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PROMOTING NATURAL MATERIAL KNOW-HOW IN SOUTHERN FINLAND AND ESTONIA

- Evaluating project ProNatMat



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PROMOTING NATURAL MATERIAL KNOW-HOW IN SOUTHERN FINLAND AND ESTONIA - EVALUATING PROJECT PRONATMAT

We are surrounded by natural materials but we cannot overuse them even if they are renewable resources. We need to think sustainably and consider life-cycle way of thinking. The project ProNatMat combines sustainable development and natural materials. The project contributes to all aspects of sustainable development; economic, social, cultural and ecological. Almost all public policies, public activities and public institutions are currently evaluated to study the success of operational achievements. An evaluation defines a value or credit of something.

This thesis is an evaluation of the project ProNatMat that is coordinated by Turku University of Applied Sciences. It is set out to evaluate the fulfillment and achievements of the project objectives and also the funding programs objective fulfillment. Project ProNatMat is a three-year project (2009-2013) of promoting natural material know-how in Southern Finland and Estonia. The project objectives are implemented by research, providing natural material know-how for different groups, creating networks and preserving cultural heritage. The project receives 78 % of its funding from Central Baltic INTERREG IV A Programme 2007 - 2013 that funds cross-border co-operation projects in the central Baltic Sea area.

This evaluation is an objective-based evaluation and it was executed by following the basic evaluation process form. The research data was collected from different sources, mainly from project reports, documents, indicators and a course questionnaire. To obtain more perspective to the study project partners were interviewed for the evaluation process. The evaluation criteria were chosen to be implementation, effectiveness and sustainability, and based on the criteria it the success of the objectives was evaluated.

In general, it can be said that project ProNatMat met its objectives successfully except for small changes in details. The planned results were achieved and they are at a sustainable basis. The project results contributed to the funding program objectives in a wide range and placed criteria and indicators were fulfilled.

KEYWORDS:

evaluation, project evaluation, natural materials,

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LUONNONMATERIAALIOSAAMISEN EDISTÄMINEN ETELÄ-SUOMESSA JA VIROSSA - PRONATMAT-PROJEKTIN EVALUAATIO

Luonnonmateriaalit ympäröivät meitä, mutta niitä ei voi käyttää enempää kuin niiden määrä on, vaikka ne ovat uusiutuvia luonnonvaroja. Tarvitaan kestäviä toimintamalleja ja elinkaariajattelun huomioon ottamista. ProNatMat-projektissa yhdistyy kestävä kehitys ja luonnonmateriaalit. Se edistää kaikkia kestävän kehityksen osa-alueita; taloudellista, sosiaalista, kulttuurista ja ekologista. Melkein kaikki julkiset ohjelmat, toiminnat ja instituutiot evaluoidaan nykyisin, jotta saadaan selville miten tavoitteiden saavuttaminen on onnistunut. Evaluaatio määrittää tietyn asian arvoa tai ansiota.

Tämä opinnäytetyö on evaluaatio ProNatMat-projektista, joka on Turun ammattikorkeakoulun koordinoima projekti. Opinnäytetyö evaluoi projektin tavoitteiden saavutuksia ja toteutusta sekä rahoitusohjelman tavoitteiden toteutumista. ProNatMat-projekti on kolmevuotinen hanke (2007 – 2013), joka edistää luonnonmateriaaliosaamista Etelä-Suomessa ja Virossa. Projektin tavoitteita on toteutettu tekemällä tutkimuksia, levittämällä luonnonmateriaaliosaamista eri ryhmiin, luomalla verkostoja ja säilyttämällä kulttuuriperintöä. Projekti saa 78 % rahoituksestaan Central Baltic INTERREG IV A Programme 2007 – 2013 –ohjelmalta, joka rahoittaa rajan ylittäviä projekteja Itämeren alueella.

Tämä evaluaatio on tavoitepohjainen arviointi ja se on toteutettu seuraamalla perusevaluaation prosessimuotoa. Tutkimusmateriaali on koottu eri lähteistä, pääasiassa projektin raporteista, dokumenteista, indikaattoreista ja kurssikyselystä. Saadakseen lisää perspektiiviä tutkimukseen, projektipartnereita on haastateltu evaluaatioprosessia varten. Evaluaatiokriteereiksi on valittu tarkoituksenmukaisuus, kokonaisvaikuttavuus ja pysyvyys. Näiden kriteerien pohjalta evaluoitiin tavoitteiden onnistuminen.

Keskeisenä johtopäätöksenä voidaan sanoa, että ProNatMat-projekti toteutti tavoitteensa suunnitelmien mukaan, lukuun ottamatta pieniä muutoksia yksityiskohdissa. Suunnitellut tulokset saavutettiin ja tutkimuksen kriteerien mukaan tarkastellen ne ovat pysyvällä pohjalla. Projektin tulokset vahvistivat rahoitusohjelman tavoitteita monipuolisesti ja asetetut kriteerit ja indikaattorit täytettiin.

ASIASANAT:

evaluaatio, arviointi, projektin arviointi, luonnonmateriaalit

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INTRODUCTION

The definition of natural materials can be very philosophical question because everything is made from materials from the nature. Even the materials that we think as artificial, like plastic, is made from oil which is organic material originally. But if everything is made from natural materials why we need to promote natural materials?

We are surrounded by natural materials but although the natural materials are renewable source it can't be exploited more than the volume is. And this is a question about sustainability and life-cycle thinking. High processed products are often disposable and after the use the product is thrown away. Products that are processed as little as possible are recyclable and more healthy to us and for environment.

Use of local natural materials also supports all the aspects of sustainable development. It has effect on economy by creating work at local level when it is preferred locally produced products. Natural material using techniques is often our cultural heritage and it supports our cultural identity. If the use of local natural materials is done sustainable it supports our environments well-being. Wide social networks are formed around natural materials for example permaculture and handicrafts enthusiasts and ecological builders and this has an impact for social aspect on sustainable development. The project ProNatMat is a combination of all these aspects.

Lots of natural materials are imported from far-off lands although suitable materials can be found in our own environs. Majority of natural material products are made outside Europe. Increasing the use of local natural materials is both ecological and economical, they are also renewable and aesthetic. In the poor economic situation using natural materials supports the employment and encourages people to do in one's own hands. There is also a need to develop the new methods in order to create innovations and modern techniques. (ProNatMat project plan 2009.)

The communal spirit has risen again nowadays for example in resident's associations and eco-villages. Old wooden house neighbourhoods are repaired and people are taking more interest to their living environment healthiness and security. Environmental education and information among different groups wake up an ecological point of view in materials. (ProNatMat project plan 2009.)

Almost all types of public policy, public activities and public institutions are evaluated. Public action has traditionally got acceptance by economical investments and noble principles and beautiful speeches announcing good intentions and high ambitions. This is not enough according to supporters of evaluation. Also the gained objectives have an influence. (Vedung 2003, 3.)

Nowadays it is impossible to avoid evaluation. Present era of duty to account all actions are followed, observed and evaluated. Improving the operations is included in evaluation. Evaluation is defining a value or credit of something and this separates evaluation from a research that is connected traditionally to describing, explaining and understanding without value judgment (Aalto-Kallio et al. 2009, 9.)

The purpose of evaluation is to review the accomplishments of a project against planned expectations and use knowledge from the project to develop the design of future project and programmes (European Commission 1999, 63). This thesis is an evaluation of the project ProNatMat. The main goals are to find out are the project objectives achieved and fulfilled, and how the project fulfilled the objectives of the funding programme. The information will benefit future project planning and the final evaluation of the project.

PROJECT PRONATMAT AND THE FUNDING PROGRAM

Promoting natural material know-how in Southern Finland and Estonia (ProNatMat) is a three year project coordinated by Turku University of Applied Sciences (TUAS) which aim is to promote, increase and reassert natural material know-how in Southern-Finland and Estonia. Project started at September 2009 and it ends at December 2012.

The project started after LUMO-project which was also coordinated by Turku University of Applied Sciences. The main objectives of the project was to develop natural material know-how and cooperation possibilities among people who works with natural materials and to gather and distribute knowledge about natural materials and related matters. During the project it was noticed that there is a need for wider project. The actors in the branch are willing to develop themselves and services. ProNatMat project expanded promoting natural material know-how to an international level. The project involves also a strong cross-border cooperation. The main objective in ProNatMat project is to promote natural material know-how and to increase use of natural materials.

