With support from

Federal Ministry of Food and Agriculture

by decision of the German Bundestag

PROMOTION OF SUSTAINABLE MANAGEMENT OF PRODUCTION FORESTS OF FOREST COMPANIES IN VIETNAM

REPORT NO. 11

Evaluation of Training Material

November / December 2017

c/o Forest Science Centre of North of Central Vietnam (FSCV)
273 Le Duan Street, Dong Ha City, Quang Tri Province, VIETNAM
TEL: +84 2333 511 559, MAIL: mail@psfm.vn, INTERNET: www.psfm.vn

Issue/Version No.:	Final Draft
Project No.:	W-VNM 17-01
Date:	14.12.2017
Author:	Torsten Möllmann, HessenForst

Contact:

DFS Deutsche Forstservice GmbH
Wittelsbacherstr. 11
D - 85622 Feldkirchen (Germany)

Phone: 0049 89 94 00 59 - 0
Fax: 0049 89 94 00 59 - 79
E-Mail: DFS@dfs-online.de
E-Mail: mail@psfm.vn

URL www.dfs-online.de

Financed by: German Ministry of Food and Agriculture

Table of content

Acknowledgements 1
1 Introduction 1
2 Objectives 1
2.1 Mission Objectives: 1
2.2 Tasks of Expert: 1
3 Material and Methods 2
3.1 Training Material 2
3.2 Excursion sites 3
4 Results 3
4.1 Training Material 4
4.2 Excursion sites 4
5 Conclusions 8
5.1 Training Material 8
5.2 Excursion sites 8
6 Recommendations 9
7 Annexes 10
7.1 Annex 1 Evaluation matrix 10
7.2 Annex 2 Folder structure of the evaluated training materials: 11
7.3 Annex 3 Description of excursion sites based on the PSFM-curriculum 19
7.4 Annex 4 Stand catalogue – Excursion sites 20
7.5 Annex 5 Stand catalogue – Thinning trials 21
7.6 Annex 6 Terms of Reference 22
7.7 Annex 7 Workplan 23

List of figures

List of tables

Table 1 Categories and the corresponding variables used to evaluate the given training documents .. 3
Table 2 Overview about the Vietnamese and directly without adaptation usable documents 4

Acronyms and Abbreviations

AFD	Agence Française de development
DARD	Department of Agriculture and Rural Development
FAO	Food and Agriculture Organizsation of the United Nations
FDEA	Federal Department of Economic Affairs Switzerland
FMU	Forest Management Unit
FSC	Forest Stewardship Council
GIZ	Gesellschaft für internationale Zusammenarbeit
KfW	Kreditanstalt für Wiederaufbau
PSFM	Promotion of Sustainable Management of Production Forests of Forest Companies in Vietnam

MARD	Ministry of Agriculture and Rural Development
SFC	State Forest Company
SFM	Sustainable Forest Management
VAFS	Vietnamese Academy of Forest Science
WWF	World Wide Fund For Nature

ACKNOWLEDGEMENTS

This work was done supported by the technical forestry staff of Truong Son SFC and VAFS Dong Ha. Without their local knowledge field work would have been much more complicated. The cooperation with the PSFM-staff was also excellent.

1 INTRODUCTION

In previous missions by international experts, a curriculum was set up, defining the content of the training courses. The training programme focusses on practicing foresters holding B.Sc. and M.Sc. degrees from the middle and upper management. As a consequence of their education, the participants have a firm theoretical background. The programme therefore targets at the provision of applied knowledge.

Applied teaching needs training material that is adapted to the conditions the trainees work in. A variety of technical guidelines developed in and for Vietnam is available within this project. These guidelines were developed during ten years of forest management consultancy in the area. Therefore, it was assumed that among those documents, suitable teaching material can be found. Yet it was necessary to assess their quality and also to relate them to courses. By this, teachers can work more efficiently as they do not have to screen all documents, only those related to their topic. Finally, this work creates a compilation of best practice training material for forest works and management tasks.

Targeting on applied knowledge transfer, the curriculum proposes excursions to discuss the course content on-site. Being a certified forest management unit (FMU) SFC Truong Son was identified as a suitable host for excursions, especially for courses that take place in the facilities of Long Dai. For courses based in Dong Ha, excursions could also take place in the experimental forest managed by VAFS, if the subject does not require natural forests.

The Vietnamese furniture industries strongly demands sawn timber. Currently most Acacia-producers harvest their stands already at the age of about five years. The sold wood is then chipped and used for paper production. One learning target of the silviculture course aims at the production of high quality sawn wood. As no proper excursion sites are available yet due to the lack of thinned stands, thinning trials should be installed.

2 OBJECTIVES

2.1 Mission Objectives:

The mission is to assess available training material for the subjects defined in the training curriculum. This will be predominantly done based on already existing sources, e.g. material developed by GIZ, KfW or WWF.

Furthermore, forest stands suitable as excursion sites are to be identified, described and suggested to the teachers. The teaching staff will later decide which stands they will include in their courses.

