

ESTIMATE FOR RAISING COMPENSATORY AFFORESTATION PLANTATION UNDER ANJAW FOREST DIVISION

Name of Project :- Diversion of forest land 18.6 Ha for Widening/Improvement of Existing Road To NHDL Specification Hunli-Metengliang-Hayuliang Road From Km 158.00 to Km 165.00 (Net Length 7.00 Km) under Anjaw District, Arunachal Pradesh.

User Agency:- 116 RCC,BRTF

Location- Delai PRF

C.A Area :- Delai PRF

Species to be planted :- Siris, Gamari, Hingori, Borpat, Jutull, & Porna etc.

CA @ 1100 Nos of Poly Pot Seedlings per Hectare.

Area- 18.6 Hectare.

Proposal No. FP/AR/ROAD/114789/2020.

Sl. No.	Item of work	Unit	Qty.	Rate	Amount	Remarks	
A.	Creation of Nursery Cost of Saplings @ 1100 nos./Ha. @ Rs. 19/-	No	20460	19.00	388740.00	As per new wages (Area-II)	
1	1st YEAR OPERATION Survey & Demarcation and Preparation of map @ 4 Mandays/ha.	4					
	Sub-Total	4	18.6	74.4	350.00	26040.00	
2	2nd Year operation I) Erection of barbed wire fence (5 strand) Fencing per 100 Rmt. II) Maint. Of barbed wire fencing @ 5% of erection cost in each year from 3rd year to 6th year Add. Add escalation value by multiplying factor : 1.2 for 3rd year 1.3 for 4th year 1.4 for 5th year 1.5 for 6th year	Rmt			18400.00	Annexure 'A'	
	Sub-Total	100	Rmt	18	23368.00	420624.00	
3	Raising of seedlings for casualty replacement (Per Ha.) 3rd year 15% = 165 Nos. 4th year 10% = 110 Nos. = 275 Nos.	No					
	Sub-Total	275	18.6	5115	19.00	97185.00	
4	Raising of plantation (Per Ha.) (i) Clearance of brush wood, planting lines and staking of debries @ 15 Mandays/Ha. (ii) Alignment of pits & preparation of stakes, staking @ 10 Mandays/Ha. (iii) Digging of pits 30cm X30cmX30cm @ 22 Mandays/Ha. (iv) Preparation of thala by uprooting of debris by hoeing around pits @ 22 Mandays/per. (v) Carring of sapling to the planting site i/c planting of sapling @ 30 Mandays (Area II). (vi) Making of inspection path 1 mtr wide @ 3 Mandays/ha. (vii) Fire line cutting 3 mtrs wide along the periphery @ 5 Mandays/ha. (viii) Tending 4 weeding @ 12 Mandays/Weeding per ha. Add 10% escalation value on total of item No. 4 (i) to 4 (viii)	ha	15 10 22 22 30 3 5 48 15.5	18.6 18.6 18.6 18.6 18.6 18.6 18.6 18.6 18.6	279 186 409.2 409.2 558 55.8 93 892.8 288.3		
	Sub-Total	170.5		3171.30	350.00	1109955.00	
5	3rd Year operation (per ha.) i) Tending - 3 weeding @ 12 Mandays/Ha. ii) Casualty replacement 15% iii) Maint. Of inspection path @ 1 Mandays/Ha. iv) Maint. Of fire line @ 1 Mandays/Ha. Add 20% escalation value on total of item 5(i) to 5(iv)	36 7 1 1 9	18.6 18.6 18.6 18.6 18.6	669.6 130.2 18.6 18.6 167.4			
	Sub-Total	54		1004.40	350.00	351540.00	

