

**National Horticulture Mission  
Department of Agriculture  
Government of India**

**Joint Inspection Team Report -2010**



**Implemented by**

**High Value Agriculture Development Agency  
Department of Agriculture  
Andaman and Nicobar Administration**

## **National Horticulture Mission-Joint Investigation Team Report-2010**

A team comprising of Dr.R.C.Upadhyaya, Chief Consultant, NHM, Department of Agriculture, Government of India, Dr.M.Sankaran, Senior Scientist, CARI, Port Blair and Dileep Kumar, Assistant Director of Agriculture, Department of Agriculture, Andaman & Nicobar Administration, had visited the various agriculture fields in South, Middle and North Andaman Districts covered under NHM project implemented by HVADA, Dept.of Agriculture, Andaman & Nicobar Administrations w.e.f.6<sup>th</sup> Dec,2010 to 10<sup>th</sup> Dec.2010

The details are as follows;

S. No	Village	Observations/ Supplied	NHM	Recommendations
1	Teylarabad South Andaman	Supply of organic inputs for multi-tier cropping with Arecanut-Black pepper-Banana-Papaya-Clove Area :		Field Board should be placed Supply of organic inputs should be monitored <ul style="list-style-type: none"> <li>• Black pepper runners should be rolled and kept at the bottom of standards</li> </ul>
2	Mr.Arulanandh New Bimliton	Gladiolus-Jasmine-Tuberose-Sapota and Guava Area: 0.1ha for each crop Low cost polyhouse:200Sqm		Specific crop can be given to group of farmers on cluster approach for best marketing <ul style="list-style-type: none"> <li>• Poor polythene sheets can be replaced with Silpoline sheet of 150GSM for low cost poly house purpose</li> <li>• IARI Marigold varieties can be tried</li> </ul>
3	Mr.Arokiyasa mi	Tissue culture Banana (Var.G9, Red Banana)		<ul style="list-style-type: none"> <li>• More area can be brought under tissue</li> </ul>

	Teylarabad	Area:0.4ha	<p>culture banana because of increasing market demand</p> <ul style="list-style-type: none"> <li>Ginger, Black pepper &amp; Turmeric can be promoted in coming years</li> </ul>
4	Mr.Elumalai Rangachang	Tissue Banana (G-9), Marigold & Jasmine have been supplied to the farmers for 0.1ha each	<ul style="list-style-type: none"> <li>The seedlings may be supplied, instead of supplying marigold seed.</li> </ul>
5	Mrs.Chellam Rangachang	Mango, sapota, guava, lemon, orange & Banana for 0.1ha each Low cost poly house 200Sqm	<ul style="list-style-type: none"> <li>Orange can be excluded</li> <li>UV Stabilized Silpoline with 150 GSM should be used for low cost poly house purpose</li> </ul>
7.12.2010 Visit to Neil Island, South Andaman			
1	Mr.C.H.Biswas	Mango, Guava & Marigold Area: 0.1 ha each	<ul style="list-style-type: none"> <li>High density planting of guava intercropped with Marigold was found to be remunerative</li> <li>Multiplication of marigold by shooting cutting may be popularized</li> </ul>
2	Mr.Suren Biswas	Marigold Area: 0.1ha	<ul style="list-style-type: none"> <li>Highly profitable crop in Neil Island</li> </ul>
3.	Mr.Chitranjan Bain	Marigold, Tuberose Area:0.1ha each	<ul style="list-style-type: none"> <li>Tuberose can be excluded and marigold area can be increased</li> </ul>
4	Mr.Ashim Bawali	Vermibed & low cost polyhouse	<ul style="list-style-type: none"> <li>UV Stabilized Silpoline with 150 GSM should be used for low cost poly house purpose</li> </ul>
5	Mr.Adhir	Input supply for coconut	<ul style="list-style-type: none"> <li>Spices should be</li> </ul>

	Mallick	gardens	included and biocontrol of pest can be promoted
8 <sup>th</sup> & 9 <sup>th</sup> December, Visit to Rangat & Maya Bunder areas			
1	Mr.B.C.Gain Govindpur	Tissue Culture Banana, Lemon each for 0.1 ha & Low cost poly house (200Sqm)	<ul style="list-style-type: none"> <li>• UV Stabilized Silpoline with 150 GSM should be used for low cost poly house purpose</li> <li>• Planting of tomato at bimonthly interval inside the poly house</li> <li>• Tomato var.Avinash-2, All rounder, Trishul and other bacterial wilt resistant varieties can be tried</li> <li>• Staggered planting of pineapple can be done across the slopes</li> </ul>
2	Mr.Ashok kumar Sarkar	Tissue Culture Banana, clove & Marigold for 0.1 ha & Low cost poly house (200Sqm)	<ul style="list-style-type: none"> <li>• UV Stabilized Silpoline with 150 GSM should be used for low cost poly house purpose</li> <li>• Planting of tomato at bimonthly interval inside the poly house</li> <li>• Tomato var.Avinash-2, All rounder, Trishul and other bacterial wilt resistant varieties can be tried</li> </ul>
3	Ms.Mahadev Baidya Tugapur Village	Pinepple (var.Kew) for 0.5 ha and Ginger 0.2 ha	<ul style="list-style-type: none"> <li>• Double row planting can be tried</li> </ul>
4	Mr.Radha	Banana (1.16ha)	<ul style="list-style-type: none"> <li>• Mandarins can be</li> </ul>

