

Government of Vanuatu
Department of Forests



Forestry Newsletter



Mr Tate Hanington, Director of Forests

WELCOME REMARKS

Enough Talk, it is Action Time.

Dear valued readers and owners of the forests. In this issue we bring you stories of happenings in the forestry sector in Vanuatu. In the last issue, we featured the launch of the National Tree Planting Day and in this issue we featured citizens of Vanuatu actioning that event which falls on 21st June. This is an annual event starting this year. What is more exciting though is that Tafea Province has initiated its Tree Planting Program starting this year and their story is featured in this issue. Penama is coming up and other provinces need to follow suite. Protection of forests and guiding forests to address impacts of global climate change is hot on the Forestry's agenda and the Newsletter covers that as well.

The Ambition for the forestry sector is to put Vanuatu back on the map as an exporter of forest products. It will take time and probably a lot of pain, but we can't change course. Together we will achieve that goal.

Enjoy reading and keep watching for more achievements in the next issue.

See you!

NATIONAL TREE PLANTING DAY WAS A SUCCESSFUL HISTORICAL EVENT FOR VANUATU AFTER 35 YEARS.

The National Tree Planting Day was launched and declared by the Minister of Agriculture Hon. Seremiah Matai Nawalu as a national annual event on 23rd March 2016. The 21st of June was earmarked as a national planting day which each individual in Vanuatu was encouraged to plant a tree. The program was recognised as part of the Salwai-Government's 100 Days Plan; thus became a priority activity for the Department and was carried out successfully on the 21st of June.

The effort of engaging a nationwide participation towards tree planting was never been done since Vanuatu gained its independence in 1980. This mass planting was witnessed by many individuals in Vanuatu who realised the importance of that day by not only

planting a tree to commemorate the event but adding extra value to a particular land. It was a special day for those planting a tree for the first time; thus it'll be unforgettable, but for those who increased the number of trees planted in their woodlots was a plus for them and forestry development. For those who have shown interest and participated in the program have contributed to the forestry development and helping the environment and contributed to the theme: **One Day, One Tree, One Life.**

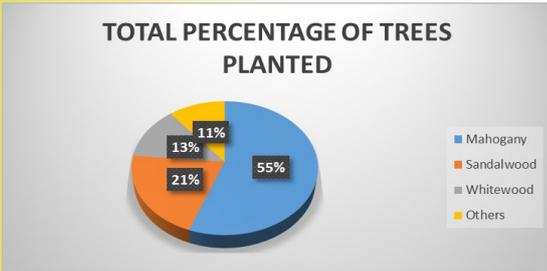
Since it is a national event and according to the Department of Forests planting information or data collected nationally showed some great records which proved that the activity was implemented successfully although not all islands in Vanuatu had participated.



Seaside Primary School students on the planting day

The total number of trees planted during the National Tree Planting Day stood at 24, 494 including both seedlings and wildings. Efate or SHEFA Province led by planting a total of 8,801 seedlings, followed by Tanna with 5,700 and Malekula with 1,600. However, there were 24 islands in Vanuatu which participated in the National Tree Planting Day.

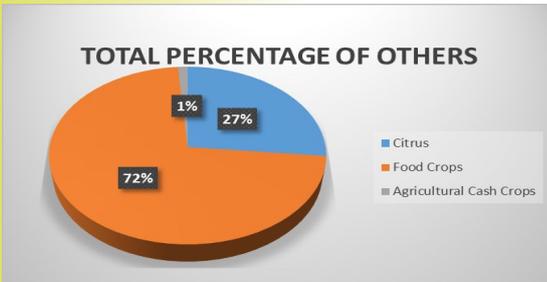
Interestingly, Mahogany Wildings has the highest number planted so far with 34.6%, followed by Sandalwood with 21.2%, Mahogany with 20.2% and Whitewood with 13%.



According to the type of plants planted at that time seen that the trees with 95.4%, Citrus with 1.2%, Agricultural Cash Crops with 0.05% and food crops with 3.3%. Otherwise there are 24 islands in Vanuatu which had participated in the National Tree Planting Day. The tree species planted include;

- Mahogany – 13,917 seedlings
- Sandalwood – 5,199 seedlings
- Whitewood – 3,181 seedlings

Other fruit tree species were planted; citrus in particular and other agricultural cash crops.



The national tree planting day was very successful not only in SHEFA but in other Provinces such as SANMA, PENAMA, TORBA, MALAMPA and TAFEA. .



