasmar (Bahadurpur (on NH-23)-Kasmar-Kherachater upto West Bengal border) road (Length-27.608 KM) into 2-lane with Paved shoulder, Ramgarh & Bokaro District in the state of Jharkhand.. Proposed road is (ODR) starts from after 4 Km from (RCD Road-MDR-10) Silli More- Jhalida Road upto Jharkhand border road near Barlanga, PS- Ramgarh and ends at Kasmar Main Road, (ODR) in Bokaro District and passed through village- Barlanga, Uparbarga, Chaura, Dawadih, Bhursatanar, Murhulsudi, Pirgul, Khudibera, Singhpur, Bagda, Bagiyari, Jamkudar, Manjura, Jharmunga, Gar. the above road passes through L.W.E. effected area. Road user will save time and energy to reach his destination. Hence his project road is of paramount importance. In view of Law & Order.

The existing road having crest width 5.5 meter black Top/Pec and Forest Patch in Unconnected and sum part earthen road is 3.0/3.75 which seems to be insufficient and inconvenient to cater the traffic. The proposed project is for the intermediate lining of the existing road requiring widening black to 10 meter with 1m. Earthen shoulder both side having total toe width 30m. This road will provide a safe and fast traffic movement for local people as well as the forest officials. Project Highway comprises the section from Km 00+000 to 09+260 in Ramgarh District and Km 09+260 to Km 27+608 in Bokaro district in the state of Jharkhand, Chainage 4+400 to 9+885 is in forest and unconnected from Nemra to Pirgul.

location At Ch- 0+000 to 4400 Barlanga to Nemra is the RCD Road C.W-5.5m (ODR Road).

At Ch-4+400 to 9+885 is in forest and unconnected and its Green Field Road (Road Code undefined.)

At Ch- 9+450 to 13+845 Village Road (REO Road- C.W-3.05m)

At Ch- 13+845 to 27+300 (Dabhadih to Kasmar) ODR road (CW-5.5m)

Start Point: 23°26'49.71"N, 85°50'32.09"E

End Point: 23°36'20.24"N, 85°56'8.75"E


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पथ प्रमण्डल, बोकारो



JUSTIFICATION FOR LOCATING THE PROJECT

The project road initiated by the Road construction Department Govt. of Jharkhand.

The Govt. of Jharkhand has emphasized the need for a well-laid road network for its all rounder development. In order to achieve it, the project has been sanctioned as per ground reality is of paramount importance. The Project Name, Widening/Strengthening & Reconstruction of Barlanga - Nemra-Pirgul-Kasmar (Bahadurpur (on NH-23)-Kasmar-Kherachater upto West Bengal border) road(Length-27.608 KM) into 2-lane with Paved shoulder, Ramgarh & Bokaro District in the state of Jharkhand. Proposed road is (ODR) starts from after 4 Km from (RCD Road-MDR-10) Silli More- Jhalida Road upto Jharkhand border road near Barlanga, PS- Ramgarh and ends at Kasmar Main Road, (ODR) in Bokaro District and passed through village- Barlanga, Uparbarga, Chaura, Dabhadih, Bhursatanar, Murhulsudi, Pirgul, Khudibera, Singhpur, Bagda, Bagiyari, Jamkudar, Manjura, Jharmunga, Gari, kasmar the above road passes through L.W.E. effected area. Road user will save time and energy to reach his destination. Hence his project road is of paramount importance. In view of Law & Order.

The existing road having crest width 5.5 meter black Top/Pcc and Forest Patch in Unconnected and sum part earthen road is 3.0/3.75 which seems to be insufficient and inconvenient to cater the traffic. The proposed project is for the intermediate lining of the existing road requiring widening black to 10 meter with 1m. Earthen shoulder both side having total toe width 30m. This road will provide a safe and fast traffic movement for local people as well as the forest officials.

Alignment at same locations in a strip, depending upon the stretches which will be used for the construction of the road.


Executive Engineer

Road Construction Department

Road Division, Bokaro



Project Road (R1)	Alternate Route (R2)	Alternate Route (R3)
Length- 27.300 kms. The minimum forest land to be used in this route is 16.4108 hectares and private land is 49.0701 hectares. This alignment has the lowest cost and minimum use of forest land. So this is the best possible route. There is no other alternative route from Barlanga directly to Kasmar.	Length - 36.000 km In this route forest land will be more used when we go through and densely populated village areas to be the main problem to handle with design speed demand. consequently hilly and valley areas included with this alignment. hence the road alignment number R1 shall use the best possible route with minimum forest land as well.	Length - 34.000 km In this route alignment maximum forest land will be used .Consequently there will be less village connectivity due to by-pass alignment i.e the alignment goes through less populated areas. hence the road alignment number R1 shall use the best possible route with minimum forest land as well.

Due to the rich forests in Ramgarh and Bokaro districts, without affecting any forest land, the proposed road construction is not possible as per detailed Survey report.

It has been told that the area of forest land included in the proposed alignment for this project is minimum in Ramgarh and Bokaro districts as well.

In case of Project Route (R1), Alternate Route (R2) and Alternate Route (R3), the forest land included in the proposed final alignment (Project Route-R1) for this project in Ramgarh and Bokaro districts is being used the least.