	Krishnan Nair Dharmapur Village	Mandarin (0.1ha) Black pepper (0.15 ha) Pineapple	replaced with other fruit crops and spices  <ul style="list-style-type: none"> <li>• A vermi compost unit can be established</li> </ul>
5	Mr.Sashidaran Nair Dharmapur Village	Banana (1.16ha) Mandarin (0.1ha) Sapota (0.1ha)	<ul style="list-style-type: none"> <li>• Mandarins can be replaced with other fruit crops and spices</li> <li>• A vermi compost unit can be established</li> </ul>
6	Mr.S.K.Sarkar Nimbutala	Low cost poly house	<ul style="list-style-type: none"> <li>• UV Stabilized Silpoline with 150 GSM should be used for low cost poly house purpose</li> <li>• Broccoli can be tried under poly house</li> </ul>
7	Mr. Kunjlal Hawildar	Cinnamon and Black pepper	<ul style="list-style-type: none"> <li>• Systematic planting of spices and fruit crops under areca nut garden can be done</li> </ul>
8	Mr.Panchanand Prasad Kadamtala	Ginger (0.1ha)	<ul style="list-style-type: none"> <li>• More area can be brought under ginger cultivation</li> </ul>
9.	Mr. Mesararian Kirkata	Tissue culture Banana (0.1ha)	<ul style="list-style-type: none"> <li>• Proper mulching and nutrient supply should be done</li> </ul>
1 0	Progeny Farm, Dept.of Agriculture Jirkatang	Spices, Pine apple & Polyhouse	Soil media standardization for poly house production of vegetable  <ul style="list-style-type: none"> <li>• Double &amp; Triple row system of planting</li> <li>• Standardization of sucker production in pineapple</li> </ul>

### **General Recommendations:**

- Coconuts based /Areca nut based farming technologies already developed can be popularized and system involving high value intercrops(Black pepper, nutmeg, clove, cinnamon, ginger, turmeric and pineapple) may be standardized and also organic farming practices for the system may be developed.
- Replanting, rejuvenation and consolidation of the old, senile and unproductive plantations in systematic way in a Mission Mode Approach with quality planting materials of high yielding varieties and hybrid.
- The required planting materials of the crop varieties/hybrids already released/identified should be made available to the farmers in adequate quantities at appropriate time. Community nurseries can be encouraged with proper training to farmers and providing basic infrastructures for raising such nurseries.
- Development of cost effective production technologies (Good Agriculture Practices) to make plantation crop more competitive in the domestic and main land market.
- Encourage inter/mixed/multiple and multistory cropping and mixed farming system with high value crops.
- Development of machinery for harvest and post harvest aspect of Plantation Crops is needed due to non availability of trained man power. Prevention of Post Harvest losses and value addition to be given priorities, especially from small Islands and interior areas.
- The farmers and field's functionaries may be provided regular trainings and visits to main land and at Port Blair in adopting latest technologies and promotion of farmers participations in R & D activities Training to the farmers and field functionaries on poly house management may be organized in collaboration with CARI.
- It has been observed that heavy toxic pesticides are used for vegetable production at A & N Islands. Therefore, neem based pesticide may be produced

with private-public partnership mode for reducing pesticide load on vegetable crop production, since Neem is commonly grown at A & N Islands.

- Integrated processing units (Coconut Mango etc.) may be set up with Public – Private-Farmers Partnership at A & N Islands and Integrated processes should be designed a viable unit but not too big. Banana ripening chamber facilities may be created near main vegetable/fruit market.
- The district officers may provide the monthly target and evaluate the achievement in the field and monitor the cumulative progress. SHM should also update to web based progress in first week of every month.
- Display boards with NHM logo may be placed wherever NHM financial assistance is provided.
- Organized market should be established in Islands for horticultural produce. Institution for certification of organic produce and its marketing should be established in Islands.
- Protected cultivation is very important and need to be promoted to grow high value, high quality horticultural produces including nursery management, plantation materials *etc.* under high temperature and high rainfall conditions of A & N Islands.

### **Introduction**

Andaman and Nicobar Island is a chain of 572 Island stretched from North to South and located about 1200 km of mainland on longitude 93°-94° East ant latitude 6° – 17° north. Out of the 572 islands & islets, 38 islands are inhabited and 8 islands are covered under various settlement programme. In term of livelihood, about 50% of the UT population is directly dependent of Agriculture & Allied Activities. The total land being used for agriculture is relatively small due to paucity of non-forested land and numerous competing infrastructural demands. Thus, only about 6% of the non-forested land i.e. about 50,000 ha is being used for agriculture purposes of which 10561 ha is under field crops and 29774 ha is under plantation crops. Devastating Tsunami of December, 2004 has further damaged permanently about 9% (4206 ha) of pre-Tsunami Agriculture Land. Half of the agriculture land is used for coconut

plantation, 10% is for areca nut and 20% for Fruits, Vegetables and Root Crops and 20% is for Paddy Cultivation. Due to land limitation high value and low volume agriculture has to be encouraged to increase productivity and make horticulture commercially viable.

No. of Farmers	-14525
No. of land holdings	-10410
Average holding size	-2.46 ha

### **Horticulture Status of A & N Island**

Islands enjoy tropical & humid climate and receive rainfall of nearly 3000 mm commencing from May-January and receive both Southwest and Northwest monsoon. The average mean temperature varies from 23° C to 32° C with 70-90% humidity. Topography is undulating and climate is congenial for plantation crops like coconut, areca nut and Horticulture crops like tropical fruits and spices.