Lycee Antoine de Bougainville



VBTC



Tanna



Banks



Ambae



Police officers planting trees



Santo

The Department of Forests wishes to acknowledged the participation and contributions of the government of Vanuatu, Private Sectors, Provincial centres, Churches, Schools, Youths, rural communities and every individual who participated in planting a tree and provided records to the Department as requested.

Table of Contents

1. National tree planting Day report
2. Seedlings distribution to PAM affected areas in Vanuatu
3. A town like Sandalwood
4. GEFPAS Forest and Protected Management Area Project
5. REDD+ PTAC report
6. Continuation of Enhancing management and processing systems for value adding in Whitewood plantations in Vanuatu Project report
7. Provincial forestry news



Final Report on Distribution of Seedlings to Cyclone Pam affected areas in Vanuatu

By Hanington Tate
Director of Forests (Focal Point)

1.0 Background

The category 5 Tropical Cyclone Pam (TC PAM) ravaged through Vanuatu on the 13th and 14th of March in 2015 and caused severe damage to both the natural and planted forests in the provinces of PENAMA, MALAMPA, SHEFA and TAFEA. The islands in SHEFA and TAFEA provinces were the most affected when the cyclone made landfall in these provinces. The damage was extensive, and photographic evidence showed that natural forests in some areas sustained up to 100 percent damage. Woodlot farmers and small scale forestry farmers reported that 100 percent of their crops sustained severe damage and up to 90 percent in some areas were lost.

Forests and forest products are important for the 80 percent of Vanuatu's population that lives in the rural area, providing them with daily livelihood needs. This section of the population depends on the forests for several goods and services such as fuel wood, building materials, medicine, food; and also in several of the remote communities, forest products has been an important source of income. Therefore assisting these communities to quickly restore their forests is important; this will assist with recovery of forest products and resources associated with the forests.

The Government nursery in Port Vila (SHEFA) province usually holds a high stock of seedlings and supplies other provinces on demand. The Port Vila nursery was however destroyed by the cyclone therefore seedlings have to be sought elsewhere. SANMA province was not affected by TC Pam, therefore it has been selected to provide seedlings to the SHEFA and TAFEA provinces which were most affected. The possibility of moving the seedlings from Santo to these provinces were made possible through financial support of the Food and Agriculture Organization (FAO) of the United Nations.

This report is the terminal report for the Letter of Agreement (LOA) between the Department of Forests and FAO. The report will cover the activities executed in accordance with the LOA, from beginning of the agreement till the end.

2.0 Seedlings and Planting Materials

The Department of Forests arranged and purchase both

seedlings and wildings for distribution. A total of 7,500 hundred seedlings, made up of Whitewood, Sandalwood and Mahogany were shipped from Luganville in Santo to Port Vila. Department of Forests in Port Vila topped up the seedlings with an addition seedlings of Sandalwood, Mahogany, Whitewood and Natapoa, Namau and Natangura. The seedlings were monitored and weak or dead seedlings were removed and replaced with stronger ones, and numbers topped up with Mahogany wildings.

The seedlings have been kept in Port Vila for more than the required time due to transportation difficulties and also drought on the islands being selected for distribution. While in Vila, the seedlings generated further interest among communities on Efate, and the Department acquired additional 10,000 Mahogany in the form of wildings from Santo to supply this demand on Efate island. Mahogany wildings are also packaged for distribution tSeedlings and wildings from Luganville, Santo were transported to the islands Erromango, Aniwa and Aneityum.

Table 1: Type of planting material, species and the quantity of each species prepared for delivering to communities

Type of Planting Material	Species	Quantity
Seedlings	Sandalwood	2,825
	Whitewood	2410
	Mahogany	2429
	Natapoa	148
	Namamau	92
	Natangura	320
Wildings	Mahogany	8,121
Total		16,345

3.0 Recipient communities and islands

Recipients of the seedlings were SHEFA and TAFEA Provinces. In SHEFA province, the islands selected for distribution of seedlings are Efate, Efate outer islands and the Shepherds Islands. For TAFEA province, Tanna was the main island followed by Erromango, Aniwa and Aneityum.

In SHEFA province, seedlings have been distributed to the islands of Lelepa, Mosso, Nguna, Pele and Emau. Mahogany wildings have also been distributed to Efate island. Seedlings destined for the islands of Mataso, Emae, Buninga, Tongariki, Tongoa and Epi are currently on the way to their destination.

Seedlings to TAFEA province were sent in May to Tanna. The Officer on Tanna has received the 4,500 seedlings and has distributed the seedlings to the communities on Tanna. The Department of forests in Vila are currently preparing 1,300 Mahogany wildings for shipment to Erromango, Aniwa and Aneityum.