2.2 Tasks of Expert:

(1) All available technical documents and training materials within the SFC must be gathered, evaluated with regards to the training curriculum, quality checked and if needed modified to attain a suitable level.

(2) In fields, where no appropriate material can be found, external sources like FAO guidelines need to be screened.
(3) The training material must then be compiled and processed to be usable in the according courses.
(4) Requirements for excursion sites need to be defined according to the curriculum and propose stands.
(5) Suitable sites for thinning trials targeting longer rotation cycles to produce sawn wood need to be detected.

3 MATERIAL AND METHODS

3.1 Training Material

Starting point of the document analysis was a folder with several levels of sub-folders containing the documents, following a structure given by former projects like the MARD / GIZ project "Promotion of Sustainable Forest Management, Trade and Marketing of Important Forest Products in Vietnam" (2005-2014). Folders were named e.g. "GIZ SFM FS Guidelines edited", "KfW 2&3", etc. Therefore, a new folder structure needed to be set up, following the order of the curriculum. So, for each module a folder was installed with two sub-folders to sort the documents according to their language. In a second step an evaluation matrix was created. It contains the categories by which each document was evaluated (Table 1) and the modules to which the documents could be related.

After the establishment of these templates, the documents were opened in the original folders. Each document was listed and characterized by the elements presented in Table 1. Then it was shifted to the newly created folder of the related module. If a document was related to more than one module it was copied to the other module's folder as well.

Now, each course instructor is able to sort the excel file using the filter in the column's head, so that he can choose the characteristics he needs. He knows then which documents are suitable and where to find the filtered documents.

As this work was done by a non-Vietnamese speaker, not all documents could be evaluated. Those documents were marked in the matrix as NA in content and usability and then moved to the folder "VN-Documents not assessed".

Table 1 Categories and the corresponding variables used to evaluate the given training documents

Category	Variable 1	Variable 2	Variable 3	Variable 4
Document	Name of document			
Content	Brief overview	NA: Not assessed, as document is only in Vietnamese		
Language	EN: English	VN: Vietnamese		
Usability	1: usable	2: needs adaptation	3: not usable	NA: not assessed, as document is only in Vietnamese
Comment	Comment			
suitable for	Teacher: Background information, not suitable for the course	Course: Document can be used for teaching		
Adaptation	What should be adapted?			
Time needed (hours)	Time needed for adaptation			
Ecology	x: suitable for this module, but not necessarily for all related courses			
Inventory and Planning	x: suitable for this module, but not necessarily for all related courses			
Silviculture	x: suitable for this module, but not necessarily for all related courses			
Forest Operations	x: suitable for this module, but not necessarily for all related courses			
Forest Products	x: suitable for this module, but not necessarily for all related courses			
Economics, Politics and Law	x: suitable for this module, but not necessarily for all related courses			
Community Forestry	x: suitable for this module, but not necessarily for all related courses			
Forest Certification	x: suitable for this module, but not necessarily for all related courses			

3.2 Excursion sites

A first step in finding suitable excursion sites was to define the stand characteristics a course requires. This was done following the course content given in the PSFM curriculum. In a second step, maps of Truong Son SFC and the VAFS forest were used to pre-select sites before the forest of VASF as well as the forest of Truong Son SFC were visited. Both visits were guided by a forester from the respective forest management unit.

The stands were selected together with the foresters, who made own suggestions. During the visit notes and photos were taken to describe the forest briefly. These pictures and short descriptions will serve the instructors when selecting the sites. Because time was too limited for a complete stand description in each stand, it needs to be done when a stand is finally selected.

For each potential training site an ID-number was issued to register the excursion sites in the stand catalogue. If an excursion site includes more than one stand, all stands are summed up under one ID. GPS-coordinates and compartment numbers were also registered.

4 RESULTS

4.1 Training Material

The results concerning the evaluation of training material are presented in two ways. An excel spreadsheet contains the evaluation matrix and by this the names and the characteristics of the documents (Annex 1). The folder “Training_Material_by_Modules” contains the documents ordered by modules (Annex 2).

Table 2 Overview about the Vietnamese and directly without adaptation usable documents

Module	No documents	No VN documents	No directly usable documents
Ecology	30	14	28
Inventory and Planning	41	17	41
Silviculture	41	22	41
Forest Operations	43	21	37
Forest Products	2	1	2
Economics, Politics and Law	20	6	18
Community Forestry	9	1	9
Forest Certification	62	23	56
VN-Documents not assessed	39	39	NA

4.2 Excursion sites

The requirements of the excursions can be found in

4.3 Annex 3. Altogether 14 sites were identified, out of which three are in Truong Son and eleven in the experimental forest of VAFS Dong Ha. These stands are listed in the stand catalogue of Description of excursion sites based on the PSFM-curriculum

Annex 4. Propositions could only be made for courses, which rely on forest characteristics. Courses relying on activities as harvesting activities, planting or road maintenance need to choose their excursion sites shortly before the excursions take place to visit the ongoing operation.