6	4th Year operation (per Ha.) i) Tending 2 weeding @ 12 mandays/ Ha. ii) Casualty replacement 10% @ 7 Mandays/ha. iii) Maint. Of inspection path @ 1 DL/Ha. iv) Maint. Of fire line @ 1 DL/Ha. Add 30% escalation value on item 6(i) to 6 (iv)	24 7 1 1 9.9	18.6 18.6 18.6 18.6 18.6	446.4 130.2 18.6 18.6 184.14				
	Sub-Total	42.9		797.94	350.00	279279.00		
7	5th Year operation (per Ha.) i) Tending -1 weeding @ 12 Mandays/Ha. ii) Maint. Of inspection path @ 1 DL/Ha. iii) Maint. Of fire line @ 1 DL/Ha. Add 40% escalation value on item 7(i) to 7 (iii)	12 1 1 5.6	18.6 18.6 18.6 18.6	223.2 18.6 18.6 104.16				
	Sub-Total	19.6		364.56	350.00	127596.00		
8	6th Year operation (per Ha.) i) Tending -1 weeding @ 12 Mandays/weeding/Ha. ii) Maint. Of inspection path @ 1 DL /Ha. iii) Maint. Of fire line @ 1 DL /Ha. Add 50% escalation value on item 8 (i) to 8 (iii)	12 1 1 7	18.6 18.6 18.6 18.6	223.2 18.6 18.6 130.2				
	Sub-Total	21		390.6	350.00	136710.00		
9	7th Year operation (per Ha.) i) Maint. Of inspection path, fire line and climber cutting 5 Mandays/ha. Add 60% escalation value on total item 9 (i)	5 3	18.6 18.6	93 55.8				
	Sub-Total	8		148.8	350.00	52080.00		
10	8th Year operation i) Maint. Of inspection path, fire line and climber cutting 5 Mandays/ha. Add 70% escalation value on item 10 (i)	5 3.5	18.6 18.6	93 65.1				
	Sub-Total	8.5		158.1	350.00	55335.00		
11	9th Year operation (per ha.) i) Maint. Of inspection path, fire line and climber cutting @ 5 Mandays/ha. Add 80% escalation value on total of item 11(i)	5 4	18.6 18.6	93 74.4				
	Sub-Total	9		167.4	350.00	58590.00		
12	10th Year operation i) Maint. Of inspection path, fire line and climber cutting @ 5 Mandays/ha. Add 90% escalation value on total of item 12 (i)	5 4.5	18.6 18.6	93 83.7				
	Sub-Total	9.5		176.7	350.00	61845.00		
13	Wages for plantation watchman at the rate of U/skilled labourer round the year for the 10 year (one watchman for every 25 ha. Of area subject to a minimum area of 15 ha.) @ Rs. 10500/- for Area -II per month Adding escalation value by multiplying factor as below Sub Total for 10 Years (M.F.=1.1) for 2nd year. (M.F.=1.2) for 3rd year (M.F.=1.3) for 4th year (M.F.=1.4) for 5th year (M.F.=1.5) for 6th year (M.F.=1.6) for 7th year (M.F.=1.7) for 8th year (M.F.=1.8) for 9th year (M.F.=1.9) for 10th year	12 month		126000 1.1 126000 1.2 126000 1.3 126000 1.4 126000 1.5 126000 1.6 126000 1.7 126000 1.8 126000 1.9 126000	126000.00 138600.00 151200.00 163800.00 176400.00 189000.00 201600.00 214200.00 226800.00 239400.00			
	Sub-Total	1 DI		1827000.00	1827000.00			
14	a) Cost of LMV - 1 (one) No. for every 300 Ha of CA area. b) Cost of HMV-1 (one) No. for every 300 Ha of CA area				NA NA	As per present market rate.		

15	a) 1 (one) driver @ Rs. 11500 for Area II per month for a period of 10 years for every 300 ha of CA area against item No. 14 (b) (M.F.=1.1) for 2nd year. (M.F.=1.2) for 3rd year (M.F.=1.3) for 4th year (M.F.=1.4) for 5th year (M.F.=1.5) for 6th year (M.F.=1.6) for 7th year (M.F.=1.7) for 8th year (M.F.=1.8) for 9th year (M.F.=1.9) for 10th year	1 dl	12 month	138000.00 1.1 138000 151800.00 1.2 138000 165600.00 1.3 138000 179400.00 1.4 138000 193200.00 1.5 138000 207000.00 1.6 138000 220800.00 1.7 138000 234600.00 1.8 138000 248400.00 1.9 138000 262200.00	Not Applicable	
	Sub Total			2001000.00	NA	
	b) 1 (one) handyman @ Rs. 10500/- for Area II per month for a period of 10 years for CA area more than 300 ha. (M.F.=1.1) for 2nd year. (M.F.=1.2) for 3rd year (M.F.=1.3) for 4th year (M.F.=1.4) for 5th year (M.F.=1.5) for 6th year (M.F.=1.6) for 7th year (M.F.=1.7) for 8th year (M.F.=1.8) for 9th year (M.F.=1.9) for 10th year	1 dl	12 month	126000.00 1.1 126000 138600.00 1.2 126000 151200.00 1.3 126000 163800.00 1.4 126000 176400.00 1.5 126000 189000.00 1.6 126000 201600.00 1.7 126000 214200.00 1.8 126000 226800.00 1.9 126000 239400.00	Not Applicable	
	Sub Total			1827000.00	NA	
16	a) Const. of OBT labours shed (2 room) for workers at plantation site subject to a minimum area of 15 ha . And upto 25 ha. Beyond 25 ha. one room to be added for every 13 ha. or part thereof at proportionate cost. (b) Maint. Of OBT hut @ 25% of the construction cost per year from 4th year to 6th year including escalation value by multiplying factor 1.3 for 4th year 1.4 for 5th year 1.5 for 6th year	1	No.	258000.00 1.3 64500 83850.00 1.4 64500 90300.00 1.5 64500 96750.00	As Per Latest CA Cost Norms	
	Sub-Total	1	No.	528900.00	528900.00	
17	a) Const of Modified Improved Basha Type standard size quarter for every 50 ha. b) Maint. Of @ 20% of const. cost per year (from 2nd year to 9th year) including: 1.2 for 3rd year 1.3 for 4th year 1.4 for 5th year 1.5 for 6th year 1.6 for 7th year 1.7 for 8th year 1.8 for 9th year	No	1	846000.00 1.2 169200 203040.00 1.3 169200 219960.00 1.4 169200 236880.00 1.5 169200 253800.00 1.6 169200 270720.00 1.7 169200 287640.00 1.8 169200 304560.00	Not Applicable	
	Sub Total			2622600.00	NA	
18	a) If CA area is 10 Km away from the nearest forest office/establishement 1 (one) Const. SPT Beat Office (31.39 Sqm) for area over 100 Ha. b) Maint. Of @ 10% of const. cost per year (from 2nd year to 9th year) including: 1.3 for 4th year 1.4 for 5th year 1.5 for 6th year	1	No.	1022000.00 1.3 102200 132860.00 1.4 102200 143080.00 1.5 102200 153300.00	Based on Departmental approved rate. Not Applicable	