Though plantation crops like coconut, areca nut and cashew are the plantation crops grown in the Island, coconut is the major crop grown in 20927 ha followed by areca nut (4046.44) and cashew nut (568.50 ha). All these are yielding far below the expectations due to low input management and also due to old age of plantations and senility. Despite repeated efforts to develop horticulture there has been no tangible impact in terms of increase in productivity and income generated by farmers. The productivity of most of the horticulture crops is however low, mainly due to inadequate awareness of hi-tech intervention & primitive methods of cultivation being practiced by the local population.

### **POTENTIAL OF HORTICULTURE**

The agro-climatic conditions of these islands are congenial for the horticulture crops like Fruits, Spices and Flowers. The Islands being the biodiversity rich one are the veritable treasure house of valuable medicinal aromatic and dye herbs, trees & shrubs. There is good scope for the production of tropical fruits like Mangosteen, Durian, Rambutan, Grapefruit, Pomelo & Longan which has high export potential. High Value Agriculture programme is tailored for these islands for boosting productivity of various horticulture crops. All the schemes have been formulated based on the guidelines of National Horticulture Mission, National Horticulture Board and Coconut Development Board. The estimated costs of all components are higher in the Andaman & Nicobar Islands as compared to the mainland condition hence the subsidy as per the existing pattern is not sufficient. The island being away from the mainland, transportation of various input creation of infrastructure for protected cultivation etc increases the cost estimate many folds and developing such structures

within the estimated cost given in the guidelines is not possible. Considering the higher cost index of Andaman & Nicobar Islands, scheme needs to be formulated considering the Andaman condition.

### **Coconut**

Coconut is considered as the only remunerative crop of the islands. The main economy of the people directly depends on the fortunes of the crop. Hence any disturbances in the coconut sector would affect the well being of the coconut farming community. In 1979-80 the area under coconut in the island was 20787 ha with a production of 67.29 million nuts. During the period of last two decades the area has been increased to 24746 ha production to 87.5 million nuts and the productivity is 3536 nuts per ha.

### **Cashew Nut**

Cashew Nut is grown in 568.50 ha with a production of 86 t and productivity level of 150 kg / ha / year. The present performance is not encouraging to go for area expansion. The reasons for such low performance should be carefully analyzed. While climatic conditions seem to be adequate, a research study should be taken up in a systematic way making use of available high yield varieties / hybrids or wait for 2 or 3 years to assess the performance of present study for a period of five years and then popularizing will be advisable. While bringing plantation materials from mail land internal quarantine should be strictly followed in order prevention of any entry of new pests and diseases.

### **Black Pepper**

Pepper being a vegetatively propagated perennial, the major bottle neck is damage caused by nematode *Radopholus similis*, fungus *Phytophthora capsici* and the pest pollu.

Resistant/ tolerant varieties like IISR Pournami, IISR Shakthi and IISR Thevam are available for cultivation. This coupled with retention of good quality parameters will help in producing high quality black pepper with less usage of pesticides and fungicides. The most probable approach to bring these characters into a single genotype is by gene pyramiding through conventional and biotechnological methods. High production technologies in black pepper resulted in substantial increase in yield. This with the knowledge of geographical region, in which high quality market driven organic pepper can be grown, will help India in retaining its position in pepper trade.

## **Ginger**

The most important indigenous cultivators like Maran, Himachal, Wynad Local, Nadia, BajPai, Kuruppampadi and other popular exotic cultivar Rio-de-janerio, and high yielding varieties like IISR Varada, IISR Mahima and IISR Rejatha may be popularized for increasing productivity. Mahima is also resistant to root knot nematode. Other improved varieties of ginger are Suprabha, Suruchi, Suravi (released by OUAT Pottangi, Orissa) and Himgiri (released by DYSPUHF, solan, Himachal Pradesh). Varieties suited for different end use such as oil varieties suited to different kinds of processing are also available. These varieties have very high export potential as India has 50% share in oil and Oleoresins trade in world market.

## **Turmeric**

IISR, Kozhikode has released high yielding and high quality (5.5-6.0% curcumin) turmeric varieties viz. IISR Prabha, IISR Pratibha, IISR Kedaram & IISR Alleppey Supreme. Kanthi, Sobha, Sona and Varna are the improved varieties of turmeric from Kerala Agriculture University, Trissur, Kerala and suranjana a new variety released for West Bengal by the BCKV, Kalyani are also suitable for adoption in A & N Islands as the agro climatic conditions are similar to these region.

## **Strategies**

To commercialize Horticulture/ an end-to-end approach comprising of technology dissemination from sowing –Harvest-Post-harvest technology-market-consumer linkage need to be established. High Value Agriculture programme sponsored by National Horticulture Mission, National Horticulture Board and Coconut Development Board are implemented through High Value Agriculture Development Agency, August, 2004.