Continue on page 10 3

A Town like Sandalwood

By Hanington Tate
Director of Forests

May be you have heard it on the news, from people around you, seen it on the news or read about it on the paper; yes its real, its official. Sandalwood trees have slowly made their way into Port Vila City, making Port Vila a City of Sandalwood for Vanuatu and soon graduating to become the Sandalwood City of the South Pacific.

This initiative is a brainchild of the people of Vanuatu to continuously remind Vanuatu of the natural resource that almost extinct four centuries ago when the English were thirsty for Chinese Tea and the Chinese were dying to get sandalwood to keep their gods happy. The accounts were well versed in a book called "They Came for Sandalwood" by Shineberg; which puts sandalwood as the first natural product to be exported, smuggled though. The recovery of the species takes several years to recover before its commercial trade in the late 1900s.

Sandalwood is a high valued forest product. A good sized heartwood log could easily fetch up to VT6,000 per kilo on the local market and up to VT15,000 per kilo on the international market. The lucrative price of sandalwood has generated a lot of interest in sandalwood planting. This interest falls short of materializing, the price of sandalwood seeds are too high for growers to afford; an obstacle that needs urgent attention.

Planting of sandalwood in Port Vila City was launched by the Lord Mayor of Port Vila, Hon. Ulrich Sumto on 30th of October 2014. On 29th of November 2014 during the celebration of Port Vila Day, the Lord Mayor again declared Port Vila as Sandalwood City.

Planting of sandalwood in Port Vila has a multiple purposes; some of which are;

- Beautification but at the same time adding value to Port Vila;
- Promote green city initiative using a small and less dangerous evergreen tree species;
- Give Port Vila an attractive brand name,

- especially to sandalwood lovers; and
- Develop Port Vila into a sandalwood seed source for Vanuatu, in alignment with the vision of declaring Vanuatu as Sandalwood Nation by 2025.

Sandalwood is slowly making its presence in all corners in Port Vila. More trees are waiting to take their place along the streets of Port Vila, awaiting completion of urban infrastructure development project.

A lot of people have involved in the project and we would like to thank them all for their contribution. To name a few; the Port Vila Municipality, Ministry of Agriculture, Correctional Services Department, and Management of Au Bon Marche Shopping company for initial funding of the program.

This program is a charitable activity, and anyone who would like to support the program can contact the Department of Forests or the Port Vila Municipal Council.



H.Tate (L), James.S © and Ray.K ® in front of a planted Sandalwood tree at Fatumaru Bay



GEF PAS Forest and Protected Area Management Project (FPAM) Report

By Presly Dovo
Project Coordinator
GEF PAS FPAM Project

Introduction

The FPAM Project implementation in 2015 has been a challenge since the devastation of cyclone Pam which delay the implementation of most of the activities. However with the support and contribution of officers and national consultations has motivated the project to keep the ball rolling to implement some activity to end 2015. Most of the activities could not be address during this period but was considered for this year 2016.

The government of Vanuatu through the Department of Forests is very fortunate to have a project that is adhere to protect the national wealth of the country. Forest conservation is one of the high priority areas of the Department of Forests; having the Forestry and Protected Area Management Project coordinated under the department is a very significant approach as it address and implement the conservation activities thus address the priority activities of the department.

The Department of Forests has the commitment to work cooperatively with landowners and the relevant stakeholders to achieve Sustainable Forest Management and conservation of Vanuatu's forest biodiversity. It is important for the department to ensure the sustainable management of Vanuatu's forests to achieve greater social and economic benefits for current and future generations.

Forest resources are managed in a sustainable manner and provide wood and non-wood forest products as well as the environmental, social and economic services to contribute to the well-being for all people in Vanuatu.

Therefore, the Forestry and Protected Area Management Project is welcomed with a high priority by the department, as the components of the project will surely address the forestry sector needs.

Forestry and Protected Area Management Project is funded by Global Environment Facility (GEF) with the assistance of Pacific Alliance for Sustainability (PAS) GEF-PAS. FPAM project is an important project for Vanuatu because it supports Vanuatu's priorities for biodiversity conservation given in its 1999 National Biodiversity Strategy and Action Plan (NBSAP).

The project "Global Environment Facility – Pacific Alliance for Sustainability – Forest and Protected Area Management" in short - GEF PAS FPAM - has a global environmental objective to strengthen biodiversity conservation and reduce forest land degradation. Global benefits from the project include: increased representation of important ecosystems in the protected area networks; enhanced biodiversity conservation in production landscapes (through mainstreaming and marketing of biodiversity goods and services); increased financial sustainability for protected area management; and reductions in the barriers to sustainable forest and land management.

