



भारतीय राष्ट्रीय राजमार्ग प्राधिकरण
(सड़क परिवहन और राजमार्ग मंत्रालय)
National Highways Authority of India
(Ministry of Road Transport & Highways)

उप महाप्रबंधक (तकनीकी) सह परियोजना निदेशक के कार्यालय
परियोजना कार्यान्वयन इकाई

Office of the Deputy General Manager (Tech) cum Project Director
Project Implementation Unit

प्लॉट नंबर : 3, सूर्या टवर्स, दूसरी मंज़िल, पूर्व पहले स्ट्रीट, के.के. नगर, मदुरै - 625 020, तमिलनाडु.

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Ref: NHA/PIU/MDU/NH744A/I/01/2022/3489

Date: 08.12.2022

To

The District Forest Officer,
Madurai District,
Madurai.

Sir,

Sub: NHA- PIU, Madurai - Four lane divided carriageway from Vadipatti (Design Chainage 0+000) to Thamaraipatti (Design Chainage 29+960) stretch of Madurai Ring Road section of NH-744A on EPC mode under Bharatmala Pariyojana Phase-I in the state of Tamil Nadu - Diversion of forest land proposal (Madurai Ring Road - FP/TN/ROAD/32148/2018 - Diversion of Reserve Forest land for the Formation of Project highway in the Waguthumalai RF - Request for Forest Clearance - Reg

Ref:

- 1) The PCCF, Chennai Lr.No: C.No.TS4/7185/2018 Dated: 18.10.2022.
- 2) This office Lr. No. NHA/PIU/MDU/NH744A/I/01/2022/2812 Dt: 29.09.2022.
- 3) The CF & FD, SMTR, Madurai Lr.No: 1160/2019/D1 Dated: 22.09.2022
- 4) The DFO, Madurai Lr.no. D1/1173/2018 Dt: 20.09.2022.
- 5) This office Lr. No. NHA/PIU/MDU/NH744A/I/01/2022/2601 Dt: 08.09.2022.
- 6) Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC), Chennai Lr. No. 4-TNB091/CHN-2022/905 Dt. 24.08.2022.

Kind reference is invited to reference 6th cited, wherein Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC) made observation on the proposal for diversion of 1.28 Ha Forest land for 60 m width and 210m length from km: 3+480 to km: 3+690 in Forest area recommended by the State Government on 05.08.2022. The said observation of IRO, Chennai is regarding clarifications related to (i) Enrichment plantation in the future widening area, (ii) To revise the CA Scheme to 2.56 Ha, i.e. twice the extent of diverted RF

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land, (iii) To furnish the correct list of fauna, (iv) Whether felling of spontaneous trees involved and (v) Recommendation of GoTN for Wildlife overpass and underpass proposed by UA in-lieu of elevated corridor.

On the above observation, NHAI, PIU, Madurai has submitted the compliance report to the DFO, Madurai on 08.09.2022 vide reference 5th cited and requested for early approval of Stage - I clearance.

Subsequently, the CF&FD (SMTR), Madurai&DFO, Madurai and NHAI, PD, Madurai jointly inspected the proposed project alignment in Waguthumalai RF on 15.09.2022. During the site visit, CF, Madurai observed that, NHAI has commenced the Formation of four lane Highway work in private land adjoining to RF land on both sides. Further, CF, Madurai asked NHAI to reduce the width to 30m in the RF area. In response, NHAI, PD, Madurai has requested for 60m width explaining the technical necessity.

However, on 20.09.2022, DFO, Madurai while submitting the compliance to the observations of IRO, MoEF&CC recommended for reduced width of 30m. In continuation, vide reference 3rd cited, CF & FD, SMTR, Madurai recommended that the width proposed for the formation of road needs to be restricted to 25m in order to avoid the further damage of Flora and Fauna in Waguthumalai Reserve Forest and the area required for diversion may be restricted to 1.28 Ha in the proposed Waguthumalai Reserve Forest for wildlife conservation.

Due to the above recommendation of reduced width of 25m, vide reference 2nd cited User Agency (NHAI) has requested for diversion of required RoW of 60m and area of 1.28 Ha Reserve Forest land which is the barest minimum, by substantiating the technical requirement in detail.

Vide reference 1st cited, PCCF, Chennai, dated: 18.10.2022, made some observations regarding (i) Extend of Compensatory Afforestation and (ii) width of RoW land required in Forest land.

In response, on 18.11.2022, NHAI, RO-Madurai and PD-Madurai met DFO, Madurai and explained the reason for necessity of 60m land width and also explained with drawing the reasons for earlier proposal of 60 m width of land, including working space requirement at site due to about 8 m depth of cutting involved. Further, the width of cutting involved just adjacent to forest land at km 3+710 is also about 58 m due to cutting involved. The right of way of 60m or more

is already acquired for the entire project length of 29.960 km outside the forest area of 210 m length.

The compliance to the observations/ EDS received vide reference-1 is submitted as below:

S. No.	Observations/ EDS	Compliances
1.	<p>Attention of the Conservator of Forests & Field Director, SMTR, Madurai and District Forest Officer, Madurai is invited to the references 3rd & 4th cited. The reply furnished by the District Forest Officer for the query no: 2 (i.e.) Compensatory Afforestation scheme is not accepted. The Compensatory Afforestation scheme has to be prepared for twice the area proposed for diversion (i.e.) 2.56 ha in degraded forest area for the projects of Government of India as per Forest Conservation Act 1980 guidelines in para.no:2.5 (i) and 2.8(ii) of Handbook. Hence the District Forest Officer is requested to revise the Compensatory Afforestation scheme for 2.56ha of degraded forest area as per the Government of India guidelines.</p>	<p>The compensatory afforestation scheme may be prepared by District Forest Officer for twice the area proposed for diversion i.e. 2.56 Ha in degraded forest land for the project of Government of India as per Forest Conservation Act 1980 guidelines in para.no:2.5 (i) and 2.8 (ii) of Handbook.</p> <p>NHAI undertakes to deposit amount for Compensatory Afforestation (CA) for 2.56 ha in degraded land.</p>
2.	<p>The user agency has proposed for diversion of forest land to a width of 60 m and the proposal has already been recommended to the Government to the requested width of 60 m and the total extent proposed for diversion is 1.28 ha. Now, in the reference 3d cited, the District Forest Officer has stated that the area required for the project may be restricted to a width of 30 m and the Conservator</p>	<p>Meeting were held with DFO, Madurai and CF, Madurai during which the necessity of 60m RoW to accommodate the provision of road along with other facilities, like shoulders, utility corridor, slope protection, working space and also future expansion has been appraised.</p> <p>60 m Right of Way (RoW) is required for construction of Four Lane Highways as per Para No. 2.3</p>

<p>of Forest & Field Director, SMTR, Madurai has reported that the proposed road width needs to be restricted to 25 m Total area now recommended by the District Forest Officer and the Conservator of Forest & Field Director has not been reported due to reduction of width. The Conservator of Forest & Field Director and the District Forest Officer are requested to discuss this issue with the user agency, as the decision has to be arrived at based on technical parameters and report the actual width and area now recommended for the above project. They are requested to send the full pledged report along with all supporting documents immediately.</p>	<p>Right of way (Page. No. 9) of IRC: SP: 84 - 2019 Manual of Specifications and Standards for Four Lining of Highways. Relevant page of IRC code is enclosed for ready reference. Less than 60 m RoW will not solve the purpose of the proposed project and will compromise with Specifications and Standards for proposed Four Laning of Highway. Less than 60 m RoW will create bottle neck and may lead to accidents and traffic jam in that area. Hence, it is requested for FC for 60m RoW.</p>
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Therefore, clarifications/justifications of the points pertaining to User Agency/NHAI is submitted for further necessary action.

Encl:

As above.

Yours faithfully



(V. Nagaraj)

DGM (T) & Project Director
PIU - Madurai

Copy submitted for information to:

1. Addl. Principal Chief Conservator of Forests (C), IRO, MoEF&CC, Chennai.
2. The Additional Chief Secretary to the Government of Tamil Nadu, Environment & Forests Department, Chennai.
3. The Principal Chief Conservator of Forest, Chennai.
4. The Regional Officer, NHAI, Madurai.
5. The Conservator of Forest, Madurai.

C.No.TS4/7185/2018

Office of the Principal Chief Conservator of Forests
(Head of Forest Force), Forest Headquarters
Building, Guindy Velachery Main road,
Near Kannikapuram Checkpost,
Guindy, Chennai - 600 032.

Dated: 18.10.2022

- Sub: Forests - Forest (Conservation) Act, 1980 – SMTR, Madurai Circle / Madurai Division - Proposal for diversion of 1.593 ha (npw revised as 1.28ha) of forest land for the preparation of DPR for development of Economic Corridors, Inter Corridors, Feeder Routes and Coastal Roads to improve the efficiency of freight movement in the State of Tamil Nadu – Online proposal submission by the User Agency ie. The Project Director, National Highways Authority of India, Madurai - Regarding.
- Ref: 1. Online application uploaded by the User Agency – The Project Director, National Highways Authority of India, Madurai, dated: 19.02.2018. (FP/TN/Road/32148/2018).
2. GOI, MoEF&CCChe-6 F.No:4-TNB 091/CHN-2022/905 dated 24.08.2022.
3. DFO, Madurai Ref.No:1173/2018/D1 dated 20.09.2022
4. CF&FD, SMTR, Madurai Ref.No:1160/2019/D1 dated 22.09.2022.

Attention of the Conservator of Forests & Field Director, SMTR, Madurai and District Forest Officer, Madurai is invited to the references 3rd & 4th cited. The reply furnished by the District Forest Officer for the query no:2 ((i.e) Compensatory Afforestation scheme is not accepted. The Compensatory Afforestation scheme has to be prepared for twice the area proposed for diversion (i.e.) 2.56ha in degraded forest area for the projects of Government of India as per Forest Conservation Act 1980 guidelines in para.no:2.5 (i) and 2.8(ii) of Handbook. Hence the District Forest Officer is requested to revise the Compensatory Afforestation scheme for 2.56ha of degraded forest area as per the Government of India guidelines.

2) The user agency has proposed for diversion of forest land to a width of 60m and the proposal has already been recommended to the Government to the requested width of 60m and the total extent proposed for diversion is 1.28ha. Now, in the reference 3rd cited, the District Forest Officer has stated that the area required for the project may be restricted to a width of 30m and the Conservator of Forest & Field Director, SMTR, Madurai has reported that the proposed road width needs to be restricted to 25m. Total area now recommended by the District Forest Officer and the Conservator of Forest & Field Director has not been reported due to reduction of width. The Conservator of Forest & Field Director and the District Forest Officer are requested to discuss this issue with the user agency, as the decision has to be arrived at based on technical parameters and report the actual width and area now recommended for the above project.

They are requested to send the full pledged report along with all supporting documents immediately.

Sd/- V. Karunapriya
for Principal Chief Conservator of Forests
(Head of Forest Force)

To
The Conservator of Forests & Field Director, SMTR Madurai Circle, Madurai.
The District Forest Officer, Madurai Division, Madurai.
Copy to the Project Director, NHAI, Madurai.