## CLIMATE DATA

Month	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
<b>Average high °C (°F)</b>	29.4 (84.9)	30.2 (86.4)	31.5 (88.7)	32.5 (90.5)	31.1 (88)	29.6 (85.3)	29.2 (84.6)	29.1 (84.4)	29.1 (84.4)	29.6 (85.3)
<b>Average low °C (°F)</b>	23.1 (73.6)	22.5 (72.5)	23.2 (73.8)	24.7 (76.5)	24.7 (76.5)	24.4 (75.9)	24.3 (75.7)	24.2 (75.6)	23.7 (74.7)	23.7 (74.7)
<b><u>Precipitation</u> on mm (inches)</b>	46.4 (1.827)	26.5 (1.043)	29.3 (1.154)	69.0 (2.717)	360.4 (14.189)	501.1 (19.728)	423.7 (16.681)	425.1 (16.736)	463.0 (18.228)	300.7 (11.839)

### THRUST AREA

- Production & supply of good quality planting materials.
- Creation of water harvesting structures and recharge aquifers.
- Productivity improvement and value addition in Coconut.
- Establishment of Hi-tech nurseries for planting materials.
- Protected cultivation of flowers and exotic vegetables.
- Commercial cultivation of indigenous medicinal and aromatic plants and extracting of essential oils.
- Facilities at Port Blair airport for sorting perishables for its shipment to mainland.
- Establishment of Terminal Market on hub & spoken system, with spokes in main vegetable growing areas at islands and the Hub at Port Blair.
- Strengthening market information system and marketing infrastructure facilities.
- Infrastructure for grading, sorting and packaging centers in different production units.
- Private investment should be promoted through some incentives in the form of tax holiday, rebate in land allotment, concessions on import of machinery, exemption from octroi.

- To upgrade the Socio-Economic Status of Rural masses through non-farm activities.

**AREA PRODUCTION & PRODUCTIVITY OF DIFFERENT SPICES IN A & N ISLANDS:**

Spice Crops	2006-07		
	Area (ha)	Production (t)	Productivity (kg/ha)
<b>Black Pepper</b>	610.0	40.0	66.0
<b>Chilies</b>	400.0	900.0	2250.0
<b>Cinnamon</b>	153.0	18.0	118.0
<b>Clove</b>	200.0	8.0	40.0
<b>Ginger</b>	200.0	1900.0	9500.0
<b>Nutmeg</b>	83.0	5.0	60.0
<b>Turmeric</b>	100.0	700.0	7000.0

**Financial Achievements of High Value Agriculture in Andaman & Nicobar Islands (2005-06 to 2008-09)**

Funding Agency	Fund received (Rs. in lakh)	FUND UTILISATION (Rs. in lakh)					Balance Amount (Rs. in lakh)
		2005-06	2006-07	2007-08	2008-09	Total	
<b>NHM</b>	85.0	-	4.177	10.777	70.04	84.987	0.013
<b>NHB</b>	24.50	-	-	7.715	16.785	24.50	0.00
<b>CDB</b>	84.18	1.219	2.296	20.02	59.715	83.25	0.930
<b>TOTAL</b>	<b>193.68</b>	<b>1.219</b>	<b>6.473</b>	<b>38.512</b>	<b>146.185</b>	<b>192.382</b>	<b>1.298</b>

**Financial Achievements of High Value Agriculture in Andaman & Nicobar Islands during the year 2009-10**

Funding Agency	Fund received (2009-10) (Rs. in lakh)	Balance amount from the previous year	Total	Utilization	Balance Amount (Rs. in lakh)
<b>NHM</b>	200.00	0.013	200.013	153.14	46.872
<b>NHB</b>	-	-	-	-	-
<b>CDB</b>	122.702	0.930	123.632	105.99	17.64
<b>RR</b>	36.56	-	36.56	-	36.56
<b>TOTAL</b>	<b>322.702</b>	<b>0.943</b>	<b>360.205</b>	<b>259.13</b>	<b>101.702</b>

**Financial Achievements of High Value Agriculture in Andaman & Nicobar Islands during the year 2010-11**

Funding Agency	Fund received (2010-11) (Rs. in lakh)	Balance amount from the previous year	Total	Utilization	Balance Amount (Rs. in lakh)
<b>NHM</b>	152.00	46.872	198.872	133.267	65.605
<b>NHB</b>	-	-	-	-	-
<b>CDB</b>	63.105	17.64	80.745	78.335	2.41
<b>RR</b>	-	36.56	36.56	30.42	6.14
<b>TOTAL</b>	<b>215.105</b>	<b>101.072</b>	<b>316.177</b>	<b>242.022</b>	<b>74.155</b>

**Physical and Financial Achievement Report up to March 2007 under the scheme of High Value Agriculture**

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
<b>A</b>	<b>NATIONAL HORTICULTURE MISSION</b>						
<b>1</b>	<b>Establishment of high tech model nursery for fruit plants and ornamental both small and large farmers</b>						

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
a.	Public sector ( 4 ha)	1 Nos.	18.0	-	-	-	
b.	Private sector (1 ha )	2 Nos.	3.0	-	-	-	
<b>2.</b>	<b>Establishment of new garden of Fruits</b>						
a.	Fruits ( perennials)	50 ha.	11.25	0.23	-	0.02588	
b.	Fruits ( Non Perennials)	100 ha	15.00	8.14	-	1.22100	
<b>3.</b>	<b>Establishment of New garden of Flowers</b>						
a.	Cut Flowers	5 ha	1.75	-	-	-	
b.	Bulbous Flowers	5 ha	2.25	-	-	-	
c.	Loose Flowers	10 ha	1.20	-	-	-	
<b>4.</b>	<b>Establishment of New Garden of medicinal, aromatic or dye plants</b>	100 ha	11.25	-	-	-	
	<b>Area Expansion of Spices</b>						
a.	Black pepper	100 ha	11.25	3.19	-	0.17945	
b.	Clove	20 ha	2.250	1.02	-	0.05738	
c.	Nutmeg	12 ha	1.350	0.06	-	0.00338	
d.	Cinnamon	30 ha	3.375	1.8	-	0.10126	
e.	Ginger	100 ha	11.25	3.355	-	0.37746	
f.	Turmeric	50 ha	5.625	1.5	-	0.16877	
<b>5.</b>	<b>Rejuvenation of Black Pepper Garden</b>	100 ha	15.0	0.35	-	0.0525	
<b>6.</b>	<b>Protected Cultivation</b>						
a.	Green House (Small & Marginal)	10 farmers	12.50	-	-	-	
b.	Mulching	10 ha	7.0	-	-	-	
c.	Shade net	2 ha	1.40	-	-	-	
d.	Plastic Tunnel	10 farmers	2.50	-	-	-	
<b>7.</b>	<b>Promotion Of IPM</b>	100 ha	1.0	-	-	-	
<b>8.</b>	<b>Area to be brought under Organic Cultivation of Spices</b>	100 ha	10.0	-	-	-	
<b>9.</b>	<b>Pollination support through Bee Keeping</b>	100 Nos	0.80	-	-	-	
<b>10.</b>	<b>Transfer of Technology</b>						
a.	Introduction of New Technologies- Demonstration on hi-tech veg./ flowers under CA	5 nos	25.00	-	-	-	
b.	Technology awareness programme	1 no	3.00	-	-	-	