The overall development objective is to enhance the sustainable livelihoods of local communities living in and around protected areas.

Project components

1. Improve legislation and policy
2. Extent and consolidating the protected area network
3. Strengthening capacity for community-based conservation management
4. Mechanisms for sustainable PA financing
5. Sustainable use of biodiversity

Project objectives

1. Conserve biodiversity of Vanuatu by expanding and consolidating networks of protected areas.
2. Building capacity for conservation management and sustainable use biodiversity.
3. Reducing forest and land degradation.

The activities implemented in 2015 are stated below:-

A. Bay Homo protected area

The project supports the landowners and communities of South Pentecost with the establishment and development of a new protected area with the aim to legally register it as a Community Conservation Area (CCA) and develop it in combination with the land dive activities to a Cultural and Natural UNESCO World Heritage Site.

The Bay Homo CCA project is located in Southern Pentecost on land shared by landowners of the communities Pangji, Palmsi, Wali, Ramputor, Ranwas, Point Cross, Bay Homo, Salap and Wanuru who supported and formally agreed to the establishment of a CCA. In a boundary survey conducted the area within the original proposal was comprised of 3677 ha of land and approximately 600 ha of marine protected area. Local landowners requested that the project assist them with the establishment of the new protected area.

Since then additional lands in the north and east have been proposed to be included in the proposal. Bay Homo Protected Area combines terrestrial and marine conservation in a ridge to reef approach and is an important site for Vanuatu's protected area network

as well as for the achievement of the Aichi targets (2010) agreed to in the Convention of Biodiversity

I. Flora and Vegetation Baseline Survey of Bay Homo South Pentecost

The study conducted a detail biological survey and document the terrestrial flora and vegetation diversity of “Bay Homo CCA”. Tasks included: Description of the range of biological habitats and typical biological communities within the protected area across key environmental gradients including altitude (from coast to 500m), soil types, and topography (ridge to valley).

Rapid sampling of vascular plant diversity (i.e. to species level identification) supported by the compilation of a check list of the flora of Vanuatu from available reports and literature. This process was assisted by the allocation of the Department of Forests (DoF) senior botanists, Sam Chanel and Philemon Ala.

Identification of the presence (or potential presence) of species or ecosystems of national and/or international significance within the proposal areas with reference to the IUCN RED List, reference to previous published reports and the DoF senior botanist’s knowledge.

Identification of areas of high biodiversity and listed threatened flora identified and marked on maps and by GPS co-ordinates for future management consideration. Disturbance levels and areas in need of restoration interventions identified, mapped, and reconciled with satellite imagery.

Recommendations for priority areas for intervention can be made, notwithstanding that not all areas will be visited and inspected in detail within the time allocated.

A feasible monitoring system of the status of biological diversity of the area in terms of long-term sample plots described with sites suitable for the establishment of long term monitoring plots identified.

This to include the ecological rationale and basis for selection provided in scientific form e.g. multiple plot locations reflecting native forest associations and plant assemblage variation along the key environmental gradients identified.

Subject to their identification on site, the location and extent of invasive species, and the nature of the threat, provided for all areas and habitats visited.

Local community members and staff received basic training and were informed about the results of the study. Key management issues were identified and recommendations made for future CCA management.

II. Fauna assessment of Bay Homo-South Pentecost

- A checklist of all fauna found during the survey were recorded.
- Baseline data on the occurrence of all fauna found in the forest recorded
- Training undertaken for guides on fauna identification and monitoring.
- Awareness activities conducted to communities on fauna
- Assessing the potential threads for the fauna of the Bay homo in terms of utilization by humans or other means.
- Assessing the impact of fauna to the Bay homo ecosystem (feral pigs, cats etc.) were carried out



Liana-Used for Land diving



Wild Creeper



Hilltop-Pangi –South Pentecost



Collection of Prawns



Crabs

III. Socio economic survey of Bay Homo, South Pentecost

A socio-economic profile of the land-owning and neighbouring communities living adjacent to the CCA was carried out. Some of the activities implemented are:

- Examine the extent at which communities (landowners) depend on the various natural resources within the future protected areas (terrestrial and marine) and the surrounding vegetations/forests for their daily livelihood.
- Assess the communities' awareness of the need for biodiversity conservation and the protection of the forests and marine life.
- Assess the communities' awareness and understanding of sustainable land and forest management and fisheries.
- Information collected through the socio-economic baseline survey has been collated alongside the biodiversity assessment to provide an interdisciplinary report that can form the basis of a future management strategy for the "Bay Homo" CCA. Interdisciplinary research recognises the complexity and interconnectedness of human and natural systems. Due to the complexity of the issues surrounding the establishment of the CCA it was necessary for the research team to participate in true collaboration from the outset of the project.