4.4 In the experimental forest of VAFS three stands were identified in which thinning trials can be carried out (

Annex 5). The stands are two, three and four years old. In the four and three-year-old stand the thinning trials can start already in 2018, the two-year-old stand was chosen as a reserve stand.

4.5 To standardize stand descriptions three templates were developed. They are presented in Description of excursion sites based on the PSFM-curriculum

Annex 4 and ensure uniformity among different FMUs. For best learning results, descriptions should be up-to-date at the moment an excursion is carried out. Especially planted forests change their characteristics rapidly, which leads to an obsolescence of the description after a short time. Forest planning documents should therefore only be used to copy fixed characteristics like area size, year of planting, etc. It is operational to split the description of the excursion sites. An excursion site can contain several stands. First, it should be described why the place has been chosen, what there is to be seen, and which stands belong to it. This description should also contain GPS-coordinates, especially in the natural forest of Truong Son SFC. Here, naming the compartment and sub-compartment is not sufficient, as sub-compartments can extend over some hundred ha. Second, the stands should be described in a standardized way to give orientation to the participants. There are two different templates to describe the forest stand. One is for a natural forest and the other for a plantation. These templates differ only in a few characteristics. An example is the description of the harvest condition. While the harvest in a plantation is scheduled by the rotation age, a minimum harvestable diameter is needed in natural forests.

In the project "Contributions to close to nature, private forest management and support to the FLEGT-VPA process in Vietnam" of the German Federal Ministry of Food and Agriculture two forests were identified where Acacia is managed in a 10-year rotation. In both forests schematic thinning was carried out. The first forest is in the Trieu Ai Commune, Trieu Phong District. It is now 10 years old, covers an area of 1.6 ha and has 500 trees / ha. The second forest can be found in Phu Huong Commune in the Hai Lang District. It extends over an area of 20 ha. The trees are 7, 8 and 9 years old. Further details can be given by Nguyen Van San of WWF Vietnam (san.nguyenvan@wwfgreatermekong.org / +84 24 3719 3049 or +84 915 809 678)

5 CONCLUSIONS

5.1 Training Material

The analysed documents provide already a stable basis for the development of courses. For all modules documents are available, although not equally distributed. By the way the documents are organized and evaluated it shall be easy for trainers to use them. Although being adapted to the situation in Vietnam, these documents are not sufficient to provide the whole content fixed in the PSFM curriculum. Further literature like FAO Forestry Publications or textbooks written for forest schools or forest enterprises need to be included in the course preparations.

5.2 Excursion sites

What a course requires from a demonstration site could generally be derived from the description in the curriculum. But as each teacher works out his course, he must decide about the suitability of the proposed sites himself. If he concludes not to use the proposed sites, he needs to search on his own. Thereby he should take the following into consideration: To make excursions feasible it is essential that the site is accessible all year long. Furthermore, the bus ride to the site should as well as the walk from the bus to the stand should be as short as possible for a reasonable relation of travel time to time on site. If a stand is suitable for more than one excursion, it can be efficient to have several excursions on the same plot. Then, a stand can be discussed under different topics. Yet, too much repetition should be avoided.

6 RECOMMENDATIONS

Mr. Nguyen Van San should be contacted to visit the thinned forests with an extended rotation cycle. These stands might serve as demonstration sites until the thinning trials in the VAFS-forest show first results.

As it is obvious that planted forests of Acacia are heavily affected by the storm events of late summer 2017. It is worth to analyse whether thinning and rotation age extending lead to less storm damage and if other (local) tree species are less vulnerable.

A benchmark of applied forest knowledge in Germany is the German book “Der Forstwirt” (ISBN-13: 978-3800184484), written for the education of skilled forest workers. It contains the complete range of knowledge of a forestry education, tailored to the needs of the target group: Despite its origin it is widely used by forestry students and practicing foresters of the middle and upper management. It is worth to consider the use of this book in the competence centre. Aside from the contents focussing on the conditions in temperate zones like site description, a translation could be used as textbook for all courses. Eventually some chapters would need an adaptation to meet the Vietnamese context.