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
c.	Domestic and International tours						
	1) Domestic	15 nos	3.00	-	-	-	
	2) International	14 nos	28.00	-	-	-	
<b>11.</b>	<b>Mission Management</b>	-	10.40	-	-	1.99	
	<b>Total of A</b>		<b>218.40</b>	<b>19.645</b>	<b>-</b>	<b>4.17708</b>	
<b>B</b>	<b>NATIONAL HORT. BOARD</b>						
<b>1.</b>	Development of commercial horticulture crop through production & post harvest management	Project Based	-	2.0 vanilla cultivation	-	5.187	
<b>2.</b>	Capital investment subsidy for construction/Expansion / Modernization of cold storage / storage of horticulture produce	Project based	-	-	-	-	
	<b>Total of B</b>			<b>2.0</b>	<b>-</b>	<b>5.187</b>	
<b>C</b>	<b>COCONUT DEV. BOARD</b>						
<b>1.</b>	Removal & Replanting of Coconut Palm	1000 nos	25.80	-	890	2.29620	
<b>2.</b>	Demonstration Plot adopting full package of technology	50 ha	17.50	-	-	-	
<b>3</b>	Production Of Organic manures/ Vermi- Compost in cultivators field	20 nos	4.00	-	-	-	
<b>4.</b>	Establishment of mother garden for producing DXT hybrid seed nuts	Project Based	Project Based	-	-	-	
<b>5.</b>	Supply of Copra dryer –CDB Model or any improved copra dryer	20 nos	2.00	-	-	-	
<b>6.</b>	Setting up of Integrated Coconut Processing Complex	Project Based	80.00	-	-	-	
	<b>Total of C</b>		<b>129.30</b>		<b>890</b>	<b>2.29620</b>	
	<b>Total (A + B+ C)</b>		<b>347.70</b>	<b>21.645</b>	<b>890</b>	<b>11.66028</b>	

**Physical and Financial Achievement for the year 2007-08 (April 2007 to March 2008) under the scheme of High Value Agriculture**

S. No	Particulars	Target	Physical Achievement	Financial Achievement (in Lakh)	Remarks
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		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
<b>A</b>	<b>NATIONAL HORTICULTURE MISSION</b>						
<b>1</b>	<b>Establishment of high tech model nursery for fruit plants and ornamental both small and large farmers</b>						
a.	Public sector ( 4 ha)	1 Nos.	18.0	-	-	-	
b.	Private sector (1 ha )	2 Nos.	1.5	-	-	-	
<b>2.</b>	<b>Establishment of new garden of Fruits</b>						
a.	Fruits ( perennials)	30 ha.	6.75	7.8	20	0.83697	
b.	Fruits ( Non Perennials)	50 ha	7.50	11.61	66	1.74150	
<b>3.</b>	<b>Establishment of New garden of Flowers</b>						
a.	Cut Flowers	5 ha	1.75	-	-	-	
b.	Bulbous Flowers	5 ha	2.25	-	-	-	
c.	Loose Flowers	10 ha	1.20	0.27	2	0.03240	
<b>4.</b>	<b>Establishment of New Garden of medicinal, aromatic or dye plants</b>	100 ha	11.25	0.9	4	0.04218	
	<b>Area Expansion of Spices</b>						
a.	Black pepper	100 ha	11.25	6.79	15	0.35159	
b.	Clove	15 ha	1.690	4.35	26	0.23788	
c.	Nutmeg	12 ha	1.350	0.1	1	0.00562	
d.	Cinnamon	20 ha	2.250	1.0	3	0.05624	
e.	Ginger	100 ha	11.24	12.06	54	1.35670	
f.	Turmeric	40 ha	4.50	1.78	14	0.20026	
<b>5.</b>	<b>Rejuvenation of Black Pepper Garden</b>	100 ha	15.0	0.32	3	0.04800	
<b>6.</b>	<b>Protected Cultivation</b>						
a.	Green House (Small & Marginal)	10 farmers	-	350 Sqm	1	0.43750	
b.	Mulching	10 ha	0.70	-	-	-	
c.	Shade net	2 ha	1.40	-	-	-	
d.	Plastic Tunnel	10 farmers	0.25	-	-	-	
<b>7.</b>	<b>Promotion Of IPM</b>	75 ha	0.75	-	-	-	
<b>8.</b>	<b>Area to be brought under Organic Cultivation of Spices</b>	100 ha	10.0	0.23	2	0.02300	
<b>9.</b>	<b>Pollination support through Bee Keeping</b>	50 Nos	0.40	-	-	-	