/True copy/By order/

P. Anandh
Senior Draughting Officer
18/10/2022

भारतीय राष्ट्रीय राजमार्ग प्राधिकरण
(सड़क परिवहन और राजमार्ग मंत्रालय)
National Highways Authority of India
(Ministry of Road Transport & Highways)

उप महाप्रबंधक (तकनीकी) सह परियोजना निदेशक के कार्यालय
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Office of the Deputy General Manager (Tech) cum Project Director
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प्लॉट नंबर : 3, सूर्या टवर्स, दूसरी मंजिल, पूर्व पहले स्ट्रीट, के.के. नगर, मदुरै - 625020, तमिलनाडु.
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Ref: NHA/PIU/MDU/NH744A/I/01/2022/2812

Date: 29.09.2022

To

The District Forest Officer,
Madurai.

Sir,

Sub: NHA- PIU, Madurai - Four lane divided carriageway from Vadipatti (Design Chainage 0+000) to Thamaraipatti (Design Chainage 29+960) stretch of Madurai Ring Road section of NH-744A on EPC mode under Bharatmala Pariyojana Phase-I in the state of Tamil Nadu - Diversion of forest land proposal (Madurai Ring Road - FP/TN/ROAD/32148/2018 - Diversion of Reserve Forest land for the Formation of Project highway in the Waguthumalai RF - Request for Forest Clearance - Reg

- Ref: 1) The DFO, Madurai Lr.no. D1/1173/2018 Dt: 20.09.2022.
2) This office Lr. No. NHA/PIU/MDU/NH744A/I/01/2022/2601 Dt: 08.09.2022
3) Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC), Chennai Lr. No. 4-TNB091/CHN-2022/905 Dt. 24.08.2022.

Vide reference 3rd cited, Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC) made observation on the proposal recommended by the State Government and requested to submit clarifications on the said proposal for further consideration.

Accordingly, NHA, PIU, Madurai has submitted the compliance report to the DFO, Madurai on 08.09.2022 vide reference 2nd cited and requested for early approval of Stage - I clearance.

Subsequently, The CF, Madurai & DFO, Madurai and NHA, PD, Madurai jointly inspection the proposed project alignment in Waguthumalai RF on 15.09.2022. During the site visit, CF, Madurai observed that, NHA has commenced the Formation of four lane Highway work in private land adjoining to RF land on both

sides. Also observed that, the width of completed highway road in adjoining RF land is around 25 - 30 m.

Further, CF, Madurai asked NHAI to reduce the width of RF land diversion for the Formation of four lanes Highway to 30 m instead of 60 m to minimise the land extent for diversion. In response, NHAI, PD, Madurai requested for 60m width and this is inevitability due to geometric requirements. However, DFO, Madurai has submitted the compliance to the observations of Principal Chief Conservator of Forests (Head of Department) and recommended vide reference 1st cited as follows:-

SL.NO	ESSENTIAL DETAIL SOUGHT (EDS)	COMPLIANCE
01	As per the component wise requirement, the space left for future widening and tree plantation is 0.5861 Ha, i.e. around 50%, of the area is left for future widening. If possible, this area shall be left un-felled and if required, enrichment planting such as avenue trees shall be planted. Planting scheme in this case along with cost shall be prepared and submitted.	<p>It is to submit that Highway proposed to traverse 210m in RF land to negotiate a natural gradient of 1 in 28 involves cutting of 0.45m to 8m, accordingly the average width of land left for future widening and plantation is 17.50m out of 60m ROW. Accordingly, area of land proposed for future widening and plantation is 0.36 Ha.</p> <p>However, on recent inspection on 15-Sep-2022, it is seen to that, the User Agency of NHAI has started and almost completed the work on Non-forest areas (211.73 Ha) involved in the project. It is observed that the width of already laid road outside the Reserve Forest is around 25-30 m. As this project is laying for Ring road, the width of the road inside Waguthumalai RF needs to be restricted to 30 m and future widening is not required for Ring road passing inside Reserve Forest. Therefore, the area required for the project may be restricted for 30 m. Thereby it is also informed that, the felling of trees would be very minimal and not arise planting scheme for the said area.</p>

Ans

In view of above, it is kindly submitted that, NHAI undertakes formation of Madurai Ring Road to bypass the Madurai city by connecting all feeder routes which in turn to reduce the traffic congestion and to improve the efficiency of freight movement in the city. By considering that, the User Agency (NHAI) proposed for diversion of Reserve Forest land for a width of 60 m as equal to ROW in the entire project highway in private land. The components with width as per TCS - 2 enclosed as Annexure are as follows:-

SL.NO	COMPONENT	WIDTH
01	Main carriageway (2 x 7m)	14 mtrs
02	Median including kerb shyness	05 mtrs
03	Paved shoulder (2 x 1.5m)	03 mtrs
04	Earthen shoulder (2 x 2m)	04 mtrs
05	Drainage (2 x 4m)	08 mtrs
06	Utilities (2 x 2m)	04 mtrs
07	Slope protection (2 x 7m)	14 mtrs
	TOTAL	52 mtrs

The above requested width of 60 m for diversion is in consideration of present and future widening as well. Hence, in place of recommended 30 m width of land in RF area, it is requested to recommend for 60 m width and which is the barest minimum in the entire stretch of the project Highway.

Further, it is pertinent to mentioned that under 2.2(iii) of "Handbook of FCA - 1980, FCR - 2003, Guidelines and clarifications" published by MoEF, Gol that the Projects for Roads and Railway line construction will be processed in their entirety. Therefore, proposals in piece meal should not be submitted. A note on the present and future requirement of forest land is required to be submitted along with the proposals.

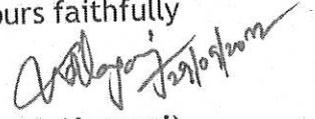
It is submitted that, the existing trees in the area proposed for avenue plantation and future widening portion may be allowed to exist till further widening in future.