Custom dance, Point cross South Pentecost

This collaboration supports the transfer of scientific knowledge into clear management practices for the CCA that represents the needs of the communities while also addressing key environmental concerns.

IV. Bay Homo Protected area documentary

The documentary has been developed by MALCO production and will be launched in November 2016

Documentary features-Protected area

Land diving, Boundary mapping, Community livelihood, Vegetation, Taro patching, Culture and traditional approach of preparing food, Custom dances, Ecotourism, Waterfall, and Farming system etc.



Land Diver, Londote South Pentecost

B. Sign board installation at the Kauri Reserve and Forestry sign board

Activities implemented are:-

1. Description of the Kauri reserve protected area boundary in electronic form with list of waypoints.
 2. Thematic maps showing vegetation, rivers, treks with any prominent features .
 3. Electronic map of the Kauri reserve protected area in the scale of 1:10.000 with appropriate legend produced.
 4. Report on the Damaged caused by Pam on the protected area, ecotourism and infrastructure.
 5. Installation of Forestry department sign board
1. Banner developed for International day of Forests and T shirts were printed for International day of Forests.

C. Topography map of Kauri Reserve protected area

The kauri Reserve on the island of Erromango is an area rich in biodiversity and a Hotspot for a range of endemic flora and fauna. Among the most charismatic is a species of mega flora named *Agathis macrophylla*. This south pacific tree species is highly valued for its ecologic, economic and social significance.

Therefore it has become the cornerstone of this conservation effort for the government of Vanuatu and the local people of Erromango. The reserve is situated in the south western portion of Erromango and has been identified as a critical component of Vanuatu's terrestrial conservation effort through the Forestry and Protected Area Management (FPAM) project undertaken by the Department of Forests (DoF). These surviving *A. Macrophylla* forests are unique in the Pacific region and are located inland of Ponkil Bay within 3,200 hectares of forest land in and around the upper catchment of the Lampounari and Ponkil rivers

The boundary mapping focuses only on the terrestrial protected area boundary. The coordinates collected at each point of the protected area boundaries were decided and chosen by each individual landowner assisted by the two Forestry officers. Most of the boundaries mapped were located at the border between another protected land area belonging to another land owner of which each landowners came to agree in giving their land believing that the project will strengthen the biodiversity conservation and address the land degradation issues and will benefit the communities in the future.

D. Assessment caused by cyclone PAM on Kauri Reserve

Based on the assessment, it showed that 5% of the kauri trees were blown down during cyclone Pam.

Most of the kauri trees blown down were between the DBH of 5-20centimetre and frequently found at the edges of the hill tops, cliffs and creeks. The assessment also shows a huge proportion of timber and non-timber trees were blown down by cyclone PAM inside the protected area boundaries.

The kauri trees of 20 centimetres DBH upwards survived cyclone Pam and are still standing. Most of these kauri trees and other timber trees are starting to grow back their canopy cover.

The kauri guest house which were built with local materials (bamboo walls, roof thatches and toilet) were blown down by cyclone Pam. One month later the two owners' helped to rebuild only one guest house while the toilet and the other two still awaits rebuilding.

The bush road heading up to kauri protected area boundaries and to other boundary marks was very rough and challenging after PAM. Massive debris piled up including fallen big timber and non-timber tree species



Damaged forests



Fallen kauri trees during cyclone PAM

Every individual landowners were notified to clear up small bush roads which were damaged during cyclone Pam that lead up to the Kauri reserve and the other protected area boundaries for their own individual monitoring to their boundary marks.

E. Forest ACT review & Environment policy consultation.

The consultations carried out are:-

1. Forestry training with legal consultant-15 participants
2. Northern consultation-31
3. Southern consultation- 31
4. Environment policy validation-30



Environmental policy National Consultation, Vila



Parade Christmas in the park

F. Project awareness

1. Talk back show with FM107
2. Promoting project t-shirts during parade (Christmas in the park)
3. Display at Lapita celebration (Teouma valley)
4. Presentation @Environment day
5. Presentation done @NBSAP meeting
6. Kauri song played on FM107
7. Kauri reserve documentary played on national television
8. Presentations made to USP students and Agriculture students from Santo
9. Awareness done with community of Analgahaut Aneityum and Itakuwe South Tanna

G. Presentations of Forest Policy & Kauri Reserve documentary

1. Analgahaut community
2. South Tanna-Iatikwe community
3. Analgahaut primary school

I. Partnership with other agencies

1. New York botanical garden-Assist in the distribution of policy and documentary to communities
2. Assist in the Ethno botany of plants of southern province



REDD+ Provincial Technical Committee (PTC) receives new equipment from REDD+ Unit

*By Samson Lulu
Senior Extension Outreach Officer
REDD+ Unit*

The Provincial Technical Committee (PTC) for REDD+ from 5 REDD+ Islands received on the 9th of June 2016, new equipment from the REDD+ Unit.