In addition to Turku University of Applied Sciences there are 9 other partners involved in the project, 5 in Estonia and 4 in Southern-Finland. These partners are Information Centre for Sustainable Renovation (SRIK) in Tallinn, Åbo Akademi University / Laboratory of Fibre and Cellulose Technology (ÅA) in Turku, Tallinn University (TLU) in Tallinn, Tartu University / Viljandi Culture Academy (VKA) in Tartu, Finnish Federation of Visually Impaired / Sokeva Handicrafts (FFVI) in Vantaa, University of Turku / Brahea Centre for Training and Development (UTU) in Turku, Estonian University of Life Sciences (EMU) in Tartu, South-Western Finland's Estonian Centre (EC) in Turku and City of Tartu / Turku Infopoint (IC) in Tartu.

The project receives 78,83% of its funding from Central Baltic INTERREG I VA Programme 2007-2013. The programme is funded by European Regional Development Fund.

Central Baltic INTERREG IV A Programme 2007-2013 funds cross-border cooperation projects in the central Baltic Sea area covering regions from Estonia, Finland, Åland, Latvia and Sweden. This means that the eligible regions must be along the Community's internal or external borders or along the Community's maritime borders. The foundation of Central Baltic Programme leans against Member States' shared desire to deepen and accelerate cooperation in the Central Baltic area. (Central Baltic INTERREG IV A Programme 2007 - 2013, 2010, 11.)

Countries in the programme area share a long history and therefore there is a solid tradition of co-operation in many areas. Many co-operations have been executed successfully. For example town twinning between Finland and Sweden and Estonia and Latvia is an active and popular form of co-operation. (Central Baltic INTERREG IV A Programme 2007 - 2013, 2010, 8.)

The programme consists of the overall Central Baltic Programme, the Southern Finland - Estonia Programme and the Archipelago and Islands subprogrammes. There are three common priorities in all programmes which are: safe and healthy environment, economically competitive and innovative region and attractive and dynamic societies. (Central Baltic Interreg I VA Programme 2007 - 2013, 2012.) ProNatMat project is under Southern Finland - Estonia subprogramme and priority attractive and dynamic societies.

1.1 Objectives of project ProNatMat

Obejctives of the project have been defined at the project plan during the project planning process as well as the expected results that are designed to carry out the objectives of the project. The objectives express the vision of the project partnership and they arise from a problem or a need for development. An objective is not defined as an action but as a situation that is wanted to achieve with the project and during the time of implementation of the project. (ProNatMat project plan, 2009.) The project plan of ProNatMat has been changed two times during Budget change but only in small details so it doesn't have an influence on objectives.

There are 13 objectives in the project and they can be divided into 4 groups plus the overall objective according to their reference group. The objectives was divided into groups during this research and placing an objective into one group was not unambiguous task. One objective could have been placed into two or three groups but the resolution was made based on the project plan and how the objective was implemented. Objective *To increase the use of local natural materials in Finland and Estonia* was added to *The overall objective* group because all the objectives have an influence on increasing the use of local natural materials.

The objective groups and objectives are seen in the table 1.

Table 1. Objectives of the project ProNatMat

Objective group	Objectives
The overall objective	 Promote natural material know how in Southern Finland and Estonia. To increase the use of local natural materials in Finland and Estonia.
Experimental practices and research	 To research new materials to find a way to replace import from far-off lands. To develop new, innovative methods of using natural material and provide more ecological and healthier materials and products To find new ideas and solutions of natural materials from outside program area. The increase demand for the market and potential for a new entrepreneurship in the local level.
Dissemination and reasserting know-how in different groups	 To increase and strengthen the know-how of the natural materials among different groups of society and between experts in both countries. To motivate people through residents

	 association to get natural material knowhow for their own well-being and for better environment. To inform and communicate everyman's possibilities to influence on the environment by using own creativeness and crafts.
Creating a network	 To create permanent and active natural material know-how network and a model of cooperation in Finland and Estonia. To arrange natural material events which promote natural material and restoration know-how and upraise the awareness of the natural materials and restoration in Finland and Estonia. To extend the content of European Capitals of Culture in 2011.
Storing information and preserving cultural heritage	 To create natural materials know-how databank where old and new knowledge is preserved and documented in digital and written form. Information is available for everyone. Maintain our nation's cultural heritage, exchange knowledge and bring new viewpoints to use natural materials in Finland and Estonia.

The expected results of the project are the immediate advantages of carrying out the activities of the project. The results are achieved during the project period or as direct result of the project. (ProNatMat project plan 2009.)

The expected results of the project ProNatMat according to the project plan are;

- website with databank,
- model of network,

- scientific results of clay and reed composites and chemical investigations at the molecular level of natural materials used in handicraft and in historic and cultural value objects,
- research results in educational experiments,
- workshops and seminars with three natural material themes: 1)
 ecological building, 2) handicraft, design and art, 3)cultural heritage and
 international and local courses for experts and public,
- publications about natural material know-how, surface treatment, study booklets and books, leaflets, glossary,
- touring info-car, mobile and stable exhibitions, posters and postcard,
- the use and knowledge of natural materials will increase
- informative lectures and public events and
- model of natural material centre and collecting chains of raw material.

1.2 Objectives of the funding program

The priority attractive and dynamic societies focuses on creating a better living environment for the inhabitants of the program area. The actions taken under this priority should lead to an increase in equal opportunities, a more attractive living environment and active participation of citizens in society. Measures should lead also to culturally dynamic region where the inhabitants have a sense of togetherness. (Central Baltic INTERREG IV A Programme 2007 - 2013 2010, 70-71.)

Sub-programme Southern Finland - Estonia is aiming at understanding the differences and similarities of the neighbour so that real co-operation could be achieved. There is a need for increased administrative understanding and coherency. Sub-programme also wants to re-enforce the region's identity and support the local culture and heritage. Culture is seen as a way to preserve historic values and to create a vital and dynamic society. An emphasis is put on life-long learning in all activities. (Central Baltic INTERREG IV A Programme 2007 - 2013 2010, 74.)

The sub-programme has two directions of support; social security and wellbeing of different groups in society and stimulating and preserving our heritage and culture. Of which the second one stimulating and preserving our heritage and culture concerns ProNatMat project. The objectives for this direction are;

- Strengthened regional identity through co-operation in the cultural field, both preserving historical values and creating new cultural activities,
- Increased cultural exchange and togetherness in the programme area.

(Central Baltic INTERREG IV A Programme 2007 - 2013 2010, 74-75.)

THE BASIS OF EVALUATION

This chapter is describing what evaluation is and why evaluations are executed. There is also short summary of types of evaluation. The main focus is on objective-oriented evaluation because evaluation in this thesis is executed as objective-oriented.

1.3 What is evaluation

According to definition by Vedung (2005, 3) evaluation is "careful retrospective assessment of the merit, worth, and value of administration, output, and outcome of governmental interventions, which is intended to play a role in future, practical action situations". It is impossible to reach only one definition of evaluation because there are number of different definitions to the term "evaluation". But there are crucial elements which should normally characterise evaluations:

- evaluations should be analytical they should be based on recognised research methods;
- evaluations should be systematic they require careful planning and consistent use of the chosen methods;
- evaluations should be reliable the findings of an evaluation should be reproducible by a different evaluator with access to the same data and using the same methods of data analysis;
- evaluations should be issue-orientated evaluations should seek to address important issues relating to the programme, including its relevance, effectiveness and efficiency; and
- evaluations should be user-driven successful evaluations should be designed and implemented in ways that provide useful information to decision-makers, given the political circumstances, programme constraints and available resources.

(European Commission 1997, 9-10.)

"The purpose of an evaluation is to make an assessment, as systematic and objective as possible, of an ongoing or completed project, programme or policy, its designs, implementation and results" (European Commission 2004, 46). The goal is define the relevance and fulfilment of objectives, developmental efficiency, effectiveness, impacts and sustainability. An evaluation should provide credible and useful information, including experiences into the decision-making process of both recipients and donors. (European Commission 2004, 46.)

Evaluation should not be confused with monitoring or auditing. When evaluation focuses on the assessment of the efficiency, effectiveness, impact, relevance and sustainability of aid policies and actions, monitoring concentrates on ongoing analysis of project progress towards achieving planned results with the purpose of improving management decision making. And auditing concentrates primarily on financial and financial management with focus of effectiveness being on project results. (European Commission 2004, 46.)

Basically evaluation can be conceived as shared learning experience for all who are concerned, producing useful and relevant information and knowledge. It has a theoretical and practical approach which feeds back into ongoing change process in organisations and projects. It is also a systematic way to assess the relevance, efficiency and effectiveness of policies, projects and programmes. (Hughes & Nieuwenhuis 2005, 5.)