In view of above, it is kindly requested to consider and recommend the total width of 60 m, for Diversion of Reserve Forest land for the Formation of four lane carriageway in the proposed Project highway of 210 m length in Waguthumalai RF land and for early approval of Stage - I clearance, which may help in expediting the Project Highway completion.

Encl:

- 1) Annexure (TCS - 2)

Yours faithfully

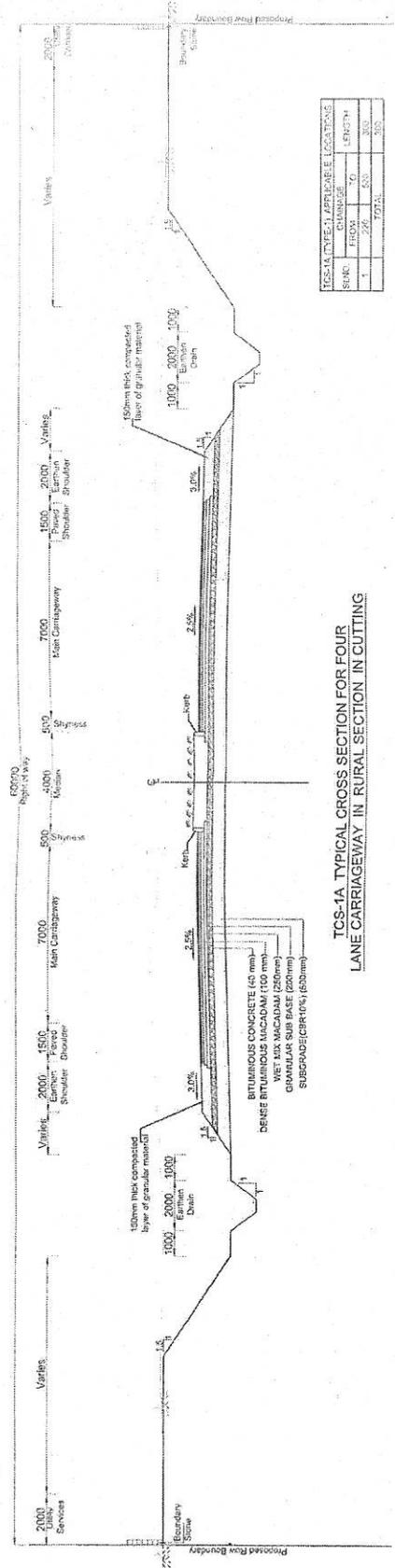


(V. Nagaraj)

DGM (T) & Project Director
PIU - Madurai

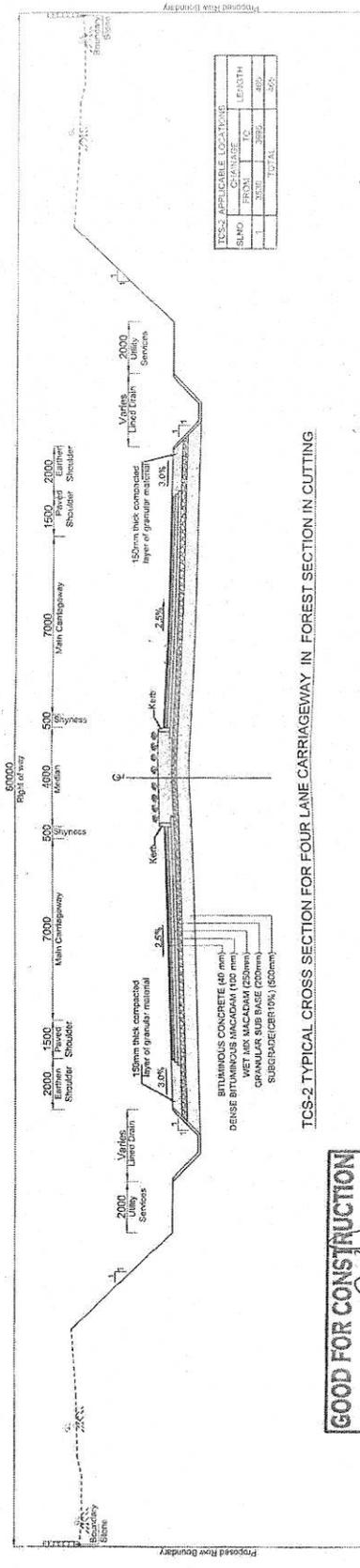
Copy submitted for information to:

1. Addl. Principal Chief Conservator of Forests (C), IRO, MoEF&CC, Chennai.
2. The Additional Chief Secretary to the Government of Tamil Nadu, Environment & Forests Department, Chennai.
3. The Principal Chief Conservator of Forest, Chennai.
4. The Regional Officer, NHAI, Madurai.
5. The Conservator of Forest, Madurai.



Sl. No.	TYPE	APPLICABLE LOCATIONS	
1.	CHANGING	TO	LENGTH
	FROM	TO	LENGTH
	TOTAL		

TCS-1A TYPICAL CROSS SECTION FOR FOUR LANE CARRIAGEWAY IN RURAL SECTION IN CUTTING



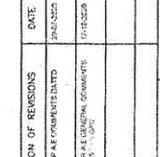
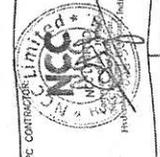
Sl. No.	TYPE	APPLICABLE LOCATIONS	
1.	CHANGING	TO	LENGTH
	FROM	TO	LENGTH
	TOTAL		

