

# ESTIMATE FOR 20.5 HA BLOCK PLANTATION

Area (ha)	=	20.5
Spacing (m x m)	=	2 x 2
Number of Sapling / ha	=	2500
Length of Fence (RM) with four strand B/W	=	2000
Wage rate for the 1 <sup>st</sup> year (Rs)	=	240
Increase in wage rate for subsequent year by a factor	=	1.1
Appreciation of material costs by a factor	=	1.1

Sl No	Particulars of works	Units	Qty / Ha	Total Qty.	Rate / Unit	Amount (Rs.)
				<b>@ Rs. 240 / DL</b>		
<b>A</b>	<b>Erection of Fencing</b>			2000	800	1,60,000.00
	(a) Cost of full Chain – Linked Goat Proof fencing (3' ht. with 10 Gauge, 3" dia link to be fitted on Pre-cast RCC pillars at 1.8 mt. apart including transportation of fencing materials to site for 2000 RM @ Rs. 800 per RM as per estimate	RMs				
	(b) Wages of DLs for carrying, fitting, fixing etc. of fencing materials @ 20 DLs / 100 RM	DLs		400	240	96,000.00
<b>Sub – total</b>						<b>2,56,000.00</b>
<b>B</b>	<b>Infrastructure in Plantation Area</b>			1	150000	1,50,000.00
	Construction of camp hut (at least one up-to 25 ha & thereafter one per every 25 ha) as per estimate	Nos.				
	Installation of ring / tube well atleast one up-to 10 ha & thereafter two per every 25 ha)	Nos.		2	50000	1,00,000.00
	Irrigation facility with Diesel generator and hose pipes for watering the nursery and plantation (during dry spells)	Nos.		1	50000	50,000.00
	Cost of tools & implements (one unit upto 25 ha thereafter one unit per every 25 ha)	Nos.		1	10000	10,000.00
	Cost of RCC signboard & Gate including fitting and fixing of the same atleast one upto 25 ha & thereafter one per every 25 ha)	Nos.		1	60000	60,000.00
	Camp accessories @ Rs. 10000/- per camp	Nos.		1	10000	10,000.00
	Construction of Inspection Path 2500 RM @ Rs. 50/- RM	RMs		1800	50	90,000.00
<b>Sub – total</b>						<b>4,70,000.00</b>
				<b>@ Rs. 240/DL</b>		
<b>C</b>	<b>Advance Work</b>			20	200	240
	Site selection, surveying, demarcation, jungle cutting, burning etc. 20 DLs/Ha	DLs				48,000.00
	Preparation and acquisition of polypot samplings in the field nursery for planting 2500 Nos. Seedlings / ha @ Rs. 6/- per polypot	Nos.	2500	50000	6	3,00,000.00
<b>Preparation of polypot samplings in the field nursery for vacancy filling</b>						
	a) 25% mortality expected during 1 <sup>st</sup> year (to be planted in the field during the 2 <sup>nd</sup> year) i.e. 625 Sedlings / ha @ 6.5/- per polypot	Nos.	625	12500	6.5	81,250.00
	b) 20% mortality expected during 2 <sup>nd</sup> year (to be planted in the field during the 3 <sup>rd</sup> year) i.e. 500 Seedlings / ha @ Rs. 7/- per polypot	Nos.	500	10000	7	70,000.00
	c) 15% mortality expected during 3 <sup>rd</sup> year (to be planted in the field during the 4 <sup>th</sup> year) i.e. 375 Seedlings / ha @ Rs. 7.5/- per polypot	Nos.	375	7500	7.5	56,250.00