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of. Beneficiary		
<b>10.</b>	<b>Transfer of Technology</b>						
a.	Introduction of New Technologies- Demonstration on hi-tech veg./ flowers under CA	3 nos	15.00	-	-	-	
b.	Technology awareness programme	1 no	3.00	2 nos	-	2.96893	
c.	Domestic and International tours						
	1) Domestic	15 nos	3.00	-	-	-	
	2) International	14 nos	28.00	-	-	-	
<b>11.</b>	<b>Mission Management</b>	-	8.312	-	-	2.43860	
	<b>Total of</b>					<b>10.77737</b>	
<b>B</b>	<b>NATIONAL HORT. BOARD</b>						
1.	Technology Development & Transfer for Promotion of Horticulture		24.50 Lakhs			7.75487	
	<b>Total of B</b>		<b>24.50 Lakhs</b>			<b>7.75487</b>	
<b>C</b>	<b>COCONUT DEV. BOARD</b>						
1.	Removal & Replanting of Coconut Palm	5000 nos		1392 Nos	118	3.59136	
2.	Demonstration Plot adopting full package of technology	60 ha	10.5	94.08	126 nos	14.26495	2 <sup>nd</sup> year 4.68 Ha 0.81900 1 <sup>st</sup> year 89.40 Ha 13.44595
3	Production Of Organic manures/ Vermi-Compost in cultivators field	20 nos	4.00	16 nos	16 nos	2.16427	
4.	Establishment of mother garden for producing DXT hybrid seed nuts	Project Based	Project Based	-	-	-	
5.	Supply of Copra dryer – CDB Model or any improved copra dryer	25 nos	2.50	-	-	-	
6.	Setting up of Integrated Coconut Processing Complex	Project Based	Project Based	-	-	-	

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of. Beneficiary		
			<b>29.90 Lakhs</b>			<b>20.0258</b>	
	<b>Total (A + B+ C)</b>					<b>38.55804</b>	

**Physical and Financial Achievement for the year 2008 -09 (up to March, 09)  
under the Scheme of High Value Agriculture in  
A & N Islands**

S. No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary	
<b>A</b>	<b>NATIONAL HORTICULTURE MISSION</b>					
1	Establishment of high tech model nursery for fruit plants and ornamental both small and large farmers					
a.	Public sector ( 4 ha)	1 No	18.0	3 Nos	-	20.45
b.	Private sector (1 ha )	2 Nos.	1.5	-	-	-
2.	Establishment of new garden of Fruits					
a.	Fruits ( Perennials)	27.80 ha.	2.979	22.29	102	2.51
b.	Fruits ( Non Perennials)	60 ha	9.0	23.14	150	3.47
<b>3.</b>	Establishment of New garden of Flowers					
a.	Cut Flowers	5 ha	1.75	-	-	-
b.	Bulbulous Flowers	5 ha	2.25	-	-	0.43
c.	Loose Flowers	10 ha	1.20	3.52	44	0.48
<b>4.</b>	Establishment of New Garden of medicinal, aromatic or dye plants	50.90	2.925	0.3	02	0.01
(2)	Area Expansion of Spices					
a.	Black pepper	106.79	5.794	4.85	16	0.23
b.	Clove	19.35	1.012	3.49	29	0.196
c.	Nutmeg	12 ha	0.68	-	-	-
d.	Cinnamon	20 ha	1.13	1.0	03	0.029
e.	Ginger	100 ha	11.25	13.64	89	1.53
f.	Turmeric	40 ha	4.50	1.1	11	0.25
<b>5.</b>	Rejuvenation of Black Pepper Garden	100 ha	15.0	50.0	128	7.50
<b>6.</b>	Protected Cultivation					
a.	Green House (Small & Marginal)	0.50	6.25	1 No.	1	1.90
b.	Mulching	10 ha	0.70	1 no.	1	0.09
c.	Shade net	2 ha	1.40	-	-	-
d.	Plastic Tunnel	0.50	0.25	1 no.	1	0.025
<b>7.</b>	Area to be brought under Organic Cultivation of Spices	100 ha	10.0	100	190	9.997
<b>8.</b>	Pollination support through Bee Keeping	100	0.80	-	70	0.56

<b>9.</b>	Transfer of Technology					
a.	Introduction of New Technologies-Demonstration on hi-tech veg./ flowers under CA	3 nos	15.00	3 nos	-	14.65
b.	Technology awareness programme	2 nos	6.00	9 nos	300	2.07
c.	Domestic and International tours					
	1) Domestic	15 nos	3.00	-	-	-
	2) International	5 nos	10.00	-	-	-
<b>10.</b>	Mission Management	-	6.619	-	-	3.663
	<b>Total of A</b>		<b>139.0</b>		<b>1137</b>	<b>70.04</b>
<b>B</b>	<b>NATIONAL HORT. BOARD</b>					
1.	Technology Development & Transfer for Promotion of Horticulture		16.785 Lakhs	-	-	16.785
	<b>Total of B</b>		<b>16.785</b>	-	-	<b>16.785</b>
<b>C</b>	<b>COCONUT DEV. BOARD SCHEMES :-</b>					
1.	Demonstration Plot adopting full package of technology					
	1 <sup>st</sup> Year	200 ha	35.0	242.20	286+ (80 Tuhet)	42.385
	2 <sup>nd</sup> Year	89.40 ha	18.0	89.4	121	15.645
2	Production Of Organic manures/ Vermi- Compost in cultivators field	50 nos	10.00	23	-	1.685
3.	Establishment of mother garden for producing DXT hybrid seed nuts	Project Based	Project Based	-	-	-
4.	Supply of Copra dryer –CDB Model or any improved copra dryer	25 nos	2.50	-	-	-
5.	Setting up of Integrated Coconut Processing Complex	Project Based	Project Based	-	-	-
	<b>Total of C</b>		<b>65.50</b>			<b>59.715</b>
	<b>Total (A+B+C)</b>					<b>146.54</b>