TCS-2 TYPICAL CROSS SECTION FOR FOUR LANE CARRIAGEWAY IN FOREST SECTION IN CUTTING

GOOD FOR CONSTRUCTION

FREMAL DILIP MEHTA
DESIGN DIRECTOR

REV.	DESCRIPTION OF REVISIONS	DATE	DESIGN ENGINEER	PROF. CONSULTANT	SAFETY CONSULTANT	EPC CONTRACTOR	AUTHORITY ENGINEER	CLIENT	NAME OF WORK	SCALE	NO.
01	ISSUED AS PER A.L. COMMENTS	04-11-2023							FOUR LANE UNDED CARRIAGEWAY FROM MADIPATI (DESIGN CHANGE 4003) TO THAMARAPATHI (DESIGN CHANGE 28+88) STRETCH OF MADURAI RING ROAD SECTION OF NH-746A ON EPC MODE UNDER BHARATMALA PART-2, PHASE-1 IN THE STATE OF TAMIL NADU	1:1	01
02	PROCESSED AS PER A.L. COMMENTS	11-11-2023							TYPICAL CROSS SECTIONS	1:1	02
03	AS PER COMMENTS	11-11-2023							TYPICAL CROSS SECTIONS	1:1	03



G.S.A. SANKAR IN Durgam Cheruvu, Hyderabad

TAMILNADU FOREST DEPARTMENT

From
Dr. Guruswamy D, IFS.,
District Forest Officer,
Madurai Division,
Madurai-2.

To
The Principal Chief Conservator of Forests,
(Head of Forest Force)
Chennai-15

Through Proper Channel
The Conservator of Forests and
Field Director,
SrivilliputhurMegamalai Tiger Reserve,
Madurai-2.

Ref. No.D1/1173/2018 Dated 20/09/2022

Sir,

Sub: Forests- Forest Conservation Act 1980, Madurai Division, Madurai proposal for diversion of 1.28Ha of Forest Land for preparation of DPR for Developments of Roads to improve the efficiency at fresh movement in state of Tamilnadu (Madurai Ring Road - FD/TN/Roads 32148/2018) Details submitted - Reg.

- Ref 1. Govt. Letter No. F. No. 4/TNBO91/CHN-2022/905 MOEF & CC Dated 24.08.2022.
2. Principal Chief Conservator of Forests (Head of Forest Force) C.No. TS4/7185/2018 Dated 26.08.2022

I wish to submit that, the following information's / documents / clarifications called for by the Principal Chief Conservator of Forests (Head of Department) reference 2nd cited is as follows :-

Sl. No	Queries raised by the Government	Replies of the District Forest Officer, Madurai
1.	As per the component requirement, the space left future widening and tree plantations is 0.5861 Ha, around 50%, of the area is left for future widening. If possible this area shall be left unfelled and if required, enrichment planting such as avenue trees shall be planted. Planting scheme is the case along with cost shall be prepared and submitted.	It is that the NHAI expressed that highway proposed to traverse 210m in RF land to negotiate a natural gradient of 1 in 28 involves cutting of 0.45 mt to 8 meter, accordingly the average width of land left for future widening and plantation is 17.50 meters out of 60 meters ROW. Accordingly , area of land proposed for future widening and plantation is 0.36 Ha.

		<p>However on recent inspection on 15 - 9-2022, it is seen to that, the user Agency of NHAI has started and almost completed the work on Non-forest areas (211.73 Ha)involved in the project. it is observed that the width of already laid road outside the Reserve Forest is around 25-30 Mtrs.As this project is for laying Ring Road, the width of the road inside Waguthumalai RF needs to be restricted to 30mts and future widening is not required for Ringroad passing inside reserve forest. Therefore the area required for the project may be restricted for the 30mts. Thereby It is also informed that, the felling of trees would be very minimal and not arise planting scheme for the said area.</p>
2.	<p>The CA shall be for 2 times the diverted area in the DFA, but the CA scheme is prepared only for the extent of 1.28 Ha instead of the Identified 2.56 Ha area. The CA scheme shall be revised accordingly.</p>	<p>It is kindly informed that the CA scheme of degraded forest area for diversion is 1.28 Ha in Waguthumalai RF, CA for double of the land is 2.56 Ha.</p> <p>(i). No. of trees to be felled :113 trees (Non - Spontaneous trees)</p> <p>(ii). No.of seedlings proposed for replanting in the CA :1130 trees (113 treesx10 Nos=1130)</p> <p>(iii). Total area worked out for the CA (1130 Nos /1000 seedlings/Ha :1.13 Ha</p>

		<p>Out of 2.56 Ha area for CA , 1.13 Ha is effective area of plantations as per criteria of number of trees to be felled and replanted in CA scheme and its requested for consideration.</p> <p>If the road width is restricted to 30 meters as observed in Non Forest lands , the area of diversion would be 210 x30 mts = 0.63 hectares and CA Land would be 1.26 hectares. The proposed effective area of plantation i.e 1.13 Ha will be done in the Compensatory afforestation land (1.26 Ha) accordingly.</p>
3.	<p>The DFO Madurai in PART II of the Proposal reported that wildlife like Indian Hare, Wild boar present in and around the forest land proposed for diversion. Whereas the APCCF, Madurai Circle in his site inspection report reported that wildlife like, Indian Gaur / Bosgaurus), the Indian Wild Boar / Susicrofa, Indian Giant Squirrel (Ratufaindica), Dhole or Indian Wild Dog (Cuonalpinus) etc are existing in the Waguthumalai Reserved Forest, Moreover, the DFO's site inspection report does not say anything about the presence or absence of wildlife in the area.</p>	<p>It is kindly informed that, the APCCF, Madurai has reported in the site inspection report that Wildlife like, Indian Gaur / Bosgaurus), the Indian Wild Boar / Susicrofa, Indian Giant Squirrel (Ratufaindica), Dhole or Indian Wild Dog (Cuonalpinus) etc are existing in the Waguthumalai RF.</p> <p>The DFO reported in PART II of the Proposal about the Wildlife like Indian Hare, Wild boar present in and around the forest land proposed for diversion area. It is submitted that the APCCF report pertained to the wildlife presence of entire Waguthumalai RF (2394.870 Ha) area whereas the DFO informed</p>