1.4 Why evaluate

Program evaluations are executed with the general aim of improving things. They are also be conducted to identify the effects of a program on society or to help decision-makers to reach a decision about the value of the program. (European Commission 1997, 11.)

Within this definition can be distinguish three reasons why to evaluate. First there are the **managerial reasons** that concern assessing and improving the implementation of a program. Management of the program need to know the

strengths and weaknesses and how it can be improved, which aspects are working sufficiently and which are not, and what are the reactions of clients, staff and others to the program. (European Commission 1997, 11.)

Second reason of evaluation is **accountability**. Specially in the EU context there is increasingly a legal requirement. Evaluation that is executed for accountability purposes generally concentrates on the impact of the program and cost-effectiveness and are meant to improve transparency. It benefits both supporters and opponents of program as well as the ordinary citizen. Third reason is to **improve the allocation of financial resources** within organisations. This means transferring resources away from ineffective or irrelevant programs towards programs which are more efficient. (European Commission 1997, 11.)

At worst evaluations are rituals of public administration that doesn't have demand and that aren't utilised at all. Evaluations are doomed to fail if they aren't channelled into right direction or evaluation information is produced inappropriate manners. Sometimes evaluations are appreciated only for the sake of its own and they are respected and praised in spite of its problems. Performing evaluations aren't self-worth but value of evaluation is formed with its usefulness. (Virtanen 2007, 14.)

1.5 Types of evaluation

Types of evaluation can be categorized in various ways but one way of classify evaluation methods are to categorize evaluation research methods by content of evaluation and essential examination perspectives. On the basis of this classification it can be found five evaluation types that are based on *objectives*, *economy*, *implementation*, *satisfaction* and *needs*. (Vartiainen et al. 2001, 22.)

Objective based evaluation can also be referred as goal-attainment evaluation. The evaluation based on objectives poses a question; has the program achieved its stated objectives. The program's success is measured in terms of the goals it has set for itself. The evaluator using objective based evaluation will

seek detailed information concerning the objectives of the program and means to measure their attainment. (Stecher & Davis 1989, 54.) According to Vedung (2005, 38) "goal-attainment evaluation is a paragon of simplicity and lucidity". After the objectives of the program are specified, their actual meanings are identified and order is ranked and objectives have been turned into measurable objects, the second step is to find out what extent these premeditated objectives has been executed in practise. Third step is to ascertain the degree to which the program has promoted or moderated goal realization. (Vedung 2005, 38.)

Economy based evaluations are significant because one of the most central project evaluation fields have always been comparison between costs and gained results (Vartiainen et al. 2001, 22). It is critical to know both the degree to which a program produces the desired outcomes and benefits in relation to costs (Rossi & Freeman 1990, 49).

Implementation based evaluation can also be referred as processes evaluation. In this type of evaluation the question is to clarify what is happening when the project is executed in practise. How it is implemented and it is working how it is planned. (Robson 2001, 77.) It provides information about whether the project is conducted as efficiently as possible, are the actions that were undertaken for sponsor and stakeholders actually executed and finally is the project taken place and served participants in the way intended. (Rossi & Freeman 1990, 45.)

Satisfaction evaluation can also be referred as impact assessment. In this type of evaluation it is emphasized on representing quality of project activities and produced services and client attitudes towards actions of evaluable target. (Vartiainen at al. 2001, 22.) It is also reasonable to ask what kind of impacts or consequences project have for participants (Robson 2001, 78).

Needs based evaluation purpose is to evaluate necessity of planned project before planning the program or launching the project. At a later date needs research results can be applied when evaluating equivalence of project client needs and project objectives. (Vartianen et al. 2001, 22.)

1.5.1 Formative and summative evaluation

Traditional way to categorize evaluation research is grouping into *formative* and *summative* evaluation.

Emphasis on formative evaluation is on success of implementation processes of projects and programs. Formative evaluation is useful at situations where information is needed to develop project or to lead it forward. (Vartiainen et al. 2001, 21.) It is typically focused on new projects where objective of the project is on record and the purpose of evaluation is to edit the project so that it helps to gain the objective (Robson 2001, 80-81).

Summative evaluation focuses mainly on evaluating results that are achieved by project. Characteristic of summative evaluation is ex post type of evaluation that is executed afterwards and project is evaluated by summing up the results. (Vartiainen et al. 2001, 21.) It provides a final report that demonstrates what have been achieved with the project. It concentrates on impact assessment of the project and includes the question have the objectives achieved or not. It can also cover such matters than is the project plan implemented, is the focus group achieved and are their needs met. (Robson 2001, 81.)

In practice it is rare to find either purely formative or purely summative evaluations. Most of the producers of services want at least some information about how they can make the service better and what impacts the service has. But the main focus is often at either one of these evaluations. There are similarities between definitions of formative and summative evaluation and process impact evaluation but the definitions have different meanings. Formative and summative refers to evaluators aim to perform research either to help developing the service or to provide an assessment. (Robson 2001, 82.)

1.5.2 Internal and external evaluation

We can talk about internal evaluation when there is a person in the mother organization who is concentrated on evaluations. It is systematic self-evaluation activity arranged by organization and it is executed by independent evaluator

appointed to the task. Internal evaluation can also be perceived as inner project evaluation when evaluator is part of project personnel. Internal evaluation serves the needs of the project and produces information for steering the project and also, if needed, information for external evaluation. Self-evaluation can also be seen as part of internal evaluation. (Hyttinen 2006, 37.)

Advantage of internal evaluation is that evaluator knows the operational environment and people in the project. Evaluator has internalized information about resources and settings as well as silent information organizations previous projects. (Hyttinen 2006, 37.) Internal evaluations, where people in the program collect the data themselves, are typically less expensive than evaluation executed by external evaluators (Patton 1990, 223). It also raises a question about credibility; is the internal evaluator as objective as possible in his/hers examinations? (Hyttinen 2006, 37.)

External evaluation is executed by outsider party. It is needed particularly when sponsor or other interest group requires independent evaluation. If an evaluation research is wanted an outside know-how can be needed. External evaluator has often extensive experience of different and various organizations projects. Company that is specialized on evaluations has also bigger evaluation resources and objectivity is not questioned. On the other hand the evaluation can remain superficial because it is hard for an outsider to get in the project and communication with the members of the project may remain thin. (Hyttinen 2006, 38.)

EVALUATING PRONATMAT PROJECT

The purpose of this thesis is to evaluate the project ProNatMat. The project is finished at the end of the year 2012 thus it is time to view the accomplishments of the project.

In this chapter it is described the process of an evaluation at hand. It is explained what methods are used in the research, what research data is used and how it has acquired and how the data is analysed. The simplest way to describe the evaluation process is to put the evaluation in four phases according to Herman et al. (1988, 27);

- set boundaries of the evaluation,
- select appropriate evaluation methods,
- collect and analyze information,
- report findings.

1.6 Boundaries of the evaluation

The project ProNatMat is an objective based evaluation because it is set out to clarify have the objectives achieved and fulfilled. The purpose of this thesis is to answer in following questions:

How the project objectives have been achieved and fulfilled? If they are not, why?

How the objectives of the project fulfil the objectives of the funding programme Central Baltic Interreg IVA Programme 2007-2013?

Both qualitative and quantitative research methods are used in this thesis to assure the reliability and diversity of the research. The research is a summative evaluation although evaluation is taking place few months before the project is ended. The evaluation was still justified to perform before it's ending because the project had been in action for three years thus project partners had very good interpretation about how well the project has been executed.

The evaluation is also an internal evaluation. The evaluator and writer of this thesis has been working in the project as a project assistant since October 2011. Hence the evaluator has a good insight of the project and knows the operational system of the project.

The main focus in the thesis is on the objectives of the project. The objectives placed in the project are quite general and because of this setting the measurement criteria is very challenging. To help evaluating the objectives they have been divided into four groups:

- Experimental practices and research,
- Dissemination and reasserting know-how in different groups,
- · Creating a network, and
- Storing information and preserving cultural heritage

1.7 Evaluation methods

Evaluation of the project ProNatMat is an objective based evaluation. The objectives are specified and they have been turned into measurable subjects and then it will be found out what extent these premeditated goals has been executed in practise. Next step is to ascertain the degree to which the program has promoted or moderated goal realization.

The evaluation perspectives are in *objectives*, *outputs* and *results*. *The objectives* are defined already at the designing phase of the project or they are precisely expressed in public. Unambiguous and concrete objectives are prerequisite for precise evaluation whereas for indefinable objectives it is difficult to pose evaluation and set the questions. *The outputs* tells about things or development brought about by the actions of the project. The results tell what immediate advantage the public actions achieved. The central focus is on the beneficiaries or on the participants. The evaluator enquires how the participants have experienced the activities and what benefits they have received. (Virtanen 2007, 88.)