The equipment were handed over by the Director of Forest, Mr. Hanington Tate, and National REDD+ Coordinator, Mr Ioan Viji to Chairpersons for the PTC who are Forests Officers in Charge for each REDD+ island.

Chairpersons from Santo, Malekula, Efate, Tanna and Erromango received 1 hp Laptop, 1 digital projector, 1 digital camera and 1 HP Office jet printer. These equipment was presented as part of Institutional strengthening of the Vanuatu REDD+ Programme. The programme is currently being supported by the Forest Carbon Partnership Facility (FCPF) of the World Bank.

The handing over was done following a workshop informing the PTC Chair on the 2016 Work Plan in order for them to implement their activities.

Reducing Emissions from Deforestations and forests Degrada-tions (REDD+) is an international mechanism to assists coun-tries to reduce levels of deforestation and forest degradation. It is being developed under the United Nations Framework Con-vention on Climate Change (UNFCCC) that seeks to reduce emissions from deforestations and forest degradation by incen-tivising land use change while protecting and replanting the forests.

In Vanuatu, the Department of Forests is the implementing agency with its REDD+ Unit taking the coordinating role. The programme also support the Civil Society Organization (CSO) to be part of implementing the National REDD+ Programme.



PTC members at Forestry Nakamal

Enhancing management and processing systems for value-adding in plantation-grown whitewood in Vanuatu

*By Rexon Viranamangga,
Project Coordinator of ACIAR Whitewood II Project Santo*

Continued from first quarter issue 1 of 2016

Once the moisture content (MC) of the timbers are down to 20% or less the timber are bundled and immersed in a dip tank half filled with borax. How long the timbers are left immersed in the borax depends on the sizes of the timber. It is based on the theory that borax enters the timber at the rate of 25 cm or 1 inch per week through osmotic pressure. Thus, 100 x 25 and 150 x 25 are immersed for one week, 100 x 50 and 150 x 50 for two weeks and 100 x 100 for four weeks. When the timber are removed from the dip tank they again air dried to 20% mc before can be used by the furniture factories. As mentioned previously, the two categories of investigating potential oppor-tunities for wood products is based on existing and new prod-uct, processing and technology. The project made arrange-ments with Sim Construction and Joiner to manufacture two bedside tables, two coffee tables, book shelf, a stool, sample of door panel and samples flat/corner moulds, skirtings and stop-pers.

Mr Kevin as the overall supervisor for the joinery under Sim construction have indicated that wood working timber from the small diameter trees is much easier from the old whitewood stand from the natural forests and the outcome features display is of no difference to old whitewood stand.

The only problem encountered in this first trial is the blue stain, even though the timber appears to have less blue stain on the surface of the timber it does spread inside the timber and show once the timber is dressed. There are two observations as to why blue stain occurred on the timber: (1) the timber is bun-dled without stakes to separate the timber and allow the timber to absorb the borax and (2) the timber bundle was left for too many days over the dip tank for the chemical to drip back into the dip tank. The blue stain starts to occur in between the tim-ber during the dripping period.

The treatment combination for the graveyard provided by Geoff Smith in table 4 will experiment on Santo and Efate. Tree spe-cies are selected for the experiment, whitewood poles treated with copper azole at TRF (H4), whitewood poles treated with CCA by Santo Veneer (H4), Pine *radiate* from New Zealand (H5) and Namamau poles with no preservative treatment. The poles from the respective species will be buried according to the installation treatment provided in table 4.

Code	Species	Chemical treatment	Installation treatment
WW/CA/E	Whitewood (WW)	Chromated copper arsenate (CCA)	Earth (E)
WW/TE/E	Whitewood	Copper Azole (CA)	Earth
WW/TE/CL	Whitewood	Copper Azole	Coral (CL)
WW/TE/CT	Whitewood	Copper Azole	Concrete (CT)
PR/CA/E	Pine <i>radiata</i> (PR)	Chromated copper arsenate	Earth
NM/E	Namamau (NM)	None	Earth

Associate Activity 2.3: Investigate structural product options for non-appearance grade whitewood.