	<p>The discrepancies in the facts reported by the DFO and APCCF Madurai may be looked into and may kindly furnish correct list of fauna present in and around forest area proposed for diversion;</p>	<p>about apparent presence of wildlife in the proposed and its nearby surrounding area (1.28 Ha). There is no discrepancies regarding the reporting of wildlife presence by the officers and the wildlife presence is not denied nor differed. Hence can be considered.</p>
<p>4.</p>	<p>May kindly clarify whether the proposal involves felling of trees of spontaneous origin or otherwise;</p>	<p>It is kindly informed that, the felling of trees involved in this proposals are non-spontaneous categories. The plants are identified as non spontaneous and details were also reported in para 6 of the Principal chief conservator of forests letter dated 16-3-2021.</p>
<p>5.</p>	<p>The State Government reported that, the APCCF, Madurai Circle recommended for elevated corridor in the RF area and also informed that the User Agency has furnished the undertaking that Wildlife overpass will be providing at km 3+680 with 20m width covering across the RoW and wildlife underpass of 3m x 2m size at km 3+490, including mitigation / eco-friendly measures in lieu of elevated corridor for the portion of the proposed road passing through Waguthumalai Reserved Forest to</p>	<p>The user agency requested for animal over and under pass constructions as per recommendations in eco friendly measures to mitigate impacts of linear infrastructure on wildlife published by Wild life institute of India.</p> <p>The mitigation plan with animal over pass, under pass along with other structures is recommended by District Forest Officer, Madurai Forest Division. Specific recommendation as requested by has to be submitted by state Government.</p>

<p>enable movement of Wildlife.</p> <p>In view of the above, it is to inform that the State Government forwarded the recommendation of APCCF to construct elevated corridor and inability of the User Agency to construct recommendation on whether the UA shall construct elevated corridor or as proposed only wildlife overpass & underpass are sufficient to protect wildlife and its movement. Hence, state Government shall submit specific recommendation in this regard;</p>	
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End : EDS reply from the
User agency
(3 copies)

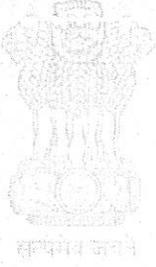
Yours faithfully
Sd /- Guruswamy D.
District Forest Officer
Madurai Division, Madurai

/ T.C.BO/

Superintendent

20/9/2022

20/9/2022



भारतीय राष्ट्रीय राजमार्ग प्राधिकरण
(सड़क परिवहन और राजमार्ग मंत्रालय)
National Highways Authority of India
(Ministry of Road Transport & Highways)

उप महाप्रबंधक (तकनीकी) सह परियोजना निदेशक के कार्यालय
परियोजना कार्यान्वयन इकाई

Office of the Deputy General Manager (Tech) cum Project Director
Project Implementation Unit

प्लॉट नंबर : 3, सूर्या टवर्स, दूसरी मंजिल, पूर्व पहले स्ट्रीट, के.के. नगर, मदुरै - 625 020, तमिलनाडु.

Plot No: 3, Surya Towers, 2nd Floor, 1st East Street, K.K.Nagar, Madurai - 625 020, Tamilnadu.



दुरभाष / Phone : +91 452 2587750

वेबसाइट / Website : <http://www.nhai.org>

E-mail : nhai_madurai_piu@yahoo.co.in

mad@nhai.org

Ref: NHAI/PIU/MDU/NH744A/I/01/2022 / 2601

Date: 08.09.2022

To

The District Forest Officer,
Madurai.

Sir,

Sub: NHAI- PIU, Madurai - Four lane divided carriageway from Vadipatti (Design Chainage 0+000) to Thamaraipatti (Design Chainage 29+960) stretch of Madurai Ring Road section of NH-744A on EPC mode under Bharatmala Pariyojana Phase-I in the state of Tamil Nadu - Diversion of forest land proposal (Madurai Ring Road - FP/TN/ROAD/32148/2018 - Submission of compliance report for the observations raised by Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC) - Reg

Ref: Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC), Chennai Lr. No. 4-TNB091/CHN-2022/905 Dt. 24.08.2022

Vide reference cited, Integrated Regional Office, Ministry of Environment, Forests & Climate Change (MoEF&CC) requested the State Government to submit certain clarification on the said proposal for further consideration.

In this regard, the pointwise Compliance to the observations areas furnished below.

SL.NO	ESSENTIAL DETAIL SOUGHT (EDS)	COMPLIANCE
01	As per the component wise requirement, the space left for future widening and tree plantation is 0.5861 Ha, i.e. around 50%, of the area is left for future widening. If possible, this area shall be left un-felled and if required, enrichment planting such as avenue trees shall be planted. Planting scheme in this case along with cost shall be prepared and submitted.	It is to submit that Highway proposed to traverse 210m in RF land to negotiate a natural gradient of 1 in 28 involves cutting of 0.45m to 8m, accordingly the average width of land left for future widening and plantation is 17.50m out of 60m ROW. Accordingly, area of land proposed for future widening and plantation is 0.36 Ha. NHAI undertakes to bear cost implication towards enrichment planting.

Corporate Office:

G-5 & 6, Sector-10, Dwarka, New Delhi - 110 075.

Tel : 011-2507 4100 / 2507 4200

Website : www.nhai.gov.in

Regional Office:

2nd & 3rd Floor, Vijay Krishna Plaza, No.1, Lake Area,

Melur Main Road, Mattuthavani, Madurai - 625 107.

