No FCA/_ 6486 H.P. Forest Department

Chamba Forest Division, Chamba.

Dated Chamba, the 9-12-2920

From: - D.C.F. Chamba.

124

To:- CCF. Chamba.

Subject: -

Diversion of 5.48 of forest land in favour of HPPWD for the C/o Kiani Bagori Shakti Dehra Tikri (Hamal Sde) Kms. 0/000 to 10/500), within the jurisdiction of Chamba Forest Division , Distt, Chamba, H.P. (online no. FP/HP/Road 45519/2020).

Memo,

The observation raised by Govt. of India Ministry of Environment forest climate change intergrated Regional office Shimla - 1710001. The following observations have been attended and reply to the same is given below :-

Point No.	Reply.(s)		
Point No. 1	Needful has been done by the user agencey		
Point.2	Needful has been done by te user agency para No. 5 of C/B analycies and aploaded in part -I		
Point 3	Needful shall be done from CWLW office		
Point 4	Needful has been done the area for CA has now been Changed to Rupani DPR at 10.96 ha.		
Point No	Needful has been done. There are no trees on dumping site.		

It is therefore requsted to please process the case for approval.

Dy. Conservator of Forests Chamba, Forest Division

Chamba-176310.

CHECK LIST No. 17

"SCHEME FOR COMPENSATORY AFFORESTATION"

Detail scheme for Compensatory Afforestation to be carried out in lieu of 5.48 Hectare Forest Land in favour of HPPWD for the construction of Link Road from Kiani Bagori Shakti Dehra Tikri(Hamal Side) Km 0/0 to 10/500 within the jurisdiction of Chamba Forest Division, Chamba Distt. Chamba (HP).

Details of degraded forest Land/non-forest land:-

a) District	Chamba
b) Village	Rupani
c) Tehsil	Chamba
d) Name of forest Division	Chamba
e) Range	Masrund Range
f) Block / Compartment / Survey No.	52/D/2
g) Area to be afforested	10.96 Hac.

2. Descriptions of Area:

- i) Whether the site selected for Compensatory Yes. The site selected for compensatory
- ii) If the CA site is other than the land bank reason be given :- Not applicable as the site selected is land bank.
- iii) In case of non-forest area identified for CA, than what :- Not applicable as the site selected is a forest area.

iv)	Soil Type:-	Clayey Loam.
v)	Topography "a"	Hilly
	Hilly/Undulating/Plair	n.
	"b" Slope: Steep/Me	edium Medium
vi)	/Gentle. Whether the area is bearing ny roote sto	ock of No

Plantation Model:

Compensatory afforestation over an area of 10.96 ha of degraded forest land proposed to be raised. The area selected for the purpose is in DPF Rupani which is a degraded forest area & has been notified as a land bank. Presently the area supports scattered deoadr and kail & Chil trees. The area indentified for plantation has also been shown on the attached map. Plants @ 1100 plants per hectare will planted. The plantation will be rasied in the following years after the approval of FCA propsal and further maintenace and beating up of failure will be done for the subsequent ten years. The scheme will be implemented by Forest Department through DFO Chamba. The cost structure of scheme is attached. The scheme has been formulated by taking into consideration the present wage rate Rs.200/- and 10% cost escalation afer first year has been provided. Total financial outlay for compensatory plantation scheme is Rs. 2527099/- Certificate of DFO Chamba regarding suitability of area identified for compensatory plantation is attached. The area selected for compensatory plantation will be approachable Chamba-Pukhri road and the monitoring will be done as per existing monitoring mechanism in the forest department at present and also as per GOI instructions.

Copy of the approved Compensatory afforestation scheme /Model showing competent wise physical and financial breakup to be enclosed.

Schedule of Plantation Programme: Detail of year wise break-up of requirement of funds is as as under:-

Sl. No.	Year	Area	Rate per Ha including Nry Cost (NT)	Total Amount	Total financial years
A:-0 year		10.96	97885	1072819.60	2021-22
B.	At the rate 25% planting cost.			268204.90	2021-22
	1st year Maintenance	10.96	14886	16350.56	2022-23
	2 nd Year Maintenance	10.96	9950	109052.00	2022-23
	3 rd Year Maint.	10.96	5129	56213.84	2023-24
	4 th year Maint.	10.96	5129	56213.84	2025-26
	5 th year Maint.	10.96	5129	56213.84	2026-27
	6 th year Marin.	10.96	5129	56213.84	2020-27
	7 th year Maint.	10.96	5129	56213.84	2028-29
	8 th year Maint.	10.96	5129	56213.84	2029-30
	9 th year Maint.	10.96	5129	56213.84	2030-31
	10 th year Maint.	10.96	5129	56213.84	2031-32
	Total:-		Total:- (A+B)	2062937.8	2031-32
	Contingencies 5% of Total CA		(11.12)	103146.9	
	Sub Total:-			2166084.7	
	Departmental Charges @ 17.50%				
	Total:-			3610141.1 2527098.78	