Concepts that relates to evaluation perspectives are called evaluation criterion. The most significant evaluation criterions are relevance, implementation, efficiency, cost effect, comprehensiveness, utility and sustainability. (Virtanen 2007, 88.) In this thesis the evaluation criterion will be concentrated on implementation, effectiveness and sustainability because of outlining the research work.

Implementation refers to the extent to which the project has been carried out in relation to the implementation of the objectives and the approach to other instructions. Instructions can be related for example to following the standing orders on commercial transactions of the public organizations or to actions in accordance with the decision-making process. Implementation is evaluated by the extent which the project implements its specified operational frames, how it has followed the project plan and controlled for example economical resources. Effectiveness means evaluation of the extent to which the objectives have been achieved and the extent to which the effects are equivalent to the placed objectives. Evaluation of sustainability examines how permanent the impacts of the activities will remain and how likely the impacts will disappear when the activity ends. (Virtanen. 2007, 89 - 92.)

The Logical framework approach (LFA) is an analytical process and set of tools used to support project planning and management. It provides a set of combined concepts which are used as part of a repeated process to aid structured and systematic analysis of a project or program idea. The LFA is an aid to thinking. It helps analysing information organized and structured way. LFA is an analytical process that involves stakeholder and problem analysis, objective setting and strategy selection. Based on the LFA it is put together a concrete matrix called the Logical framework matrix (Logframe). It is the documented product of the analytical process. (European Commission 2004, 57.)

The Logframe consists of a matrix with four columns and four or more rows which summarise the key elements of a project plan that are according to European Commission (2004, 57);

- The hierarchy of project objectives (Project Description)
- The vital external factors critical to the project's success (Assumptions)
- How the project's achievements will be monitored and evaluated (Indicators and Sources of Verification)

The typical structure of a Logframe Matrix is shown on the table 2.

Table 2. Typical structure of a Logframe Matrix (European Commission 2004, 58.)

Project	Indicators	Source of	Assumptions
Description		Verification	
Overall objective	How the OO is to be	How will the	
	measured?	information be	
		collected?	
Purpose	How the purpose is	As above	If purpose is
	measured?		achieved, what
			assumptions must
			hold true to achieve
			00?
Results	How the results are	As above	If results are
	to be measured?		achieved, what
			assumptions must
			hold true to achieve
			the purpose?
Activities			If activities are
			completed, what
			assumptions must
			hold true to deliver
			the results?

In evaluation the Logframe Matrix is a tool that helps to identify causality of actions, outputs and results. It is designed especially for ex ante evaluation but it can be utilized at ex post evaluation for counterpointing other methods. It is easy to verify the connections between objectives and possible risks and measurability of the objectives. (Sillanpää & Ålander 2003, 15.)

Usually the Logframe Matrix is produced during the designing phase of the project but often happens that it is not done. Also in project ProNatMat it was not done so it was made for the evaluation purpose. ProNatMat project's Logframe Matrix can be found on the appendix 2. for closer look.

1.8 Research data

The research data was collected by using many methods and research combines both qualitative and quantitative research methods, hence we can talk about triangulation. Triangulation means joint use of research methods and it defines the research validity in qualitative and quantitative research. Triangulation can be divided into four groups; methodological or methodical triangulation and researcher, material and theory triangulation. (Hirsjärvi 2012, 233.) In this thesis it was used material triangulation when different research data is used to solve the same problem.

The research data consists of reports produced in the project (milestone reports, final reports), indicators, course questionnaire and interviews of the partners. Most of the research data is information which is existent, so called secondary material but it is suitable for research data because it has been produced for the project and it benefits the evaluation.

Milestone reports are made every four months by every project partner and it is a summary of the budget and activities implemented during the milestone. The lead partner prepares the Progress report and payment claim based on every partners milestone report. The report is sent to Joint Technical Secretariat. In ProNatMat project there was 10 milestones.

Partners are obligated to write a final report in the end of the project that is a summary of project success and also failures, experiences and lessons learnt, sustainability and results and how the objectives have been accomplished. The lead partner gathers the common final report based on every partners report.

Indicators for the project and for the funding programme are outlined at the project plan and they have certain quantitative goals. Indicators were calculated every milestone and they were added up cumulative through the whole project.

The quantitative indicators of the project are;

- the amount of arranged events,
- the amount of participants, and
- the amount of publications.

The quantitative indicators of the sub-program are;

- new co-operations established,
- further developer co-operations
- organizations involved in co-operations,
- co-operations and networks sustainable when funding ends, and
- joint cultural events performed.

Succeeding at the fulfilling the objectives from a target groups point of view was evaluated with a course questionnaire that was executed in the spring 2012 as questionnaire in the internet. Questionnaire was set to decipher the contentment of the participants and instructors to the courses arranged by the project in Turku. The questionnaire covers only the courses arranged in LUMO-centre in Turku but with it can be evaluate how the lead partner has reached the target group. The respondents had about one month to answer the questions in the questionnaire. The question form was sent to 165 participants and 15 instructors. 30 participants and 5 instructors answered the questionnaire when the response rate was 20 %. The question form is found at the appendices.

All project partners had possibility to express their opinion in an interview based on the final reports partners have made. The interview was built in such a way that it is "easy" to go back in those things the partner has emphasized and they can clarify their point of view on these matters. An interview can also be more relax way to speak about issues from an own perspective than writing them in a official report. The partners were also asked to assess the success of the

objectives implementation on a scale of five to one when one is the weakest and five is the highest. The interviews were made face to face or via Skype and notes were taken during the interviews. All the partner organisations participated on the interviews. The framework of the interview is seen on the appendices.

RESEARCH RESULTS

In this chapter is presented the research results of evaluating the project ProNatMat. Evaluation was made at November 2012 one month before the project ended. Evaluation was nevertheless justified although the project was still running during the evaluation because there is not significant activities on the last months and the partners have good overall picture about objective execution from three years.

The analysis of the success of the objectives is executed by the objective groups except *The overall objective*. The success of overall objectives is analysed at the *Conclusions* chapter. The objective groups have been analysed on the basis of the evaluation criteria. In the analysis have been used the LogFrame Matrix as a help to identify information sources and connections. The overall purpose is to answer the research questions that are indicated on the chapter4. The analysis is presented by the objective groups that are;

- Experimental practices and research,
- Dissemination and reasserting know-how in different groups,
- · Creating a network, and
- Storing information and preserving cultural heritage

All the objectives by the groups are found on the appendix 1. The objectives of the funding program are analysed in their own group. Evaluation of funding programs objectives have done by analysing how the project objectives have contributed to the Central Baltic INTERREG sub-program objectives.

1.9 Experimental practices and research

The purpose of this objective group is to research new materials, to develop new methods of using natural materials, to find new solutions and ideas from outside the program area and increase the demand in the markets. The expected results concerning this objective group were research results, workshops and courses and publications.

Implementation

According to project plan scientific research was designed to do on selected natural materials by ÅA and EMU. FFVI participates to research part by searching new local materials for visually impaired craftsmen. VKA concentrated in researching crafts people's skills by participatory fieldwork and practice-based research. Research results were planned to utilize in experimental practice and to publish for everyman's benefit.

Experimental research was done in workshops they were planned to do in both countries by SRIK, TUAS, VKA, FFVI, UTU and TLU in three themes 1) ecological building, 2) handicraft, design and art, 3) cultural heritage.

Two study trips outside of program area was planned to get new ideas and perspective from elsewhere in Europe. Destinations planned were Vilna, Latvia and Holland. Vilna was chosen as a travel destination because it was a Cultural Capital City at 2009 and project planned to go see how natural materials are presented there during the Cultural Capital year. Holland was chosen because natural material know-how is highly developed and on view there. Eco villages were also meant to explore in Holland.

Promoting the entrepreneurship was realized by bringing forward natural material experts at events and workshops, and by researching new local materials it can be develop new products for market and thus increase the demand. Common awareness will rise and have an increasing effect on demand by distributing information about use of natural materials and why it is important to use natural materials.

Scientific research were executed in both institutes ÅA and EMU. ÅA made chemical investigations at the molecular level of natural materials and reported the results on two literature reviews. EMU did several experiments during the project period in order to investigate mechanical and thermal properties of local natural materials. EMU developed a simple methodology of identifying the properties of clay with simple field test which was mentioned as one main task for EMU. UTU was planned to research where other universities was natural

material research or co-operation and this was done and results are published. TLU's research responsible were to examine natural materials use in toddlers teaching and art therapy. VKA was planned to research and collect data about craftspeople during fieldworks.