7 ANNEXES

7.1 Annex 1 Evaluation matrix

7.2 Annex 2 Folder structure of the evaluated training materials:

Training_material_by_modules

- 1 Ecology
  - EN-Ecology
    - 01Oct2013_FoFi-GVT-MAN_EN.pdf [Forest Finance]
    - 01Oct2013_FoFi-GVT-WOR_EN.pdf [Forest Finance]
    - 1. Assessment on Birds, Mammals and Reptiles Dakto SFE.pdf [GIZ]
    - 2. Assessment on Birds, Mammals and Reptiles Ninh Son SFE.pdf [GIZ]
    - 26. HCVF assessment and management prescription.pdf [GIZ]
    - 3. Assessment on Birds, Mammals and Reptiles Truong Son SFE.pdf [GIZ]
    - 4. Assessment, birds, mammals, reptile Van Chan SFE.pdf [GIZ]
    - 5. Forest Flora in Ninh Son SFE.pdf [GIZ]
    - 6. Modul_Chemicals_biological_control_agents_corr.docx [unknown]
    - 6. Ninh Son SFE.pdf [GIZ]
    - 7. M'Drak SFE.pdf [GIZ]
    - 8. Modul_Environment_corr.doc [unknown]
    - 8. Van Chan SFE.pdf [GIZ]
    - 9. Modul_Exotic_species_corr.doc [unknown]
    - Biodiversity Survey Methods.doc [unknown]
  - VN-Ecology
    - 01Oct2013_FoFi-GVT-MAN_VN.pdf [Forest Finance]
    - 01Oct2013_FoFi-GVT-WOR_VN.pdf [Forest Finance]
    - 1. Danh gia tai nguyen chim thu bo sat Dakto.pdf [GIZ]
    - 2. Danh gia tai nguyen chim thu bo sat Ninh Son.pdf [GIZ]
    - 3. Danh gia tai nguyen chim thu bo sat Truong Son.pdf [GIZ]
    - 4. Danh gia tai nguyen chim thu bo sat Van Chan.pdf [GIZ]
    - 5. Dac diem thuc vat rung Ninh Son.pdf [GIZ]
    - 6. Tinh da dang thuc vat Ninh Son.pdf [GIZ]
    - 7. Tinh da dang thuc vat M'Drak.pdf [GIZ]
    - 8. Tinh da dang thuc vat Van Chan.pdf [GIZ]
    - C1_Forest prevention and fighting_chay rung 1.pdf [KfW]
    - C2_Pine diseases prevention and treatment_Rom la Thong.pdf [KfW]
    - C3_Pine pest control_Sau rom Thong.pdf [KfW]
    - HCVFToolkitVietnam.2008-published version-VN[1].pdf [WWF]
- 2 Inventory and Planning
  - EN-Inventory and Planning
    - Forest Function Mapping
      - 0000000263-FFM guideline pdf.EN.pdf [Dak To State Forest Enterprise]
      - 9. Forest Function Mapping and Zonning Dak To.pdf [GIZ]
      - FFM guideline pdf.EN.doc [GIZ]
      - FFM guideline pdf.EN.pdf [GIZ]
    - Forest Inventory Guidelines
      - 2. Forest inventory guidelines for SM natural forests.pdf [GIZ]
      - FMI Design Vietnam EN.pdf [GIZ]
      - Guidelines for FMI.pdf.EN.doc [GIZ]

        - Guidelines for FMI.pdf.EN.pdf [GIZ]
        - Inventory Manual Vietnam.pdf [GIZ]
    - 01Oct2013_FoFi-GVT-WOR_EN.pdf [Forest Finance]
    - 10. Forest Inventory Result Dak To SFE.pdf [GIZ]
    - 11. Forest Inventory Result Ninh Son SFE.pdf [GIZ]
    - 13. Modul_Monitoring_corr.docx [unknown]
    - 14. Forest Inventory Result M'Drak SFE.pdf [GIZ]
    - 2. Kon Tum - Forest management plan Dakto company.pdf [GIZ]
    - 21. Forest and land use status map Van Chan SFE.pdf [GIZ]
    - 27. Ecological monitoring of reduced impact logging M'Drak.pdf [GIZ]
    - 3. Guideline on forest function mapping and zoning.pdf [GIZ]
    - 4. Quang Binh - SFM plan Truong Son SFE.pdf [GIZ]
    - 7. Guideline on outline of SFM.pdf [GIZ]
    - 8. Guideline on sustainable FM planning.pdf [GIZ]
    - 9. Annexes of SFM planning.pdf [GIZ]
    - Bieu mau_FMP_final (EN-Hong).doc [unknown]
    - Guidelines plantation design - final MARD approved.doc [MARD]
  - VN-Inventory and Planning
    - Forest Inventory Guidelines
        - 2. Bien phap ky thuat dieu tra quan ly rung tu nhien.pdf [GIZ]
        - Guidelines for FMI.pdf.VN.pdf [GIZ]
    - 01Oct2013_FoFi-GVT-WOR_VN.pdf [Forest Finance]
    - 10. Ket qua dieu tra rung Dakto.pdf [GIZ]
    - 11. Ket qua dieu tra rung Ninh Son.pdf [GIZ]
    - 12. Ket qua dieu tra rung Truong Son.pdf [GIZ]
    - 13. Ket qua dieu tra rung Van Chan.pdf [GIZ]
    - 2. Kon Tum - Phuong an QLRBV cong ty LN Dakto.pdf [GIZ]
    - 21. Xay dung ban do hien trang rung Van Chan.pdf [GIZ]
    - 27. Giam sat khai thac rung tac dong thap M'Drak.pdf [GIZ]
    - 3. HD phan vung, lap ban do chuc nang rung QLRTN lam truong.pdf [GIZ]
    - 4. Quang Binh - Phuong an QLRBV lam truong Truong Son.pdf [GIZ]
    - 7. Huong dan de cuong chi tiet phuong an QLRBV.pdf [GIZ]
    - 8. Huong dan xay dung phuong QLRBV.pdf [GIZ]
    - 9. Phu bieu huong dan xay dung phuong an QLRBV.pdf [GIZ]
    - 9. Xay dung ban do chuc nang rung Dakto.pdf [Dak To State Forest Enterprise]
    - A2_Guidelines for development of CF management plan_Huong dan lap KH qua.pdf [KfW]
    - FFM guideline.pdf.VN.doc [GIZ]
    - FFM guideline.pdf.VN.pdf [GIZ]
    - Guidelines for FMI.pdf.VN.doc [GIZ]
    - Guidelines for FMI.pdf.VN.pdf [GIZ]
- 3 Silviculture
  - EN-Silviculture
    - 01Oct2013_FoFi-GVT-MAN_EN.pdf [Forest Finance]
    - 01Oct2013_FoFi-GVT-WOR_EN.pdf [Forst Finance]
    - 8. Modul_Environment_corr.doc [unknown]