This associate activity aims to investigate how the lower grade wood in structural applications requires quantification of the mechanical properties of small diameter whitewood trees. However, this associate activity will be implemented in 2016.

3.2. Identify and test what forms of grower organisation are feasible and sustainable, and will improve knowledge transfer among growers, improve grower marketing of products and therefore increase returns to smallholders.

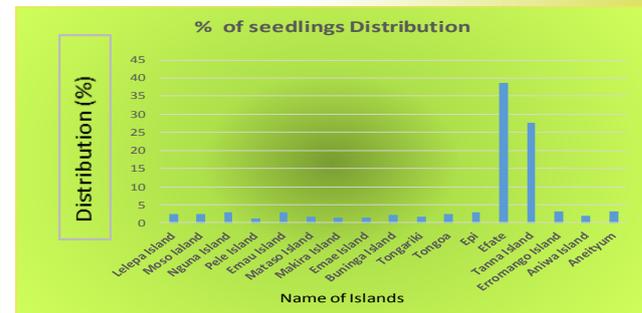
This activity that aims to discussions about formal grower groups to assist in dissemination of knowledge, encourage grower participation in policy formulation and decision making, and provide a framework for centralised cooperative processing and group marketing is well undertaken by Cherise.

This work will build on relationships established with landholders in the first project conducted in collaboration with DoF.

3.3. Utilising available data on growth, stand management, resulting products and markets, investigate financial returns of stand management and market scenarios for various grower situations.

This activity will shed light on the profitability of various silvicultural options being researched. Financial analyses of different silvicultural and market scenarios for agro-forestry and plantation grower situations will include comparison of returns with and without intermediate products (including food crops in agroforestry systems, small roundwood in plantation systems) will be implemented in 2016.

Continued from page 3



4.0. Seedlings Distribution

Seedlings and wildings from Luganville, Santo were transported to Port Vila by boat in the first quarter of 2016. These seedlings and wildings were sorted out in Port Vila then re-distributed to island communities according to Table 2. Seedlings allocated for Tafea province was shipped to Tanna in May, while the seedlings and wildings allocated to the islands of Lelepa, Mosso, Nguna, Pele, Emau and mainland Efate were distributed in May and June. Seedlings destined for Mataso, Emae, Buninga, Tongariki, Tongoa and Epi have



>Loading and transporting of seedlings to the Shepherd islands

5.0. Agencies and personnel involved in seedling distribution

Several agencies were involved in distribution of the seedlings. The Department of Forests has worked with community leaders such as church leaders, chiefs, provincial government through the Area Secretaries and other government agencies to make arrangement with recipients of the seedlings. The Department of Forests staff in Port Vila organized re-distribution of seedlings to SHEFA and TAFEA islands. Due to the large quantity of seedlings, the Department hired a lorry to transport seedlings from the Wharf to the Forestry nursery, then back to the Wharf for shipment to the outer islands. The seedlings destined for Efate Offshore islands, the lorry was hired to transport seedlings to Emua Wharf on North of Efate, then hired boats to deliver seedlings to the islands.

6.0. Training and Information

Training and information is an important component of the activity. Department of Forests staff conducted informal training to farmers, explaining how to plant and maintain or look after seedlings after planting. Some seedlings have been distributed during the El Nino period, therefore the importance of planting seedlings in a shaded area and watering has been emphasized.

6. Training and dissemination of information was delivered by the Forestry staff in Vila and Tanna. For seedlings destined for Shepherd's islands (Mataso, Emae, Buninga, Tongariki, Tongoa and Epi) were already distributed by two Forest Officers from Port Vila. The purpose of their travel was to look after the seedlings on the boat and distribute to the recipient island then conducted short trainings for each recipient community. To ensure this happens, the Department of Forests has paid extra costs for the boat to spend more time than usual at each port.

7.0. Issues affecting the program

A few issues have affected the program resulting in delaying of the program. These issues were;

i. Number of seedlings from Santo

The 10,000 seedlings gathered in Luganville has been reduced to 7,500. 2,500 of the seedlings were used by the Forestry Office in Luganville to distribute and plant to commemorate the International Day of Forests. This has left a gap that the Port Vila Office has to quickly find seedlings to meet the 10,000 required. Because Efate was still recovering from TC Pam, it took quite a while before that gap was being filled.

ii. El Nino Effect

The seedlings were brought to Port Vila during the El Nino period, at a time which small islands that seedlings were planned for were still struggling for water themselves. This has delayed the time of distribution, and seedlings were safely kept in Vila where water is not a problem until break of the El Nino three weeks ago.

iii. Transport

Two Landing Crafts (LC) that services the islands of Mataso, Emae, Buninga, Tongariki, Tongoa and Epi went on repair and only put to service two weeks ago, causing the extensive delay in seedling delivery. Others were available but chartering other LCs will too costly for the Department to meet these costs.