FFVI found some new materials for visually impaired craftsmen, recycled materials more than materials straight from the nature. The research were done by organising courses and experiment the use of materials with visually impaired craftsmen. Most of the materials that visually impaired craftsmen use in their handicrafts comes from far-off lands and FFVI wanted to find new local materials to replace them or beside the usual material. FFVI organised 3 courses for visually impaired craftsmen where they were introduced new materials and products to produce.

Experimental workshops were organized in both countries in the three themes mentioned above and they turned out to be very successful in Estonia as in Finland. Study trips were made which were mentioned as one of the highlights of the project by almost all the partners.

Effectiveness

Research results were made on such natural materials as clay, reed, birch bark and literature reviews were made such as surface characterization of natural materials. At the results was stated that research in historic and cultural value objects is conducted but it was decided to focus on research at the molecular level.

Universities of Turku and Tallinn made also their own research. All the results are available in the project website and in the main publication of the project. UTU studied other universities at Central Baltic INTERREG program area and what kind of research they have on natural materials. TLU published results and a educational film on natural materials in art therapy and a book about their research about natural materials use in toddlers play. VKA has published 6 research and 34 small-scale researches and estimate 200 informants have been visited in order to complete the research and scientific articles.

In FFVI the results of the research were not as high as expected. The courses for visually impaired craftsmen were organised but the only natural material that was used at the courses was twigs and FFVI decided to broaden courses to use of recycled materials and that was proven to be more successful.

The problem with natural materials was storing and collecting the material. FFVI doesn't have the space for it and collecting the material is challenging for visually impaired people even with a help of a sighted person. Because a permission is needed from land owner for collecting twigs and very few have their own land from where to collect the material. As a result from the courses some new products were made also to sell at Annansilmä-aitta which sells products made by visually impaired craftsmen. According to FFVI one reason for modest result is that everything takes time in a NGO and the need for new materials and products should come straight from the craftsmen themselves.

Workshops were organised more than 100 and the target number of workshops were 20 therefore it can be conducted that workshops were more successful than expected. To some workshops came participants from other countries if the expert was well known on its field of expertise. The popularity of workshops was a positive surprise for all the organising partners. Partners reckon that timing was right for these kind of workshops and natural materials are getting more and more popular.

Two study tours outside the program area were made but instead of Vilna a trip was made to Pécs, Hungary. Trip to Vilna was delayed until it was too late to go there in 2009 but it was possible to go Pécs which was a Cultural Capital at 2010. The trips gave information about natural material use outside the program area and it gave inspiration and new ideas on how to use materials in a new way. Trips were also important for the groups internal co-operation and communication between partners.

Sustainability

In this objective group the level of sustainability is high because all the research results are published and available for everyone in the project website or otherwise distributed to target groups. The sustainability of the workshop activities depends on will they continue independently by the partner organisation or additional partners. Some of the partners have announced to continue workshop actions after project in some form.

Sustainable benefit for entrepreneurs is depending a lot of the entrepreneurs themselves. FFVI continues the course activities because it is part of the organisations normal activity and all the instructions of the products are available for organisations members. FFVI was involved in the planning of a new part in an artisan degree at Keskuspuisto Vocational College for special needs education and now it is possible to study local, natural and recycled materials since the beginning of the year 2013.

Increase in demand is not inspected but some partners had fragmented information about how project was enabling employment. For example Finnish language course made it possible for one participant to go to Finland to work and one expert who has sold linseed oil under a big brand sells now the oil under his own name.

1.10 Dissemination and reasserting know-how in different groups

In this objective group the purpose is to increase and strengthen the know-how of the natural materials among different groups and experts, and motivate people through residents association to get natural material know-how for their own well-being and for better environment, and to inform and communicate everyman's possibilities to influence on the environment by using own creativeness and crafts. The expected results concerning this group are website with databank, courses and seminars, publications, touring info-car, mobile and stable exhibitions, informative lectures and public events.

Implementation

All the partners took part to executing this objective group. Implementation of this group was realized by organising and participating on events, distributing information, setting up exhibitions and publishing information on website or through another channel.

Project participated on organising five bigger events that are Ökomäss eco fair in Tallin two times and three times Koroinen Village Festival in Turku. Project participated on events where it was possible to promote natural materials and experts on the field in both countries such as building fairs, book fair, healthy house fair, traditional home fair Turku University of Applied Sciences' research and development days and other related events. SRIK started to organise open info days for counselling.

The planned mobile exhibition was found too difficult to arrange and because of that it was concentrated on changing exhibitions that were set up in Koroinen, Turku. Touring poster exhibition was arranged and it was on display at Ruissalo Botanical Garden, Turku Infopoint in Tartu, entrance hall at TUAS, at EC and Ökomäss eco fairs. The mobile exhibition with proper collection of natural material samples was shown in the infocar at two events, Supilinn days in Tarto and two times in Portsa street market, Turku.

Almost all the planned publications were published such as main publication of natural material know-how, eco builders glossary in Finnish and Estonian, book about surface treatment (will be published at the end of 2012), book about natural material use in toddlers education, educational film about natural material use in art therapy, project leaflets, postcards and posters. Only study booklets about the results of workshops were not produced because of lack of resources. The website was launched officially in February 2011 and it contains articles about natural materials and information about events.

Effectiveness

The Estonian partners emphasized the success of Ökomäss eco fair because the feedback was very positive and it clearly was something that was needed at the field. The main organiser SRIK was very happy that it was organised twice and it wouldn't have been possible without the project. Both times Ökomäss attracted about 1000 interested people to Telliskivi where it was organised.

The role of the touring infocar was much more smaller than was presumed. According to original plan it was designed to work with restoration students but the degree program of restoration was ended during the project period and it was hard to find students to work with.

At Koroinen it was arranged 10 exhibitions, in newspapers or other magazines there were 39 articles in Finland but the number of articles about the project activities. This means that during 10 Milestones there were one exhibition in Koroinen at every Milestone and 3,9 newspaper article in Finland per Milestone. There is not an exact number of how many articles there have been in Estonian magazines but there have been articles in newspapers according to Estonian partners Milestone-reports.

The website was been updated throughout the whole project after the launch. At the website there are about 200 articles about natural materials including information about events and project outputs. Website operated also as an information channel for events organised in project.

The target amount of publications was 5 and the total number of publications is 5. Main publications print run was 1000 copies. Eco builders glossary print run was 100 copies and it run out at Ökomäss. 200 copies more of the glossary have been ordered. Surface treatment publications print run was 400 and natural material use in toddlers education book print run was 300. The educational film about art therapy is targeted for special group of therapist hence the amount of copies is small.

Sustainability

Sustainability of this objective group is high because all the printed and published information will remain in some form. Books are distributed to all interested parties and the book is available for downloading in the internet. The ProNatMat website will stay in the internet after the end of the project. At the website there are all the newspaper and other articles available and information about executed activities of the project.

The touring infocar was planned to continue its activities independently after the project by the students of restoration but because of the abolishment of the degree it is impossible to execute.

Eco fair Ökomäss will be arranged again in 2013 and the preparations are already started. Also Koroinen Village Festivals will be arranged again in 2013 by a local association. Exhibition activities will continue at LUMO centre assuming that LUMO centre can continue its activities. SRIK will continue its open info days.

1.11 Creating a network

In this objective group the purpose is to create permanent and active natural material know-how network and a model of cooperation in Finland and Estonia, and to arrange natural material events which promote natural material and restoration know-how and upraise the awareness of the natural materials and restoration in Finland and Estonia and to extend the content of European Capitals of Culture in 2011. The expected results in this group are model of network, workshops and seminars and model of natural material centre and collecting chains of raw material.

Implementation

The objectives of this group was realized by organising events and meetings in three thematic groups (1.Ecological building, 2. Handigrafts, design and art, 3. Cultural Heritage) where actors at natural material field can interact and form new channels to implement ideas. Language courses were also planned to organise for partners and additional partners in Finland and in Estonia by EC and IC. The responsible partner in this group is EC but all the partners participated in seminars and networking.

During project period it was organised over 150 events such as meetings, lectures, exhibitions, workshops, seminars and courses. Combined sum of participants at all events is over 7000.

In the European Cultural Capital Year 2011 Turku and Tallinn were the capitals and ProNatMat was co-operating in 8 Cultural Capital Year projects. ProNatMat participated for example in bigger events such as Merepäevad sea days in Tallinn by organising workshops for audience which was done by SRIK and in Turku TUAS participated on Turku city Neighbourhood weeks at Koroinen.