        - 9. Modul_Exotic_species_corr.doc [unknown]
        - Acacia auriculiformis - final MARD approved.doc [KfW]
        - Aquilaria crassna - final MARD approved.doc [KfW]
        - Calamus_tetradactylus (Rattan) - final MARD approved.doc [KfW]
        - Dipterocarpus alatus - final MARD approved.doc [KfW]
        - Erythrophloeum - final MARD approved.doc [KfW]
        - Guideline Natural Regeneration_final MARD approved.doc [KfW]
        - Guideline on fertilisation - final MARD approved.Doc [KfW]
        - Guideline Re-check afforestation and nat.reg. - final MARD approved.Doc [KfW]
        - Guideline Site mapping - final MARD approved.doc [KfW]
        - Guidelines for nursery management.doc [KfW]
        - Guidelines plantation design - final MARD approved.doc [KfW]
        - Hopea odorata - final MARD approved .doc [KfW]
        - Litsea glutinosa - final MARD approved.doc [KfW]
        - Melia azedarach - final MARD approved.doc [KfW]
        - Pinus merkusii - final MARD approved.doc [KfW]
    - VN-Silviculture
        - 01Oct2013_FoFi-GVT-MAN_VN.pdf [Forest Finance]
        - 01Oct2013_FoFi-GVT-WOR_VN.pdf [Forest Finance]
        - Afforestation.pdf [KfW]
        - B0_General introduction_TongQuanHuongDan.pdf [KfW]
        - B1_ToT_selection phase_GDChonLoc.pdf [KfW]
        - B2_ToT_Quality growing phase_GDPhatTrienVeChat.pdf [KfW]
        - B3_ToT_Sustanable growing phase_GDRungBenVung_ToT.pdf [KfW]
        - B7_Thinning techniques_KNTS.pdf [KfW]
        - D1_Setting up small scale nursery garden_Lap ke hoach vuon uom.pdf [KfW]
        - D2_Seedling quality_Chat luong cay con.pdf [KfW]
        - D3_Nursing - preserving and transplnting techniques_Bao quan hat giong- KT gieo uom.pdf [KfW]
        - D4_seedling maintenance and transport_Cham soc va van chuyen cay con.pdf [KfW]
        - D5_Handout_Tai lieu phat tay.pdf [KfW]
        - E1_Guideline for 2 broadleaf indigenous species_ky thuat Cay ban dia.pdf [KfW]
        - E2_Guideline for under canopy indeginous broadleaf plants_Ky thuat Trong cay duoi tan.pdf [KfW]
        - F1_Sivilculture techniques for Castanopsis boisii.pdf [KfW]
        - F2_Silviculture techniques for Acacia mono-plantation_keo thuan.pdf [KfW]
        - F3_Guideline for appraisal of demarcation for thinning_ nghiem thu.pdf [KfW]
        - F4_Thinning techniques for Pinus massoniana_Thong ma vi thuan.pdf [KfW]
        - F5_Thinning technicques for mixed plantation of pine and acacia_Thong xen Keo.pdf [KfW]
        - Poster.pdf [KfW]
        - Thong ma vi thuan.pdf [KfW]
- 4 Forest Operations