Ph: +91 452-2588999 E-mail: romadurai@nhai.org

Page 1 of 4

02	The CA shall be raised for 2 times the diverted area in the DFA, but the CA scheme is prepared only for the extent of 1.28 Ha instead of the identified 2.56 Ha area. The CA scheme shall be revised accordingly.	NHAI undertakes to bear cost implication towards requisite revised CA Scheme as to be determined by Forest Department.
03	The DFO Madurai in PART II of the proposal reported that wildlife like Indian Hare, Wild boar Present in and around the forest land proposed for diversion. whereas the APCCF, Madurai Circle in his site inspection report reported that wildlife like, Indian Gaur /Bosgaurus), the Indian Wild Boar/Susscrofa, Indian Giant Squirrel (Ratufaindica), Dhole or Indian Wild Dog (Cuonalpinus) etc are existing in the Waguthumalai Reserved Forest. Moreover, the DFO's Site inspection report does not say anything about the presence or absence of wildlife in the area. The discrepancies in the facts reported by the DFO & APCCF Madurai may be looked into and may kindly furnish correct list of fauna present in and around forest area proposed for diversion;	It is kindly submitted that the Forest Department may furnish reply.
04	May kindly clarify whether the proposal involves felling of trees of spontaneous origin or otherwise;	User Agency (NHAI) may not be competent to reply. However, it is kindly to report that during joint inspection with Forest Department, it came to know that the plants existing are of non-spontaneous in nature. The same is communicated by PCCF, Chennai vide letter No.TS4/7185/2018 dated 31.05.2021, addressed to Additional Chief Secretary to Govt., Environment & Forest Department, Chennai, the relevant portion is reproduced below for ready reference: "2. Whether the absence of spontaneous trees in the proposed project area has been confirmed and the exact number of non-spontaneous

		<p>trees to be felled.</p> <p>In this connection it is stated that, there are 113 no. of trees enumerated on ground(i.e.,) including 274 Nos. of branched trees and uploaded in Part-II and these 113 trees were identified as non-spontaneous and these details were also reported in para 6 of the Principal Chief Conservator of Forests letter dated 16.03.2021. In this regard copy of the District Forest Officers letter dated 15.09.2020 is enclosed.”</p>
05	<p>The State Government reported that, the APCCF, Madurai circle recommended for elevated corridor in the RF area and also informed that the User Agency has furnished the undertaking that Wildlife overpass will be provided at km 3+680 with 20m width covering across the RoW and wildlife underpass of 3m x 2m size at km 3+490, including mitigation / eco-friendly measures in lieu of elevated corridor for the portion of the proposed road passing through Waguthumalai Reserved Forest to enable movement of wildlife.</p> <p>In view of the above, it is to inform that the State Government forwarded the recommendation of APCCF to construct elevated corridor and inability of the User Agency to construct elevated corridor, but not offered specific recommendation on whether the UA shall construct elevated corridor or as proposed only wildlife overpass & underpass are sufficient to protect wildlife and its movement. Hence, state Government shall submit specific recommendation in this regard;</p>	<p>It is to kindly submit that justification for proposing Wildlife overpass and underpass in lieu of Elevated Corridor demanded by Forest Department is furnished in the detailed mitigation plan submitted on 15.12.2021 by User Agency (NHAI). The relevant portion of the report is reproduced as below for ready reference:</p> <p>“During field visit and topographical study, it is evident that the project highway as such planned involves cutting in the range of (-) 0.45m to (-) 8.0m. This involves steep gradient of 7.5m to be negotiated in 210 m. The feasibility of elevated corridor as recommended by the APCCF, Madurai has Technical and Financial constraints as per ground truthing. However, in respect of taking highway as Elevated Corridor in Reserve Forest land, it is observed that</p> <ul style="list-style-type: none"> (i) Steep gradient of 7.5 m to be negotiated in 210 m, make the elevated corridor, techno-economically least preferred, (ii) However, alternate measures like Wildlife overpass & underpass and other mitigation measures being

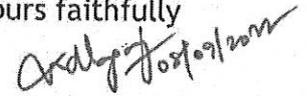
dm

		<p>proposed is expected to satisfy the same purpose for which elevated corridor condition was imposed.</p> <p>(iii) The Wildlife overpass is a natural looking structure over the corridor that will provide safe passage for the wildlife and</p> <p>(iv) Elevated Corridor over the Reserve Forest will consume large quantities of Cement, Steel and other construction materials which may not be environment friendly solution.”</p> <p>In addition to above, it is to submit that the Wildlife overpass / viaduct / Wildlife Bridge proposed is a structural measure in consideration of recommendations in “Eco-Friendly measures to mitigate impacts of linear infrastructure on wildlife” published by Wildlife Institute of India.</p>
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In view of above, it is kindly requested for early approval of Stage - I clearance, which may help in expediting the Project Highway completion.

Encl: As above

Yours faithfully



(V. Nagaraj)

DGM (T) & Project Director
PIU - Madurai

Copy to:

1. Addl. Principal Chief Conservator of Forests (C), IRO, MoEF&CC, Chennai.
2. The Principal Chief Conservator of Forests, Chennai.
3. The Regional Officer, NHAI, Madurai.
4. The Conservator of Forest, Madurai.

भारतसरकार

GOVERNMENT OF INDIA

पर्यावरण, वन एवं जलवायु परिवर्तन मंत्रालय

MINISTRY OF ENVIRONMENT, FORESTS & CLIMATE CHANGE

Integrated Regional Office

1st Floor Additional Office Block for GPOA, Shastri Bhawan,

Haddows Road, Nungambakkam, Chennai -600 006

e-mail: ro.moefccc@gov.in / roefccc@gmail.com



F.No.4-TNB091/CHN-2022/905

Date: 24th August, 2022

To,

The Additional Chief Secretary to the Government of Tamil Nadu,
Environment & Forests Department,
Secretariat, Fort St. George, Chennai - 600 009.