In Estonia it was organised language courses and the planned course hours were raised because of high interest. In Finland it was also planned to arrange Estonian language course but it was never executed. The executive manager changed in EC during the project period 4 times and that had an effect to task implementation. New manager had to start always from the beginning and the previous' manager work was almost made in vain. When finally all the plans and preparations were done for the language course the course the teacher broke her/his leg and the course was cancelled.

Effectiveness

The target amount of arranged events was 60 and amount of participants 3000. The total number of events was more than double the target amount and participants almost three times the target amount. On the basis of these figures can be said that wider audience received information about natural materials than was expected. Popularity of events influenced on the amount of organised events increasingly. The model of natural material network was created at Ökomäss eco fair which acts as annual forum for natural material networks.

During spring 2012 was a course questionnaire was carried out about courses ProNatMat organised in LUMO centre. The questionnaire was compiled for participants and course teachers. Replies was received together 35 out of 185 sent forms, 30 course participants and 5 course teachers. The course participants were mostly content with the courses and want to come back for another course. Same kind of activities was wished to be arranged in the future at LUMO centre. Teachers at the course were additional partners and cooperators of the project. The teachers were very happy with the courses and they informed their willingness to come teach again another courses.

The original plan of thematic groups was altered such a way that the meetings were gathered around one material, for example wool or reed. Thematic groups were difficult to arrange because there were too many people from different fields so it was seen better to form smaller groups. One group formed in Finland was a permaculture study circle which was very popular and got many people's attention. The study circle started to run independently and permaculture events were arranged at LUMO centre. The popularity of permaculture in both countries came as a surprise for project partners. It was clearly something what was waiting for a right time to pop up to people's awareness.

Collecting chains of raw material was fulfilled independently so that people who had extra natural material brought materials to LUMO centre. For example park trees were collected at LUMO centre because ProNatMat made co-operation with Devepark project and they needed a place to store old park trees.

Sustainability

Sustainability of this group is depending as well as on the activity of the additional partners and project partners. All the partners were certain that the co-operation will continue between co-operators.

At EC the promoting Estonian handicrafts will continue in addition to their own activities and EC will keep in touch with their network. Operation of IC was ended in Tarto but Tarto Rahvaülikool has moved to IC's former premises and the purpose is that rahvaülikool will pursue IC's activities by continuing Finnish-Estonian co-operation and language courses.

Permaculture study circle will continue their activities independently and it is involved in a permaculture teacher project. Permaculture study circle will carry on their activities at LUMO centre.

Big challenge for sustainability is the situation of LUMO centre where was planned a material bank of natural materials and natural material centre. TUAS has been the main tenant at LUMO centre and it has cancelled the rental agreement at summer 2012. The purpose was that activities will continue by an

Elävän kulttuurin Koroinen association in LUMO centre after the project. The city of Turku has shown a green light for association and they can be the main tenant at Koroinen but nothing is officially agreed at the writing moment of the thesis. The association Elävän kulttuurin Koroinen is one of the results that project had an influence on achieving. It is an association based on voluntary activity and it is willing to continue activities in LUMO centre.

Assuming that LUMO centre can continue its activities LUMO centre and SRIK will act as natural material centres and teachers will visit on both sides. LUMO centre will continue to keep a small side shop for Majatorher renovation store in its premises.

1.12 Storing information and preserving cultural heritage

The purpose in this objective group is to create natural materials know-how databank where old and new knowledge is preserved and documented in digital and written form and the information is available for everyone, and maintain our nation's cultural heritage, exchange knowledge and bring new viewpoints to use natural materials in Finland and Estonia. The expected results are website with databank and publications.

Implementation

The objectives of this group were realized by producing www-portal which contains natural material know-how register, databank of natural material know-how, audiovisual documents about old and new techniques, educational films, video clips and reports about methods and techniques. The responsible partner of these activities was VKA but all the partners were responsible of producing content to the website. Website was to be established at three languages; English, Finnish and Estonian. The articles are supposed to be at least in English and in Finnish or Estonian.

The www-portal was launched officially in February 2, 2011 but the pages were open since Milestone 3. During the implementation of the evaluation there were over 200 articles at the website and most of the articles were at least at two

languages. Articles include databank of materials, information about organised events, project publications, gallery containing videos and photos, information about experts and articles on the three main themes of the project.

Effectiveness

The websites were realized and updated in collaboration with TUAS because producing websites was more time consuming for VKA what was estimated. Instead of original plan TUAS took on the constitution and hosting of the technical content of the website. Other partners contributed on sending material to the website very variable and moderately.

The target amount on audiovisual documents about old and new techniques was 10 and educational films 2. On the website there are 16 videos on techniques, 2 educational films and 35 photo series of project activities.

Content of the articles is more at general level than specific information. More deeper information was hoped to the website. One problem was the attitudes of the experts towards spreading their know-how. Some experts didn't want to share their knowledge because otherwise their expertise wouldn't be special and they thought it would affect decreasingly on their employment situation.

Sustainability

Sustainability of this objective group is high because the website will stay at the internet after the project period ends. The information is available for everyone who is interested on natural materials at least till the year 2015.

VKA will continue to research old handicraft information and making audiovisual material and it has done great deal of work for preserving handicraft tradition and teaching it again which increase the preservation of cultural heritage. VKA filmed about 40 hours of raw material during project period and they are planning to produce ethnographical short movie observing the natural material workshops in Estonia if they find additional funding. Also TLU has lot of material of natural materials and art therapy which they will use later on.

1.13 Quantitative analysis of project indicators

The project level targets were placed and fulfilled as seen on the table 3:

Table 3. Quantitative indicators of ProNatMat

Project level targets			
	Target	Realization	
Amount of organised events	60	174	
The amount of participants	3000	7414	
The amount of publications	5	5	

Based on this table it can safely say that project has fulfilled the indicators easily and even over fulfilled. One big reason for this is the great popularity of the workshops. Workshops organised by SRIK were always full of people and they had to set a small material fee because they had to acquire more materials and the fee would screen out the participants who are really interested on the subject. A lot of participants were also in the big events such as Ökomäss eco fair and Koroinen Village Festivals.

The amount of participants is more a suggestive figure than an exact number of participants. It is impossible to count all the actual participant. All the publications were done and there were no difficulties to produce them other than schedule wise but often creative process is more time consuming than is planned and it was the case also in here.

1.14 Objectives of the funding programme

The objectives of the funding programme are to strengthen regional identity through co-operation in the cultural field, both preserving historical values and creating new cultural activities, and to increase cultural exchange and togetherness in the programme area. All the activities on the project can be seen as a way to reach these objectives.

The co-operation between Finnish and Estonian partners was working fluently according to all partners. There were slight problems at language level and in communication between scientific and practical organisations but in overall the co-operation worked well.

Group Experimental practices and research contributed the funding programs objectives by researching experts and their know-how as well as specific natural materials which can be found in Finland and Estonia. In workshops natural material know-how was put into practice and this way it was spread to as many as possible. Research results are common information and relevant in both countries.

Group *Dissemination and reasserting know-how in different groups* advanced the funding programs objectives by distributing information about natural materials and the project in both countries. The information was often in two or three languages thus benefiting the cross-border co-operation and cultural exchange.

Group Dissemination *Creating a network* contributed the funding programs objectives by creating network of experts and amateurs who are working in the field or otherwise are interested. Expertise exchange was vivid throughout the project, Finnish experts visited in Estonia and vice versa. Big achievement for networking was Ökomäss eco fair where experts from both countries were on display and from a positive feedback it can be come to a conclusion that this kind of event was needed.

Group Storing information and preserving cultural heritage promoted the funding programs objectives by preserving the know-how that is in danger to vanish with the experts if it's not gathered. It is also important to collect natural material information and know-how at the same place that is available for everyone.

The program level targets and indicators for sub-program and direction of support were placed and realized as seen on the tables 4 and 5:

Table 4. Program level targets.

Program level targets			
Common indicators	Target	Realiza- tion	
Number of people participating in joint education or activities	1000	750	
Number of people getting employment on the other side of the border as a result of the CDB project	2	7	

The indicators for sub-program and direction of support were fulfilled and even over fulfilled as it is seen on the table 5. The total number of realization of Joint cultural events performed was not available at the writing moment of this thesis.