8.0. Closing remarks

The Department of Forests has never undertaken an exercise of this scale in the past due to costs involved in transport and handling of seedlings. Usually, seeds would be germinated then young germinants or wildings would be collected, wrapped in tissue paper then air freight to farmers or a Forestry station. Transport of such a quantity of seedlings is a new experience for the Department and a new lesson learnt.

Finally, this activity would not be possible with finance support from FAO. And on this note, the Department of Forests, on behalf of the people of Vanuatu, and especially recipients of seedlings would like to take this opportunity to thank FAO officials who have assisted in the program, and we hope our explanation for the delay is understood from the FAO side.

PROVINCIAL FORESTRY NEWS



During the National Tree Planting Day, all provinces participated successfully by planting trees on various areas while TAFEA Province reported its tree planting day activities on its first ever newsletter as their main highlights.

The distributions of seedlings took place at the market and more than 300 people received seedlings from the Department of forests. The provincial government of Tafea was very supportive to this initiative and helped by providing transport of seedlings. The Assistant Secretary General, David Tovovur worked in collaboration with Mr Simon Naupa (Forest Officer) to conduct the awareness to the communities who received trees for planting. One of the key messages that were given out to communities at that time was the roles and functions of a tree played in our environment. Trees absorb harmful Carbon Dioxide from the atmosphere and produce oxygen which we all breathe in order to live. With the reality of increasingly unpredictable weather patterns and more frequent and violent storms/floods, increasing tree cover to prevent devastating soil erosion has never been more important. Trees provide so many benefits and in rural or very remote areas, trees improve livelihoods. They act as a source of food or as a cash crop like coffee whilst in shaded trees keep sidewalks and buildings cool and help reduce noise levels. Everywhere in the world, trees are a source of joy and beauty.

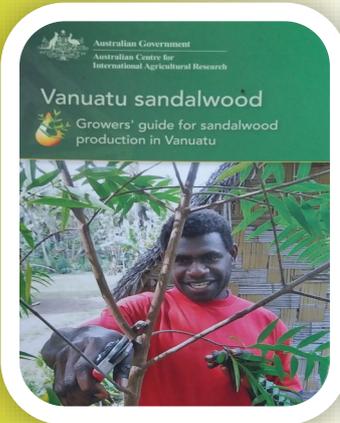
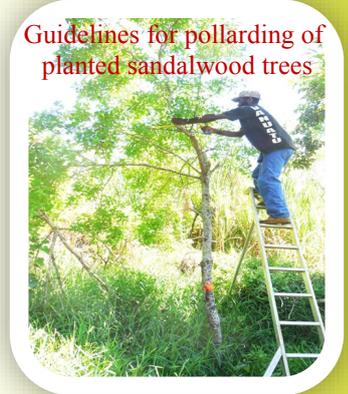
Mr Tuvorvor encouraged each individuals to start preparing seedlings for themselves for 2017.

The President of Tafea Province, Mr Job Teo and its Secretary General, Mr Reynold Sumart also took part by planting a seedling. Mr Teo stressed on the importance of planting a tree which symbolizes our responsibility to take care of and as an investment for our future generation. He concluded by this illustration that *“if you sow a wrong seed, you will harvest the wrong fruits. So, we must work together in fighting climate change and since it is a global issue, it would depend very much on our efforts.”* Tafea Provincial government is appealing to all area councils in TAFEA to raise seedlings towards the Decade of Reforestation program from 2017—2026.



Seedlings distributions, Tanna

Forestry Books and Posters available!



Thanks to World Bank FCPF REDD+ Project for funding the printings of the newsletter.



To : _____

Godfrey Bomee (Final Editor)
Phyllis Berry (Editor & Compiler)

Forestry Newsletter

The Department of Forests produces this newsletter quarterly and we welcome news or articles on any forests related activities. Deadline for submission of articles for the next issue is 15th November, 2016.

All contributions in English, French or Bislama, should be sent to:-

The Editor of Forestry Newsletter
PMB 9064
Port Vila, Vanuatu
Phone: 678 23171 or Email: pkamasteia@vanuatu.gov.vu