[Signature]
29/09/2023

Executive Engineer
Road Construction Department
Road Division, Bokaro

[Signature]
29/9/23
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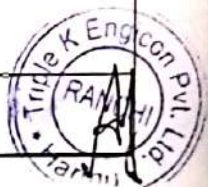
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**Project Name:- Widening/Strengthening & Reconstruction
of Barlanga - Nemra-Pirgul-Kasmar(Bahadurpur (on NH-23)-Kasmar-Kherachater upto West Bengal border) road(Length-27.608 KM)
into 2-lane with Paved shoulder.**

(Comparative statement of Alternate route Alignment)

Sl. no	Details	Alignment-R1	Alignment-R2	Alignment-R3
1	Length of Road	27.300 km	36.000 km	34.000 Km
2	R & R	328758 Sqm	257725 Sqm.	301512 Sqm.
3	Bridges	1N x21M 1N x12.M	1N x21M 3N x24.M	2N x24M 1N x21m
4	VUP	Nil	Nil	Nil
5	Culvert	Size	Size	Size
		1.5m x 1.5m	1.5m x 1.5m	1.5m x 1.5m
		2.0m x 2.0m	2.0m x 2.0m	2.0m x 2.0m
		3.0mx2.0m	3.0mx2.0m	3.0mx2.0m
		5.0m x 3.0m	5.0m x 3.0m	5.0m x 3.0m
6	Name of Villages passing through	6.0m x 3.0m	6.0m x 3.0m	6.0m x 3.0m
		Bridge	Bridge	Bridge
		Bridge	Bridge	Bridge
6	Name of Villages passing through	Start Point Hethbarga, Uparbarga, Chora, Khudibera, Murhulsudi Bagda, Pirgul, Singhpur, Bagdari, Jamkudar, Manjura, Jharmunga, Garri, Kasmar villages.	Start Point Hethbarga, Uparbargatarr, lipu, sundro, chilgara, gangjori, pat hria, badkitand, telmunga villages.	Start Point Hethbarga village, Uparbarga, Raoro, Chora, hulu, mundudihmu ndla, tandil, kadla, durgapur, ranitand madhukarpur, mayapur, sarjudih villages.
7	Merits	Length of Road and cost of Road is relatively on lower side as compared to other Alignment. It Passes through existing as well as By-pass of villages as per requirement of widening of road in future ,due to which R & R Cost increased as compared to other Alignment. This Alignment Connects most villages, provide smooth and futuristic plan for future connectivity.	Length of Road and cost of Road is high As compared to Project road (Alignment-R1). Most of the Alignment are virgin due to which R & R Cost is less but cost of structure will indirectly increases the total cost of the project. It connects some of the villages where Existence of Road is very Less. Consequently it increases the Cost of Land acquisition for the project. Hence suitable Alignment-R1 is taken for this project.	Length of Road and cost of Road is high As compared to Project road (Alignment-R1), as well as the cost of road is high due the Alignment passes through Green field Area and hilly areas. Total project cost should be high due to the demand of high embankment as well at Different stretches of the alignment. It Passes through High Gradient in Forest patch as well in Hethbarga-Uparbarga region .Hence the Alignment R1 is Best for the project.



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महोदय, 29/09/2023

अभिमान
29/09/23
पत्र निर्माण विभाग

JUSTIFICATION:-

Without Affecting Any Forest Land, The Proposed Road Construction is not possible,
Due to Rich Forests in Ramgarh and Bokaro Districts

It has been verified through our Survey Team that the area of Forest Land Includes In
the Proposed Alignment for this Project is Minimum in Ramgarh and Bokaro districts.

The forest land included in this proposed final alignment (Alignment-R1),
in Ramgarh and Bokaro districts is being used the least, As Compared to the Alignment-R2 & R3.


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पथ अवर प्रमण्डल



**Project Name:-Widening/Strengthening & Reconstruction
of Barlanga - Nemra-Pirgul-Kasmar(Bahadurpur (on NH-23)-Kasmar-Kherachater upto West Bengal
border) road(Length-27.608 KM) into 2-lane with Paved shoulder.**

(Cost Analysis Sheet)

Details	Alignment 1	Alignment 2	Alignment 3
Type of Terrian Length R & R (Cost)	Plain And Hilly 27.300 km 0.5 Cr	Plain And Hilly 36.000 km 0.4 Cr	Plain And Hilly 34.000 Km 0.9 Cr
Cost of Road Work (Cr.)	116.666 Cr.	132.565 Cr	137.325 Cr
Bridge (Cost)	3.19 Cr.	4.92 Cr.	4.56 Cr.
Cost of Culvert	7.70 Cr.	9.17 Cr.	9.35 Cr.
VUP	Nil	Nil	Nil
Land Type	Forest Land	Forest land	Forest land
	Private land	Private land	Private land
	In Hec.	In Hec.	In Hec.
	16.4108	21.2564	22.1245
	49.0701	57.2354	55.3247
Total Area	65.4809	78.4918	77.4492
Cost for Land Acquisition	45.77 Cr	62.77 Cr.	58.23 Cr
Total Cost of Project	188.865 Cr.	208.794 Cr	211.327 Cr



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