Table 5. Indicators for sub-program and direction of support

Indicators for Sub-Program and Direction of Support			
	Indicator	Target	Realization
Output indicators	New co-operations established	200	564
	Further development co-operations	10	170
	Organisation involved in co-operations	100	685
Result indicators	Co-operations and networks sustainable when ERDF funding ends	5	5
	Joint cultural events performed	50	

Priority Attractive and dynamic societies focuses on creating better living environment for program area's inhabitants. It deals with creating a region with equal opportunities for different groups of the population. It supports also active participation in society. Improving the quality of life for citizen's is an important aspect of sustainable development. Increasing cultural activity and people-to-people cooperation increases the quality of life and this is the basis of all other kinds of cooperation. Beneficiaries at this priority are municipalities, regions, authorities and other public organisations, universities, research institutions,

special interest organisations and NGO's. (Central Baltic Interreg IV A Programme 2007 - 2013, 2012)

As it is seen at the table 5 project has fulfilled the indicators for sub-program and direction of support multifold. There was vibrant co-operation between Finland and Estonia throughout the whole project as it can be seen from the indicators. Project included many different organisations to co-operation and thus increased the cultural life in the program area. ProNatMat beneficiaries' include almost all the above mentioned institutions.

Sustainable co-operations are formed between TUAS and all the new partners in Estonia. LUMO centre and SRIK will continue working together. EC and IC or Tartu Rahvaülikool will re-organise their co-operation and continue networking.

CONCLUSIONS

This thesis was set out to examine the objective fulfilment of the project ProNatMat. The research questions are were the following:

How the project objectives have been achieved and fulfilled? If they are not, why?

On the whole it can be alleged on the basis of the research results that most of the objectives were achieved and fulfilled as planned. The overall objective *Promote natural material know how in Southern Finland and Estonia* was certainly fulfilled when project activities are viewed. More than 7000 participants have been informed about natural materials thus it can be presumed that interest towards natural materials is high and now people are more aware of possibilities to affect their own surroundings. Most of the results are at sustainable level in such a way that the results will be useful for beneficiaries.

It is more challenging to assess the fulfilment of the other overall objective *To increase the use of local natural materials in Finland and Estonia*. Only in the long run it can be said if the project had an influence on increasing the use of local natural materials. But during the project it was used local materials at the organised events and workshops thus increasing material use on its own behalf.

How the objectives of the project fulfil the objectives of the funding programme Central Baltic Interreg IVA Programme 2007-2013?

On the basis of the indicators it can be said that the project over fulfilled the target values and thus contributed a great deal the funding programs objectives. Cultural exchange was very vivid and project partner institutions had good a experience of cross-border project. All the partners got new co-operators and the co-operation will be continued in the future between Finland and Estonia.

1.15 Main findings by project objective groups

At the chapter Research results are presented the outputs and actions how the project objectives have been fulfilled and achievement. In this chapter it will be

drawn a conclusion of how well or poorly the project succeed on the basis of research results and a rated questionnaire which almost all the partners took.

Experimental practices and research

Experimental practises and research got the grade 4 out of 5.

All the objectives of this group were realized in some form. Research was made at molecular level and at experimental level. Study tours were made to find inspiration and new ideas outside of the program area. Actions were made to increase demand on the market.

Particularly well succeeded actions in this group were workshops. Almost all the partners that have organised workshops emphasized the great success on participants and interest. In SRIK the workshops were often 20-30 people in every workshop and often one lecture had to arrange two or three times so that everyone interested can participate. According to project manager in SRIK natural materials are a new direction in building industry and people need objective information and that was what the project was providing. It wasn't information from the companies but independent knowledge and people trusted on SRIK's expertise. Many partners and co-operators have expressed their interest to continue workshop activities on their own.

The scientific research results are at sustainable basis. Results are public information and thus benefiting everyone who is interested and they can lead to follow-up actions. For example the research of natural materials in art therapy and in small children children's play will have follow-up actions. It is under discussion that educational film about art therapy will be translated to other languages and the book about small children play and natural materials will be used as educational material.

In this objective group only objectives that were planned didn't reach the expectations was the part of FFVI and developing new innovative methods. Results of the FFVI were very moderate. The co-operation with Estonian visually impaired craftsmen organisation wasn't achieved properly. According to

FFVI requests came from Estonia to Finland but any fruitful co-operations wasn't born.

Dissemination and reasserting know-how in different groups

Dissemination and reasserting know-how in different groups got the grade 4 out of 5.

In this group all the objectives were realized. Only about objective *To increase* and strengthen the know-how of the natural materials among different groups of society and between experts in both countries can't say if the actions truly achieved increasing and strengthening know-how but actions were made to implement this objective. This can be confirmed until after the end of the project.

Project participated on related events industriously and the project was regularly on display by newspapers and local television networks. Exhibitions were set up in stable place instead of a mobile exhibition because it was too difficult to arrange. The part of the touring infocar turn out to be smaller than what was designed. It was planned that the car would practice as touring restoration and natural material centre at events by students of restoration and the students would run the activities of infocar. But the degree of restoration was put down at TUAS during the project period and it was hard to find students who were willing to participate.

All the bigger planned publications were published and they will stay as a permanent result of the project. Finnish-Estonian ecological builders glossary was very popular ant it run out immediately after it was introduced at the Ökomäss eco fair. The main publication was printed 1000 pieces and about 200 pieces are undistributed at the time of writing this thesis. Book about natural materials use at teaching toddlers is used as educational material at Tallinn University as well as the educational film about natural materials in art tharapy.

Creating a network

Creating network got the grade 4 out of 5.

All the objectives in this group were realized. An active co-operation network was created and actors in this network will continue to work together. Natural material events were arranged some of the events will be organised from now on annually. Project participated in many Cultural Capital Year 2011 projects in Turku and Tallinn.

Almost all the partners were very happy about co-operation network created and they emphasize that co-operation with the other project partners was very fluent although nobody knew each others before. Some difficulties were linguistically and in communication. Every partner got new co-operators and connections at the field.

The events project organised reached large number of participants and audience. Most of the partners were very happy with Ökomäss eco fair and the seminars. It was noticed at the early stage that the three thematic groups (1.Ecological building, 2. Handigrafts, design and art, 3. Cultural Heritage) were too big groups to form and it was decided to form groups around one material for example reed or wool. At Milestone 2 was organised permaculture seminar which produced a independently working permaculture study circle and it was noticed that permaculture was waiting under surface to come into awareness of wider audience in both Finland and Estonia.

EC had internal problems to implement their tasks throughout the whole project. EC's executive manager was changed four times at the project period and that had an effect on implementation of tasks and the organisation left out of four Milestones because of this.

Storing information and preserving cultural heritage

Storing information and preserving cultural heritage 4 out of 5.

All the objectives in this group were realized. The databank of natural material know-how was created where is old and new knowledge preserved and documented in digital and written form and the information is available for everyone. The project has maintained our nation's cultural heritage, exchanged knowledge and brought new viewpoints to use natural materials in Finland and Estonia.

Updating databank was more bigger task than what was estimated and VKA and TUAS decided to share the role. At the databank there is natural material information, information about project activities and events, audiovisual material in popular form about old and new techniques and photo material about project activities. At the writing moment of this thesis the website was still work in progress. Website will be in the internet at least to the year 2015 and all the materials at the website are stored on a DVD.

Some problems occurred while investigating the experts in handicrafts. Some experts didn't feel good about sharing their unique expertise because they felt thet after the technique is shared knowledge their work is not special and it would affect negatively on their employment status.

All the partners were obligated to send material to the website but partners did this very moderately. Speculation is that when there is so much other work there is no time or desire to make additional reports.

1.16 Evaluation validity and objectivity

Research validity means the method's ability to measure exactly what is meant to measure (Hirsjärvi 201,. 231). This thesis answers the research questions and the research methods are demonstrated at previous chapters. The results have been strived to explain as clearly as possible and as openly as possible. The problem in validity is often reliability of research indicators and research methods and does the researcher use or read the indicators and methods "correctly".

The writer of this thesis has used several research material as a source to gain the results and answers. This increases the validity of research. If the researcher gets the same interpret based on different sources it can be presume that the interpret is correct. But it is also the question of that has the researcher interpreted the research results correctly.

At the interviews for this thesis there is possibility of misinterpretation. The interviewer and the interviewee did not often speak the same language as a mother tongue and that could have lead to wrong conclusions of what the interviewee have meant.

To the objectivity of evaluation can influence the fact that the evaluator is has been working in the project as a student assistant from the autumn 2011 to the end of the project. But the evaluation have been strived to do as objectively as possible. The objectivity can also be questioned on behalf of the interviews. Have the interviewes been as objective as possible when they have assess their own activities. The interview results began to show saturation point which means that after certain point nothing new significant didn't came up and the same issues began to arose. This indicates that there were no inconsistency between partners interviews and opinions.