- EN-Forest Operations
  - Harvesting Design
    - 4. Technical gudeline on harvesting planning.pdf [GIZ]
    - Harvesting Design - EN.doc [GIZ]
    - Harvesting Design - EN.pdf [GIZ]
  - 01Oct2013_FoFi-GVT-MAN_EN.pdf [Forest Finance]
  - 01Oct2013_FoFi-GVT-WOR_EN.pdf [Forest Finance]
  - 10. Guideline on social impact management.pdf [GIZ]
  - 10. Modul_Harvesting_corr.doc [unknown]
  - 14. Modul_safety_health_corr.docx [unknown]
  - 17. Modul_Training_corr.docx [unknown]
  - 2011-03-31 RIL-Training.docx [HessenForst / unique]
  - 2011-03-31 RIL-Training.pdf [HessenForst / unique]
  - 27. Ecological monitoring of reduced impact logging M'Drak.pdf [GIZ]
  - 28. Post harvesting assessement - report.pdf [GIZ]
  - 29. Report on environmental impact assessment in Dakto.pdf [GIZ]
  - 30. RIL training and implementation M' Drak Jan 2010 report.pdf [GIZ]
  - 31. RIL training and implementation M'Drak Apr 2010 report.pdf [GIZ]
  - 32. RIL training and Implementation M'Drak Dec 2010 report.pdf [GIZ]
  - 5. Reduced impact logging, experience from Dakto.pdf [GIZ]
  - 6. Safety felling technique.pdf [GIZ]
  - 7. Modul_Employees_corr.docx [unknown]
  - 8. Modul_Environment_corr.doc [unknown]
  - chapter tree felling-Safety felling technique-by LL.doc [HessenForst / unique]
  - GTZ Vietnam RIL OPERATION GUIDE 02-2010-EN.doc [GIZ]
  - RIL application-experiences from Dak To-by Lutz (3).doc [GIZ]
- VN-Forest Operations
  - RIL.VFU
    - DSC00422.JPG [FAO]
    - RIL 2.doc [FAO]
    - RIL1.doc [FAO]
  - SFM handbook
    - SFM handbook-Hyperlink-VN-ver 03.docx [GIZ]
    - SFM handbook-Hyperlink-VN-ver 03.pdf [GIZ]
    - SFM handbook-VN-ver 03.docx [GIZ]
    - SFM handbook-VN-ver 03.pdf [GIZ]
  - 01Oct2013_FoFi-GVT-MAN_VN.pdf [Forest Finance]
  - 01Oct2013_FoFi-GVT-WOR_VN.pdf [Forest Finance]
  - 10. Huong dan danh gia TD XH trong QLRBV.pdf [GIZ]
  - 2011-03-31 RIL-Training-VN.doc [HessenForst / unique]
  - 2011-03-31 RIL-Training-VN.pdf [HessenForst / unique]
  - 27. Giam sat khai thac rung tac dong thap M'Drak.pdf [GIZ]
  - 28. Bao cao danh gia rung sau khai thac tac dong thap.pdf [GIZ]
  - 4. Huong dan thiet ke khai thac rung tac dong thap.pdf [GIZ]
  - 5. Ung dung khai thac tac dong thap kinh nghiem Dakto.pdf [GIZ]
  - A1_ Silvicultural techniques_ huong dan ky thua lam sinh.pdf [KfW]

        - chapter tree felling-Safety felling technique-by LL_VN.doc [HessenForst / unique]
        - chapter tree felling-Safety felling technique.pdf.VN.pdf [HessenForst / unique]
        - D2_Guideline for chain-saw operation_su dung cua xang.pdf [KfW]
        - FCPF_Sach-Huong-dan-ky-thuat-khai-thac.pdf [GIZ]
        - GTZ Vietnam RIL OPERATION GUIDE 2010-VN.doc [GIZ]
        - Harvesting Design - VN.doc [GIZ]
        - Harvesting Design - VN.pdf [GIZ]
        - RIL application-experiences from Dak To.pdf.VN.pdf [GIZ]
- 5 Forest Products
    - EN-Forest Products
        - EN VN Tieu chuan phan loai go - Wood classification standards.pdf [unknown]
    - VN-Forest Products
        - EN VN Tieu chuan phan loai go - Wood classification standards.pdf [unknown]
- 6 Economics, Politics and Law
    - EN-Economics, Politics and Law
        - 01Oct2013_FoFi-GVT-MAN_EN.pdf [Forest Finance]
        - 11. Modul_Laws_corr.docx [unknown]
        - 12. Modul_Management_corr.doc [unknown]
        - 13. Modul_Monitoring_corr.docx [unknown]
        - 15. Forest resource assessmet - 5 SFEs_Forest.pdf [GIZ]
        - 16. Forest resource assessment M'Drak.pdf [GIZ]
        - 17. Forest Resources Assessment Dak To SFE.pdf [GIZ]
        - 18. Forest resources assessment Ninh Son SFE.pdf [GIZ]
        - 19. Forest resources assessment Truong Son.pdf [GIZ]
        - 20. Forest Resources Assessment Van Chan SFE.pdf [GIZ]
        - Guidelines design ME system-EN.docx [unique]
        - Guidelines design ME system-EN.pdf [unique]
        - Guideline_Management_DAs_E_finaldraft.doc [MARD]
        - Model 6 SFM_DS (3).docx [unknown]
        - Report14_AFD_Leroy_SustainableManagement_TropicalForests.pdf [AFD]
    - VN-Economics, Politics and Law
        - 01Oct2013_FoFi-GVT-MAN_VN.pdf [Forest Finance]
        - 16. danh gia tru luong tai nguyen rung M'Drak.pdf [GIZ]
        - 18. Danh gia tru luong tai nguyen rung Ninh Son.pdf [GIZ]
        - 19. Danh gia tru luong tai nguyen rung Truong Son.pdf [GIZ]
        - 20. Danh gia tru luong tai nguyen rung Van Chan.pdf [GIZ]
        - Guidelines design ME system-VN.docx [unique]
        - Guidelines design ME system-VN.pdf [unique]
- 7 Community Forestry
    - EN-Community Forestry
        - 0003503-environment-participatory-elaboration-of-management-goals-for-natural-forests.pdf [SFDP]
        - 090716-CBFM_Guideline_Quang_Binh_E-final.pdf [DARD Quang Binh]