	1.6 for 7th year 1.7 for 8th year 1.8 for 9th year		1.6 1.7 1.8	102200 102200 102200	163520.00 173740.00 183960.00		
	Sub Total				1972460.00	NA	
19	Provision for Plantation Supervisor for every 150 ha @ Rs. 11500/- for Area-II per month for 10 yrs. where CA area is more than 150 ha. adding escalation value as item no 13 above. Adding escalation value by multiplying factor as below. 2nd year -(M.F.=1.1) 3rd year -(M.F.=1.2) 4th year -(M.F.=1.3) 5th year -(M.F.=1.4) 6th year -(M.F.=1.5) 7th year -(M.F.=1.6) 8th year -(M.F.=1.7) 9th year -(M.F.=1.8) 10th year -(M.F.=1.9)	12 month	1.1 1.2 1.3 1.4 1.5 1.6 1.7 1.8 1.9	138000 138000 138000 138000 138000 138000 138000 138000 138000	138000.00 151800.00 165600.00 179400.00 193200.00 207000.00 220800.00 234600.00 248400.00 262200.00		Not Applicable
	Sub Total				2001000.00	NA	
20	Approach foot track to plantation in area where necessary	100	Rmt	20	716.00	14320.00	
21	Monitoring, Supervision (POL,Maint. Of Vechicle, including TE etc.) @ 12% and Contingency @ 3% to meet up unseen expenditure i.e 15% on Item No. 1 to 20 plus nursery cost over Rs. (5146999/- + 388740/- = 5535739/-)			15%		830360.85	
22	Entry Point Activities at the rate of Rs. 15800/- per ha. for Area-II	18.6	Ha.		15800.00	293880.00	
23	Provision for soil and moisture conservation structure (Site specific, if required) @ Rs. 8050/- per ha.	18.6	Ha.		8050.00	149730.00	
				GRAND TOTAL	Rs. 6809709.85		

Or say Rs. 6809710.00

Rupees Six Crore Eight lakh Nine Thousand Seven Hundred Ten only.

Estimated By:-


Range Forest Officer
Hayuliang Range

C/s


Divisional Forest Officer
Anjaw Forest Division

ANNEXUREN 'A'					
NORMS FOR ERECTING FENCING (100 RMT)					
SL. NO.	ITEMS	AMANTIRES OF MATERIALS FOR 100 RMT			
		UNIT	Quantity	RATE	AMOUNT
1	Barbed wire (5 strand)	Kg	85	100	8500.00
2	GIU Staple	Kg	2	100	200.00
3	GI Nails	kg	1	100	100.00
4	Jungle wood post	No	61	100	6100.00
5	Digging pits, erection of 800 post, straining 5 strand barbed wire & filling, fixing	Mandays	10	350	3500.00
Total Rs.					18400.00

Total Rs. 18400/- per 100 RMT. In Area-II


Range Forest Officer
Hayuliang Range


C/s
Divisional Forest Officer
Anjaw Forest Division