	d) 10% mortality expected during 4 <sup>th</sup> year (to be planted in the field during the 5 <sup>th</sup> year) i.e. 250 seedlings / ha @ Rs. 8/- per polypot	Nos.	250	5000	8	40,000.00
	Cost of Bamboo, making of stacking @ transportation etc	Nos.	625	12500	1	12,500.00
	Line alignment, carriage of stacking materials and fixing the stacking @ 5 Dls / ha	DLs	5	100	240	24,000.00
	Supervision and Monitoring	L.S.				20,000.00
	<b>Sub total</b>					<b>6,52,000.00</b>
<b>D</b>	<b>Creation &amp; 1<sup>st</sup> year maintenance</b>			<b>@ Rs.</b>	<b>240 / DL</b>	
	Soil working carriage of stumps polypot seedling and planting at the plantation site mulching, dibbling of seeds wherever necessary to complete raising of plantation with all necessary operation @ 40 DLs/ha	DLs	40	800	240	1,92,000.00
	5 weeding, mulching and fire protection works @ 18 Dls / ha/weeding	DLs	90	1800	240	4,32,000.00
	Upkeepment of plantation and marking of inspection path repairing of fence etc on day to day basis @ 5 DLs/ha	DLs	5	100	240	24,000.00
	Maintenance and protection field nursery and watch and ward for the plantation area (1 DL for 365 days)	DLs		365	240	87,600.00
	Maintenance of camp huts, implements, ring/tube well upkeepment of plantation, signboard, documentation, upkeepment of records and other misc. work.	LS				10,000.00
	Awareness and Monitoring @ Rs. 800/ha	LS		10	800	8,000.00
	<b>Sub total</b>					<b>7,53,600.00</b>
<b>E</b>	<b>2<sup>nd</sup> Year Maintenance</b>			<b>@ Rs.</b>	<b>264 / DL</b>	
	5 weedings, fire protection works @ 15 DLs/ha/weeding	DLs	75	1500	264	3,96,000.00
	25% vacancy filling by 1 year old seedlings from nursery @ 10 DLs/ha	DLs	10	500	264	1,32,000.00
	Upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	264	26,400.00
	Maintenance and protection of field nursery and watch and ward for the plantation area (1 DL for 365 days).	DLs		365	264	96,360.00
	Maintenance of camp hut, implements, ring / tube well upkeepment of plantation, signboard, documentation, upkeepment of records etc.	LS				10,000.00
	Supervision Cost	LS		1		8,000.00
	Contingency LS	LS				2,500.00
	<b>Sub total</b>					<b>6,71,260.00</b>
<b>F</b>	<b>3<sup>rd</sup> Year Maintenance</b>			<b>@ Rs.</b>	<b>290/DL</b>	
	4 weedings, fire protection works @ 15 DLs/ha/weeding	DLs	60	1200	290	3,48,000.00
	20%Vacancy filling by 2 year old seedlings form nursery @ 8 DLs/ha	DLs	8	160	290	46,400.00
	Protection work, cattle watching, upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	290	29,000.00
	Maintenance and protection of field nursery and watch and ward for the plantation area (1 DL for 365 days).	DLs		365	290	1,05,850.00
	Maintenance of camp hut, implements, ring / tube well upkeepment of plantation, signboard, documentation, upkeepment of records	LS				12,100.00

	Supervision Cost	LS		1		8,000.00
	Contingency @ 15% over previous year	LS				2,875.00
	<b>Sub total</b>					<b>5,52,225.00</b>
<b>G</b>	<b>4<sup>th</sup> year maintenance</b>			<b>@ Rs.</b>	<b>319/DL</b>	
	4 weedings, fire protection works @ 15 DLs/ha/weeding	DLs	60	1200	319	3,82,800.00
	15% Vacancy Filling by 2 year old seedlings from nursery @ 6 DLs/ha	DLs	6	120	319	38,280.00
	Upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	319	31,900.00
	Maintenance and protection of field nursery and watch and ward for the plantation area (1 DL for 365 days)	DLs		365	319	1,16,435.00
	Maintenance of camp hut, implements, ring / tube – well upkeepment of plantation, signboard, documentation, upkeepment of records etc.	L.S				13,310.00
	Supervision Cost	L.S		1		8,000.00
	Contingency @ 15% over previous year	L.S				3,306.00
	<b>Sub total</b>					<b>5,94,031.00</b>
<b>H</b>	<b>5<sup>th</sup> year maintenance</b>			<b>@ Rs.</b>	<b>350/DL</b>	
	Climber cutting, weeding & other silvicultural works and fire protection works @ 15/DLs/Ha	DLs	15	300	350	1,05,000.00
	10% Vacancy Filling by 2 year old seedlings from nursery @ 4 DLs/ha	DLs	4	80	350	28,000.00
	Maintenance & fencing post replacement @ 3% initial cost of material			0.03	1600000	48,000.00
	Upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 4 DLs/ha	DLs	4	80	350	28,000.00
	Watch and ward for the plantation area (1 DL for 365 days)	DLs		365	350	1,27,750.00
	Maintenance of camp hut. Implements, ring / tube well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				14,641.00
	Supervision Cost	L.S		1		8000.00
	Contingency @ 15% over previous year	L.S				3,802.00
	<b>Sub total</b>					<b>3,63,193.00</b>
<b>I</b>	<b>6<sup>th</sup> Year Maintenance</b>			<b>@ Rs.</b>	<b>385/DL</b>	
	Climber cutting, other silvicultural works and fire protection works @ 15 DLs/ha	DLs	15	300	385	1,15,500.00
	Upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 4 DLs/ha	DLs	4	80	385	30,800.00
	Watch and ward for the plantation area (1 DL for 365 days)	DLs		365	385	1,40,525.00
	Maintenance of camp hut, implements, ring/tube-well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				16,105.00
	Supervision Cost	L.S				8,000.00
	Contingency @ 15% over previous year	L.S				4,373.00
	<b>Sub total</b>					<b>3,15,303.00</b>
<b>J</b>	<b>7<sup>th</sup> Year maintenance</b>			<b>@ Rs.</b>	<b>423/DL</b>	
	Climber cutting, other silvicultural works and fire protection works @ 12 DLs/ha	DLs	12	240	423	1,01,520.00