Subject: Diversion of 1.593 ha (now revised as 1.28 ha) of forest land for the formation of Madurai Ring Road for Routes and Coastal Roads to improve the efficiency of freight movement in the State of Tamil Nadu in favour of Project, Director, National Highways Authority of India, Madurai-Reg.

Reference: The State Government letter No 4379/FR.10/2021-8 dated 05.08.2022 and online proposal No.FP/TN/ROAD/32148/2018

Sir,

With reference to the subject and reference and I am directed to request to seek the following information / documents / clarification for further consideration of the proposal;

1. As per the component wise requirement, the space left for future widening and tree plantation is 0.5861 ha, i.e. around 50% of the area is left for future widening. If possible, this area shall be left un-felled and if required, enrichment planting such as avenue trees shall be planted. Planting Scheme in this case along with cost shall be prepared and submitted.
2. The CA shall be raised for 2 times the diverted area in the DFA, but the CA Scheme is prepared only for the extent of 1.13 ha instead of the identified 2.56 ha area. The CA scheme shall be revised accordingly.
3. The DFO Madurai in PART II of the proposal, reported that wildlife like Indian Hare, Wild boar present in and around the forest land proposed for diversion. Whereas the APCCF, Madurai Circle in his site inspection report reported that wildlife like Indian Gaur (*Bos gaurus*), the Indian Wild Boar (*Sus scrofa*), Indian Giant Squirrel (*Ratufa indica*), Dhole or Indian Wild Dog (*Cuon alpinus*) etc are existing in the Waguthumalai Reserved Forest. Moreover, the DFO's Site inspection report does not say anything about the presence or absence of wildlife in the area. The discrepancies in the facts

reported by the DFO & APCCF Madurai may be looked into and may kindly furnish correct list of fauna present in and around forest area proposed for diversion;

4. May kindly clarify whether the proposal involves felling of trees of spontaneous origin or otherwise;
5. The State Government reported that, the APCCF, Madurai circle recommended for elevated corridor in the RF area and also informed that the User Agency has furnished the undertaking that wildlife overpass will be provided at km 3+680 with 20m width covering across the RoW and wildlife underpass of 3mX2m size at km 3+490, including mitigation / eco-friendly measures in lieu of elevated corridor for the portion of the proposed road passing through Waguthumalai Reserved Forest to enable movement of wildlife.

In view of the above, it is to inform that the State Government forwarded the recommendation of APCCF to construct elevated corridor and inability of the User Agency to construct elevated corridor, but not offered specific recommendation on whether the UA shall construct elevated corridor or as proposed only wildlife overpass & underpass are sufficient to protect wildlife and its movement. Hence, state Government shall submit specific recommendation in this regard;

As this proposal is under review in the PMG and also in FRCM meetings, the State Government shall submit report on the above issues at the earliest please.

Yours faithfully,

Sd/-

(K.Karthikeyan)

Assistant Inspector General of Forests (Central)

Copy to:-

1. The Principal Chief Conservator of Forests, Govt. of Tamil Nadu, Forest Department, No.1, Jeenis Road, Panagal Building, Saidapet, Chennai - 600 015.
2. The Additional Principal Chief Conservator of Forests/Nodal Officer (FCA), Office of the Principal Chief Conservator of Forests, Govt. of Tamil Nadu, Forest Department, No.1, Jeenis Road, Panagal Building, Saidapet, Chennai - 600 015
3. Project, Director, National Highways Authority of India, 307, Melur Main Road, KK Nagar, Madurai625020 mukeshassociatestamilnadu@gmail.com
4. Guard file.

Sd/-

(K.Karthikeyan)

Assistant Inspector General of Forests (Central)

Table 2.1 Design Speed

Nature of Terrain	Cross Slope of the Ground	Design Speed (km/h)	
		Ruling	Minimum
Plain and Rolling	Up to 25 percent	100	80
Mountainous and Steep	More than 25 percent	60	40

Short stretches (say less than 1 km) of varying terrain met with on the road stretch shall not be taken into consideration while deciding the terrain classification for a given section of Project Highway.

2.2.2 In general, the ruling design speed shall be adopted for the various geometric design features of the road. Minimum design speed shall be adopted only where site conditions are restrictive and adequate land width is not available. Such stretches where design speed other than ruling speed is to be adopted shall be as indicated as deviation in **Schedule 'D'** of the Concession Agreement.

2.3 Right-of-Way

A minimum Right of Way (ROW) of 60 m should be available for development of a 4-lane highway. The Authority would acquire the additional land required, if any. The land to be acquired shall be indicated in **Schedule 'B'** of the Concession Agreement. The consideration for planning, design and construction described in Para 1.13 shall apply.

2.4 Lane Width of Carriageway

The standard lane width of project highway shall be 3.5 m.

2.5 Median

2.5.1 The median shall be either raised or depressed. The width of median is the distance between inside edges of carriageway. The type of median shall depend upon the availability of Right of Way. The minimum width of median, subject to availability of Right of Way, for various locations shall be as in **Table 2.2**.

Table 2.2 Width of Median

Type of Section	Minimum Width of Median (m)		
	Plain and Rolling Terrain		Mountainous and Steep Terrain
	Raised*	Depressed Median	Raised*
Open country with isolated built-up area	5.0	7.0	2.5
Built up area	2.5	Not Applicable	2.5
Approach to grade separated structures	5.0	Not Applicable	2.5

* Including Kerb shyness of 0.50 m on either side. In the existing 4-lane reaches also, the minimum kerb shyness of 0.5 m shall be maintained. This additional width for kerb shyness shall be catered by augmenting the carriageways toward the shoulder side. The type and widths of median in various stretches of Project Highway shall be as indicated in **Schedule 'B'**.