SI. No.	Year	Area	Rate per Ha including Nry Cost (NT)	Total Amount	Total financial years
A:-0 year		10.96	97885	1072819.60	2021-22
		Plan	ting Cost 25%	268205	
		Departmen	tal Charges @ 17.50%	103147	
-1071		Continger	icies 5% of Total CA	361014	
			Total:-	1805186	
B.	Sc. 1				
	Ist year Maintenance	10.96	14886	163151	2022-23
	2 nd Year Maintenance	10.96	9950	109052	2023-24
	3 rd Year Maint.	10.96	5129	56214	2024-25
	4 th year Maint.	10.96	5129	56214	2025-26
	5 th year Maint.	10.96	5129	56214	2026-27
	6 th year Maint.	10.96	5129	56214	2027-28
	7 th year Maint.	10.96	5129	56214	2028-29
	8 th year Maint.	10.96	5129	56214	2029-30
	9 th year Maint.	10.96	5129	56214	2030-31
	10 th year Maint.	10.96	5129	56214	2031-32
	Total:-		Total:- (A+B)	721913	
			Total:-	2527098.78	

5. Technical details:-

Technical detail of compensatory afforestation scheme are as follows :-

- (a) General Details:- An area of 10.96 ha will be taken up for planting under compensatory afforestation scheme in Rupani DPF. The area will be provided by Barbed wire fencing and mixture of conifer and broad leaved species will be planted. 1100 plants will be planted per hectare.
- (b) Spacement:- 3.00 Mtr x2.5Mtr.
- (c) Species:- Deodar, Ban and other broad leaved.
- d) <u>Plantation method</u>:- Nursery grown one and a half year old plants of Ban (in ploythene bags) will be planted in 30x30x30cm and 45x45x45 cm pits in the selected area. One year old Chil and Robinia poly plants will also be planted in 30x30x30 vm. Pits. Bush cutting will be done in the infested area. The plantation will be maintained for subsequent 10 years in which beating up of failures will be done. The plantation will be rainfed.
- e) Soil and Moisture Conservation:-Protection(Fencing watchman, People's Participation etc.)
 a. Area will be protected from grazing by erecting barded wire fencing at all vulnerable places around the plantation. Further watch and ward as also fire protection will be ensured through regular departmental staff.

Proposed Monitoring Mechanism:- The plantation will be monitored as per existing monitoring mechanism in the forest department. The plantation will also be monitored by GOI representatives as per instructions. The plantation site will be approachable.

Any other information :- Nil b.

> Dated:-24-07-2020 Place:- Chamba.

> > Divisional Forest Officer, Chamba Forest Chamba. Chamba Chamba

COST BENEFIT ANALYSIS

Check List Serial No.:- 33

Estimation of Cost of Forest Diversion

Table -B-

No.	Parameters	Value expressed to Monetary terms and in Detail	Remarks
L	Ecosystem services losses due to proposed forest diversion	Rs.36,00,360/-	Economic value of loss of eco-system services due to diversion of forest shall be the net present value (NPV) of the forest land being diverted as prescribed by the Central Government (MoEF & CC).
2.	Loss of animal husbandry productivity, including loss of fodder	Rs.3,60,036/-	To be quantified and expressed in monetary terms or 10% of NPV applicable whichever is maximum.
3,	Cost of human resettlement	Since no residential village/ area is getting affected, there will be no cost of human resettlement.	To be quantified and expressed in monetary terms as per approved R&R plan
4.	Loss of public facilities and administrative infrastructure (Roads, building, schools, dispensaries, electric lines, railways, etc.) on forest land, which would require forest and if these facilities, were diverted due to the project.	Since no public facilities and administrative infrastructure (Roads, building, schools, dispensaries, electric lines, railways, etc.) on forest land, being diverted due to the project, there will be no such loss.	To be quantified and expressed in monetary terms on actual cost basis at the time of diversion

	ossession value of forest land diverted	30% of environmental costs (NPV) due to loss of forests i.e. Rs. 10,80,108 -	30% of environmental costs (NPV) due to loss of forests or circle rate of adjoining area in the district should be added as a cost component as possessor value of forest land whichever is maximum
6.	Cost of suffering to outsees	Nil	The social cost of rehabilitation of oustees (in addition to the cost likely to be incurred in providing residence, occupation and social services as per R&R plan) be worked out as 1.5 times of what oustees should have earned in two years had he not been shifted.
7.	Habitat Fragmentation Cost	Rs.18,00,180/-	While the relationship between fragmentation and forest goods and services in complex, for the sake of simplicity the cost due to fragmentation has been pegged at 50% of NPV applicable as a thumb rule.
8.	Compensatory afforestation and soil & moisture conservation cost	Rs. 2,20,50,821/-	The actual cost of compensatory afforestation and soil & moisture conservation and its maintenance in future at present discounted value

Date: Place:

Executive Engineer Tissa Division HPPWD Tissa



Estimating Benefits of Forest Diversion in Cost Benefit Analysis

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Table- C-

Darameters

Value expressed in monetary terms

124

Demarks

VICE - alle

CERTIFICATE

This is to certify that 10.96 hactare land bearing survey No/compartment No. 52D/2 of Rupni DPF, Kiani beat, Pukhri Block of Masroond Range identified for Compensatory Afforestation is suitable for plantation from management point of view and is free and all sorts of encumbrances and encroachments and having & forest denisty less then 40%/(0.4)

Date:-

Place:-

Dy:Conservator of Forests,

Chamba Torest Division, Chamba 17631 Division

manica 176310 (H.P.)

CERTIFICATE

Enumeration list of trees in Dumping Site for C/O link road Kiani Bagori Shakti Dehra Tikri Hamal side km 0/0 to 10/500.

NIL -

Chamm

Pange Forest Officer
Masicond Range

Divisional Porest Office Chamba Forest Division Charaba 176310 (H.P.)