        - 10. Guideline on social impact management.pdf [GIZ]
        - 16. Modul_Stakeholder_corr.doc [unknown]
        - 18. Module_Communities_indegious_groups_corr.docx [unknown]
        - Guideline VLUP - final.doc [KfW]
        - Guidelines plantation design - final MARD approved.doc [MARD]
        - Guideline_Management_DAs_E_finaldraft.doc [MARD]
    - VN-Community Forestry
        - 10. Huong dan danh gia TD XH trong QLRBV.pdf [GIZ]
- 8 Forest Certification
    - EN-Forest Certification
        - 01Oct2013_FoFi-GVT-MAN_EN.pdf [Forest Finance]
        - 01Oct2013_FoFi-GVT-WOR_EN.pdf [Forest Finance]
        - 10. Guideline on social impact management.pdf [GIZ]
        - 10. Modul_Harvesting_corr.doc [unknown]
        - 11. Modul_Laws_corr.docx [unknown]
        - 12. Modul_Management_corr.doc [unknown]
        - 13. Modul_Monitoring_corr.docx [unknown]
        - 14. Modul_safety_health_corr.docx [unknown]
        - 15. Modul_Special_requirements_corr.doc [unknown]
        - 16. Modul_Stakeholder_corr.doc [unknown]
        - 17. Modul_Training_corr.docx [unknown]
        - 18. Module_Communities_indegious_groups_corr.docx [unknown]
        - 19. Forest management - Interim standard for Forest Stewardship in VN ver 1.0.pdf [GFA]
        - 2. Steps for achieving control wood certificate.xls [unknown]
        - 26. HCVF assessment and management prescription.pdf [GIZ]
        - 27. Ecological monitoring of reduced impact logging M'Drak.pdf [GIZ]
        - 28. Post harvesting assessement - report.pdf [GIZ]
        - 29. Report on environmental impact assessment in Dakto.pdf [GIZ]
        - 3. Principles and Indicators of controlled wood.xlsx [unknown]
        - 35. SIA Dakto SFE.pdf [GIZ]
        - 37. SIA Ninh Son SFE.pdf [GIZ]
        - 39. SIA Van Chan SFE.pdf [GIZ]
        - 4. FSC controlled wood standard for forest management enterprises.pdf [FSC]
        - 6. Modul_Chemicals_biological_control_agents_corr.docx [unknown]
        - 7. Modul_Employees_corr.docx [unknwon]
        - 8. Modul_Environment_corr.doc [unknown]
        - 9. Modul_Exotic_species_corr.doc [unknown]
        - Certification Process for Thuy Anh.docx [GFA]
        - En_CoC management system in Dak To 19 05 2012.doc [unknown]
        - En_CoC management system in Dak To 19 05 2012.pdf [unknown]
        - EN_Mau bieu giam sat khai thac 20 05 2012.xls [unknown]
        - Guidelines for EIA-SIA.en.doc [GIZ]
        - Guidelines for EIA-SIA.en.pdf [GIZ]
        - Guidelines for SIA-EN.doc [GIZ]
        - Guidelines for SIA-EN.pdf [GIZ]