**Physical and Financial Achievement for the year 2009 -10 (w.e.f. April, 2009 to March, 2010) under the Scheme of High Value Agriculture in A & N Islands**

S.No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
<b>A</b>	<b>NATIONAL HORTICULTURE MISSION</b>						
<b>1.</b>	Establishment of high tech model nursery for fruit plants and ornamental both small and large farmers						
A.	Public Sector						Only infrastructure is constructed. Other components will be done after receipt of fund.
a.	Model Nursery (4 ha )	4 nos.	72	4 nos.	-	28.4175	
b.	Small Nursery (1 ha )	15 nos.	45	7 nos.		31.780	
B.	Private sector						
a.	Small Nursery (1 ha )	4 nos.	6	-	-	-	-
<b>2.</b>	Establishment of new garden of Fruits						
a.	Fruits ( Perennials)	64 ha.	5.63	83.48	209	9.60	
b.	Fruits ( Non Perennials)	80 ha.	12	22.90	116	3.435	
<b>3.</b>	Establishment of New garden of Flowers						
a.	Cut Flowers	5 ha.	1.75	0.20	2	0.070	
b.	Bulbulous Flowers	5 ha.	2.25	9.10	43	4.0950	
c.	Loose Flowers	10 ha.	1.20	10.7	103	1.280	
<b>4.</b>	Establishment of New Garden of medicinal, aromatic or dye plants						
(1)	Area Expansion of Spices						
a.	Black pepper	50.89 ha.	2.57	11.74	49	4.794	
b.	Clove	7 ha.	0.33	3.36	28	1.315	
c.	Nutmeg	5 ha.	0.28	0.40	2	0.02	
d.	Cinnamon	10 ha	0.56	1.46	6	0.058	
e.	Ginger	50 ha.	5.63	13.79	95	1.551	
f.	Turmeric	7 ha.	0.74	1.52	9	0.17	
<b>5.</b>	Rejuvenation of Fruits/ Spices (Black Pepper Garden)						
		200 ha.	30	-	-	-	

<b>6.</b>	Protected Cultivation						
a.	Green House (Small & Marginal)	5 ha.	102.50	2.0	50	9.60	
b.	Mulching	10 ha.	0.70	10	16	0.70	
c.	Shade net	2 ha.	1.40	2.0	35	1.398	
d.	Plastic Tunnel	1 ha.	0.50	1.0	15	0.495	
<b>7.</b>	Promotion of INM/IPM	200 ha.	2.00	200	120	2.00	
<b>8.</b>	Area to be brought under Organic Cultivation of Spices	100 ha.	10	90	142	8.96	
<b>9.</b>	Pollination support through Bee Keeping	700 Nos.	5.60	580	580	4.32	
<b>10.</b>	Transfer of Technology						
a.	Introduction of New Technologies- Demonstration on hi-tech veg./ flowers under CA in farmers' fields	10 Nos.	50	2 no	-	9.49	
b.	Technology awareness programme	11	17.0	-	-	17.606	
c.	Domestic and International tours						
	1) Domestic	12	3.00	3 nos.		0.782	
	2) International	5	10.00	-	-	-	
d.	Study tour for farmers	2 Gp	6.00	2 Gr.	30	2.794	
e.	Introduction, rapid multiplication and popularization of Hort. crop- Dragon Fruit (Hylocereus undatus) with emphasis on domestic and export promotion.(Demonstration in Govt. Farm in 1.0 Ha Project Based)	Project is sent separately	20.0	-	-	-	
<b>11.</b>	Mission Management		20.75	-	-	8.41	
	<b>Total</b>		<b>435.72</b>		<b>1532</b>	<b>153.141</b>	

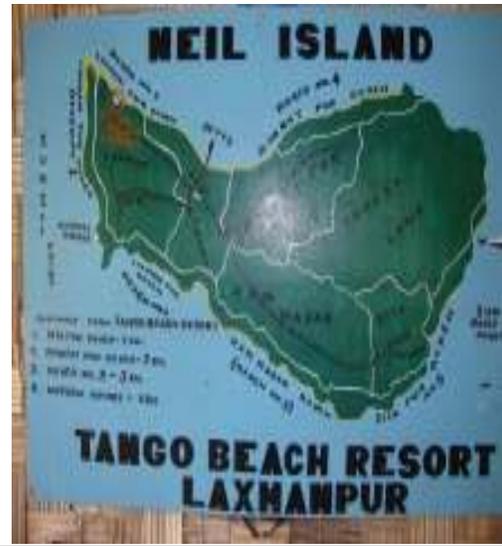
**Physical and Financial Achievement for the year 2009 -10 (w.e.f April 2009 to March 2010) under the Coconut Development Board Schemes of High Value Agriculture in A & N Islands**