	Protection work, cattle watching, upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	423	42,300.00
	Maintenance of camp hut, implements, ring/tube-well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				17,716.00
	Supervision Cost	L.S				8000.00
	Contingency @ 15% over previous year	L.S				5,028.00
	<b>Sub total</b>					<b>1,74,564.00</b>
<b>K</b>	<b>8<sup>th</sup> Year maintenance</b>	<b>@ Rs. 465/DL</b>				
	Climber cutting, other silvicultural works and fire protection works @ 8 DLs/ha	DLs	8	160	465	74,448.00
	Protection work, cattle watching, upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	465	46,500.00
	Maintenance of camp hut, implements, ring/tube-well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				19,487.00
	Supervision Cost	L.S				8000.00
	Contingency @ 15% over previous year	L.S				5,783.00
	<b>Sub total</b>					<b>1,54,218.00</b>
<b>L</b>	<b>9<sup>th</sup> Year maintenance</b>	<b>@ Rs. 511/DL</b>				
	Climber cutting, other silvicultural works and fire protection works @ 7 DLs/ha	DLs	7	140	511	71,540.00
	Protection work, cattle watching, upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 5 DLs/ha	DLs	5	100	511	51,100.00
	Maintenance of camp hut, implements, ring/tube-well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				21,436.00
	Supervision Cost	L.S				8000.00
	Contingency @ 15% over previous year	L.S				6,650.00
	<b>Sub total</b>					<b>1,58,726.00</b>
<b>M</b>	<b>10<sup>th</sup> Year Maintenance</b>	<b>@ Rs. 562/DL</b>				
	Climber cutting, other silvicultural works and fire protection works @ 6 DLs/ha	DLs	6	120	562	67,440.00
	Protection work, cattle watching, upkeepment of plantation, and making of inspection path, repairing of fence etc. on day to day basis @ 4 DLs/ha	DLs	4	80	562	44,960.00
	Maintenance of camp hut, implements, ring/tube-well, upkeepment of plantation, signboard, documentation & upkeepment of records etc.	L.S				23579.00
	Supervision Cost	L.S				8,000.00
	Contingency @ 15% over previous year	L.S				7,648.00
	<b>Sub total</b>					<b>1,51,627.00</b>
	<b>Total</b>					<b>52,66,747.00</b>
	<b>50% overhead cost</b>					<b>26,33,373.00</b>
	<b>Grand Total</b>					<b>79,00,120.00</b>
	<b>Say Rs.</b>					<b>79,00,000.00</b>

**(Seventy Nine Lakhs) only**

**Note :**

Cost escalation of 10% annually has been considered for wages.

The Norms should be revised annually based on wage rate & cost of materials.

Pre cast RCC pillar with 5" x 5" cross section of 6 ft height (1.5 ft below ground and 4.5 ft. above ground) with readymade concrete base of 1 ft width for fixing.

**Technically Approved**



Submitted



Divisional Forest Officer