        - HCVFToolkitVietnam.2008-published version-EN[1].pdf [WWF]
        - PEFC_VN_Circular 38.2014_unoffical Tranlsation_V1.0_141217.docx [MARD]
        - PSP_QUES_FM_14_e.docx [GFA]
        - Report14_AFD_Leroy_SustainableManagement_TropicalForests.pdf [AFD]
        - TT_38 ve SFM plan 3.11.2014-EN.pdf [MARD]
    - VN-Forest Certification
        - SFM handbook
            - SFM handbook-Hyperlink-VN-ver 03.docx [GIZ]
            - SFM handbook-Hyperlink-VN-ver 03.pdf [GIZ]
            - SFM handbook-VN-ver 03.docx [GIZ]
            - SFM handbook-VN-ver 03.pdf [GIZ]
        - 01Oct2013_FoFi-GVT-MAN_VN.pdf [Forest Finance]
        - 01Oct2013_FoFi-GVT-WOR_VN.pdf [Forest Finance]
        - 10. Huong dan danh gia TD XH trong QLRBV.pdf [GIZ]
        - 19. Forest management - Tieu chuan tam thoi for HD quan tri rung tai VN ver 1.0.pdf [GFA]
        - 27. Giam sat khai thac rung tac dong thap M'Drak.pdf [GIZ]
        - 28. Bao cao danh gia rung sau khai thac tac dong thap.pdf [GIZ]
        - 3. B? nguyˆn t?c v… ch? s? c?a ch?ng ch? g? c¢ ki?m so t.xls [unknown]
        - 35. Bao cao danh gia tac dong xa hoi Dakto.pdf [GIZ]
        - 36. Bao cao tac dong xa hoi M'Drak.pdf [GIZ]
        - 37. Bao cao tac dong xa hoi Ninh Son.pdf [GIZ]
        - 39. Bao cao tac dong xa hoi Van Chan.pdf [GIZ]
        - 4. Tieu chuan go co kiem soat FSC danh cho cac cong ty lam nghiep.pdf [FSC]
        - Certification Process for Thuy Anh.docx [GFA]
        - FSC Group Management Handbook - Updated Sep'14 - Main part - V1.docx [FDEA Switzerland]
        - Group FSC Organisational Structure Table_v2.1 vn.doc [unknown]
        - Guidelines for EIA_VN.doc [GIZ]
        - Guidelines for EIA_VN.pdf [GIZ]
        - Guidelines for SIA.doc [GIZ]
        - Guidelines for SIA.pdf [GIZ]
        - HCVFToolkitVietnam.2008-published version-VN[1].pdf [WWF]
        - PSP_QUES_FM_14_v.doc [GFA]
        - ToR Group Manager_v1.0 vn.doc [unknown]
        - TT_38 ve SFM plan 3.11.2014.pdf [MARD]
        - Vn_CoC management system in Dak To 19 05 2012.doc [unknown]
        - Vn_CoC management system in Dak To 19 05 2012.pdf [unknown]
        - VN_Mau bieu giam sat khai thac 20 05 2012.xls [unknown]
- VN-Documents not assessed
    - 1. Daklak - Phuong an QLRBV cong ty lam nghiep M'drak.pdf [GIZ]
    - 1. Danh sach tai lieu can chuan bi cho danh gia go co kiem soat.xls [unknown]
    - 1. HD danh gia tac dong moi truong trong QLRBV.pdf [GIZ]
    - 22. Xac dinh va quan ly rung co gia tri bao ton cao Truong Son 2012.pdf [GIZ]
    - 23. Rung co gia tri bao ton cao Truong Son 2013.pdf [GIZ]
    - 24. Xac dinh va quan ly rung co gia tri bao ton cao Dakto 2011.pdf [GIZ]
    - 25. Xac dinh va quan ly rung co gia tri bao ton cao Dakto 2013.pdf [GIZ]

- 3. Ninh Thuan Phuong an QLRBV cong ty Ninh Son.pdf [GIZ]
- 34. Huong dan khai tac tac dong thap.pdf [GIZ]
- 34. RIL operation guide.pdf [GIZ]
- 35. Huong dan thiet ke khai thac rung tac dong thap-1.pdf [GIZ]
- 4. Chuyen de xay dung, thong qua chinh sach.doc [unknown]
- 5. Danh gia tac dong cua chinh sach.doc [unknown]
- 5. Danh muc QLCL FSC-FM-COC Truong Son va Dakto.xls [unknown]
- A3_Guideline for CFP fund_Huong dan lap Qui BVR cong dong.pdf [KfW]
- A4_Guidelines for development of CF regulation_Huong dan xay dung qui uoc BVR cong dong.pdf [KfW]
- Bieu mau_FMP_final.doc [unknown]
- D1_Guideline for Setting up interest groups for forest products from pruning.pdf [KfW]
- D3_Guideline_proceedure for thinning and selling products_Thu tuc khai thac.pdf [KfW]
- Decuong khaosat Vuon o Le Thuy (QB).doc [unknown]
- Dong Chau Report_Final-VN (29-12-2015).docx [unknown]
- Giai Doan 2.pdf [KfW]
- Giai doan 3.pdf [KfW]
- Giai doan 4.pdf [KfW]
- GIAM SATDANH GIA-format by LL.xls [unknown]
- nhan dang dv hoang da.pdf [MARD]
- Phuong ph p nc th?c v?t.doc [unknown]
- Phuong ph p di?u tra gi m s t da d?ng sinh h?c.docx
- Reduced impact logging-VN (DT9).doc [MARD]
- Reduced impact logging-VN (DT9).pdf [MARD]
- Silvilculture QPN-14-92.docx [MARD]
- Silvilculture QPN-14-92.pdf [MARD]
- Thong tu 87-2009-official-B_ NâNG NGHI_P.pdf [MARD]
- Thong tu_21_2016_TTBNN-Khai thac rung thay the TT 35.pdf [MARD]
- TT 25-2009-TK-KK Final-MARD-2009.pdf [MARD]
- TT_38 ve SFM plan 3.11.2014.pdf [MARD]
- VN_Mau bieu giam sat khai thac 20 05 2012.xls [unknown]
- De cuong _FMP_chi tiet_Tuan.doci [unknown]

7.3 Annex 3 Description of excursion sites based on the PSFM-curriculum

7.4 Annex 4 Stand catalogue – Excursion sites

7.5 Annex 5 Stand catalogue – Thinning trials

7.6 Annex 6 Terms of Reference

7.7 Annex 7 Workplan

List of Project Reports

Implemented by:

Contact:

DFS Deutsche Forstservice GmbH

Email: dfs@dfs-online.de
URL: www.dfs-online.de