SO. No	Particulars	Target		Physical Achievement		Financial Achievement (Rs. in Lakh)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
	<b>COCONUT DEVELOPMENT BOARD SCHEMES :</b>						
1.	Demonstration Plot adopting full package of technology	242.20 ha	42.39	242.20	366	42.39	
	2 <sup>nd</sup> Year	350 ha	61.25	325.00	385	56.88	
	1 <sup>st</sup> Year						
2	Production Of Organic manures/ Vermi-Compost in cultivators field	100 nos.	20.00	34 Nos.	34	6.52	
3.	Cutting & Removal of Disease Affected/ Senile Coconut Palms	600 ha.	30.00	-	-		
4.	Rejuvenation of Senile Coconut Plantation.(1 <sup>st</sup> installment )	2000 ha	150.00	-	-	-	
3.	Establishment of mother garden for producing DXT hybrid seed nuts	Project Based	6.00	-	-	-	
4.	Supply of Copra dryer – CDB Model or any improved copra dryer	150 ha.	15.00	2 Nos.	2	0.20	
5.	Setting up of Integrated Coconut Processing Complex	Project Based	Project Based			-	
	<b>Total</b>		<b>324.64</b>		<b>787</b>	<b>105.99</b>	

**Physical & Financial Achievements for the year 2010(w.e.f April, 2010 to oct. 2010 under the Scheme of High Value Agriculture in A & N Islands**

S.No	Particulars	Target		Physical Achievement		Financial Achievement (in Lakhs)	Remarks
		Physical	Financial (in Lakh)	Area (Ha)	No. of Beneficiary		
<b>A</b>	<b>NATIONAL HORTICULTURE MISSION</b>						
1	Establishment of high tech model nursery for fruit plants and ornamental both small and large farmers						
A.	Public Sector						
a.	Model Nursery (4 ha )	1 no.	25	1 no.	-	3.32	Committed exp. Rs.18.72 Lakhs
b.	Small Nursery (1 ha )	1 no.	6.25	-	-	4.80	Committed exp. Rs. 26.98 Lakhs
B.	Private sector						
a.	Small Nursery (1 ha )	2 no.	6.25	-	-	-	-
2.	Establishment of new garden of Fruits						
a.	Fruits ( Perennials)	145 ha.	26.50	21.11	60	5.05	
b.	Fruits ( Non Perennials)						
	i) T.C. Banana	25 ha.	9.375	7.60	55	2.85	
	ii) Banana & Pineapple Suckers	20 ha.	5.25	1.79	10	0.469	
3.	Establishment of New garden of Flowers						
a.	Bulbulous Flowers	12 ha.	5.40	0.20	1	0.09	Committed Exp. 12 ha Rs. 5.40
b.	Loose Flowers	20 ha.	2.40	0.20	2	0.024	20 ha Rs. 2.40
(4)	Area Expansion of Spices						
a.	Black pepper	115 ha	12.60	3.05	9	0.37	
b.	Clove	16 ha.	1.88	2.19	14	0.26	
c.	Cinnamon	50 ha	6.0	0.06	6	0.066	
d.	Ginger	40 ha.	5.00	0.7	6	0.088	
e.	Turmeric	10 ha.	1.25	-	-	-	
5.	Establishment of New Garden - Cashew	150 ha.	18.00	47.15	42	5.522	Committed- Rs.7.80
6.	Rejuvenation of Fruits/ Spices Garden						
a.	Rejuvenation of Fruits/ Spices Garden	50 ha.	7.50	-	-	-	
b.	Rejuvenation/ Replacement of senile orchards of Cashew.	50 ha.	7.50	-	-	-	

**Transport of Horticulture produce from Neil Island:**



**Loading of vegetables and fruits from Neil Island in Motor Boat:**



**High Density Guava orchard at Neil Island of South Andaman:**



**Guava orchard intercrop with marigold Low cost poly house for nursery:**



**Cultivation of Papaya with local germ-plasm at Neil Island and South Andaman:**



**Tissue Culture Banana Plantation of Var. G-9 as Sole Crop at South Andman and Mayabunder:**



**Vermi Compost pit and Low Cost vermi compost unit at Rangit and Mayabunder of Andaman Island:**



**Vermi Compost Units and Vermi wash with Neem used liquid as pesticide:**



**Plantation of Coconut under High Value Agriculture and Productivity Improvement:**



**Farmer use Pheromone Trap for control of fruit fly in Coconut and mango crops:**



**Mango local cultivars in fruiting at  
A & N Islands:**



**Ginger cultivation in South Andaman  
and Rangit.**



**Vermi compost unit in Mayabuder area:**

**cuttings**



**Marigold seedling multiplied by**

**for plantation:**



**Arecanut based farming system in Jartang system in Jartang South Andaman:**

**Coconut based farming South Andaman:**



**Areca nut based Bari system having intercrops of banana, blackpepper and lemon**



**Pineapple cultivation in farmer's field at Mayabunder area:**



**Tapioca cultivation in farmer's field    Orange orchard D.Nair,Darampur**



**Black pepper rejuvenation programme      cauliflower in low cost poly house  
in South Andaman                                      at farmer**



**Spices nursery and pineapple nursery at Jartang Govt. farm for distribution  
to the farmers:**



**Spices nursery and pineapple nursery at Jartang Govt. farm for distribution to the farmers:**



**Local Banana production**



**Poly house for nursery at Jartang**



**Workshop on organic production of Horticultural: Potato Tuber Seeds for cultivation at**

**Diglipur**