The research has done by the chosen methods and chosen sources have been used as have been informed. According these activities can be said that the research is valid and the thesis has answered the research questions.

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Appendix 1. Objectives and Objective Groups of the Project ProNatMat

Objective group	Objectives
Overall objective	 Promote natural material know how in Southern Finland and Estonia. To increase the use of local natural materials in Finland and Estonia.
Experimental practices and research Dissemination and	 To research new materials to find a way to replace import from far-off lands. To develop new, innovative methods of using natural material and provide more ecological and healthier materials and products. To find new ideas and solutions of natural materials from outside program area. The increase demand for the market and potential for a new entrepreneurship in the local level.
reasserting know-how in different groups	 To increase and strengthen the know-how of the natural materials among different groups of society and between experts in both countries. To motivate people through residents association to get natural material know-how for their own well-being and for better environment. To inform and communicate everyman's possibilities to influence on the environment by using own creativeness and crafts.
Creating a network	 To create permanent and active natural material know-how network and a model of cooperation in Finland and Estonia. To arrange natural material events which promote natural material and restoration know-how and upraise the awareness of the natural materials and restoration in Finland and Estonia. To extend the content of European Capitals of Culture in 2011.
Storing information and preserving cultural heritage	 To create natural materials know-how databank where old and new knowledge is preserved and documented in digital and written form. Information is available for everyone. Maintain our nation's cultural heritage, exchange knowledge and bring new viewpoints to use natural materials in Finland and Estonia.

Appendix 2. Logical Framework Matrix of Project ProNatMat

	Intervention logic	Objectively verifiable indicators of achievement	Sources and means of verification	Assumptions
Overall objectives	What are the overall objectives?	What are the key indicators related to the OO?	What are the sources of information?	
	To promote natural material know how in Southern Finland and Estonia and increase the use of local natural materials.	By fulfilling the specific objectives the overall objective will be executed.	Progress reports Official indicators	Prevailing conditions remain as they are in organizations during project period.
Specific objective	What specific objective is the action intended to achieve to contribute to the OO?	Which indicators clearly show that the objective of the action has been achieved?	What are the sources of information that exist or can be collected?	Which factors and conditions outside the Beneficiary's responsibility are necessary to achieve that objective?
	1. Research and development of local natural materials. 2. Dissemination and strengthening natural material know-how. 3. Creating active natural material network. 4. Preserving old and new knowledge and maintaining cultural heritage.	1. Research reports, workshops 2. Courses, seminars, lectures, events, publications, newspaper articles, information campaigns, participation to events, 3. Meetings, cooperation's, courses, seminars, counseling, events, study tours, publications 4. www-portal, natural material know-how register, databank of natural material know-how, audiovisual documents about old and new techniques, educational films, video clips, photos and reports about methods and techniques.	Progress reports Documents Indicators Personal interviews	Available materials and staff. Events to participate, places to advert, media interest. Interested cooperators, events where to network. Information sources, a place where to preserve information.

Expected	What are the	What are the	What are the	What external
results	expected results?	indicators to measure whether and to what extent the action achieves the expected results?	sources of information for these indicators?	conditions must be met to obtain the expected results on schedule?
	1. Website with databank 2. Model of network 2. Model of network 4. Workshops and seminars, lectures 5. Publications 6. Exhibitions and touring info-car	 Number of articles at website Number of events, co-operations Number of research reports Number of workshops, seminars and lectures and number of participants i.e. activities Number of publications Number of exhibitions and touring info-car activities 	Progress reports Official indicators	A website Interested co- operators, events where to network Research material available Lecturers, places to organize events, materials Available writers or workers, publishing channel Exhibition space, a car availabe
Activities	What are the key activities to be carried out?	What are the means required to implement these activities?	What are the sources of information about action progress?	What pre- conditions are required before the action starts?
	1. Gathering knowledge about techniques, materials and ideas. 2. Cooperation activities between restoration centre's, universities and societies in FIN/EST 3. Scientific research and writing reports 4. Arranging workshops and seminars and international and local courses for experts and public. 5. Writing publications about natural material know-how 6. Preparing touring info-car, mobile and stable exhibitions, posters, postcards	Working hours Experts / additional partners / co-operators involved and hired Working space and equipments Meetings and seminars Working materials	Progress reports Outputs Official indicators Budget control	A need for international natural material know-how promoting Professional staff and interested partners Available funding

Appendix 3. Course Questionnaire for Participants and Instructors

ProNatMat-kurssikysely osanottajille

	ille kurssille olet osallistunut? Voit valita useamman vaihtoehdon, jos olet istunut useammalle kuin yhdelle kurssille. *
	Puupäivät Koroisilla: Puukengät hopeapajusta –työpaja, LUMO-keskus 16.1.2010
	Kevätpäivän sahaus, Haapapaanut-työpaja, LUMO-kesk
	Kevätpäivän sahaus, Sermit ja pajuaita, LUMO-keskus 16.4.2010
	Pärekattokurssi, Toijainen, 1924.4.2010
	Puistopuusta veistokseksi, LUMO-keskus 14.8.2010
	Sorkka-aitakurssi, LUMO-keskus 1718.9.2010
	Olkikurssi, LUMO-keskus 12.11.2010
	Tuohikurssi, LUMO-keskus 19.11.2010
	Kynttiläpaja, LUMO-keskus 3.12.2010
	Villakoulu, LUMO-keskus 2428.1.2011
	Keväinen puutapahtuma: Viikinkituoli-kurssi, LUMO-keskus 1617.42011
	Keväinen puutapahtuma: Risukurssi, LUMO-keskus 17.4.2011
	Kultelan savitiilikurssi, Somero 19.4-20.4.2011
	Huovutustalkoot, LUMO-keskus 19.7-3.8.2011
	Kasvista kuiduksi, LUMO-keskus, marraskuu 2011
2. Su	kupuoli *
•	Nainen
•	Mies

3. Ikä
Ikä
4. Asuinpaikka
Asuinpaikka
5. Mistä sait tietää järjestetystä kurssista/kursseista?
C Internetistä
O Ystävän kautta
 Sanomalehdestä
C Jostain muualta
6. Mikä sai sinut lähtemään kurssille/kursseille?
▲ ▼
7. Mitä opit kurssilla/kursseilla?

8. Oletko käyttänyt taitoja, joita olet oppinut kurssilla/kursseilla?



9. Oletko käyttänyt aikaisemmin kurssilla/kursseilla opetettuja tekniikoita?



10. Mitä mieltä olit kurssista/kursseista? Vastasiko kurssi odotuksiasi, oliko opetus asiantuntevaa, olivatko opetustilat toimivat, yms



11. Haluaisitko syventää oppimaasi?



12. Minkälaisille kursseille haluaisit tulevaisuudessa osallistua?



13. Kommentteja, risuja, ruusuja, ehdotuksia:



ProNatMat-kurssikysely ohjaajille

usea	mmalla kuin yhdellä kurssilla. *
	Puupäivät Koroisilla: Puukengät hopeapajusta –työpaja, LUMO-keskus 16.1.2010
	Kevätpäivän sahaus, Haapapaanut-työpaja, LUMO-kesk
	Kevätpäivän sahaus, Sermit ja pajuaita, LUMO-keskus 16.4.2010
	Pärekattokurssi, Toijainen, 1924.4.2010
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	Olkikurssi, LUMO-keskus 12.11.2010
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	Villakoulu, LUMO-keskus 2428.1.2011
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	Keväinen puutapahtuma: Risukurssi, LUMO-keskus 17.4.2011
	Kultelan savitiilikurssi, Somero 19.4-20.4.2011
V	Huovutustalkoot, LUMO-keskus 19.7-3.8.2011
	Kasvista kuiduksi, LUMO-keskus, marraskuu 2011

1. Mitä kursseja olet opettanut? Voit valita useamman vaihtoehdon, jos olet opettanut

8. Olitko tyytyväinen kurssin järjestelyihin? (materiaalit, tilat, käytännön järjestel	lyt,
tiedotus, yms)	
_	
T	
9. Mitä mieltä olit kurssista? Vastasiko kurssi odotuksiasi, olivatko oppilaat	
vastaanottavaisia, oliko opettaminen mieluisaa, yms	
▼	
▼	
10. Haluaisitko tulevaisuudessakin ohjata samankaltaisia kursseja? Jos haluat, nii	ın
kerro minkälaisia kursseja haluaisit opettaa?	
_	
$\overline{}$	
11. Kommentteja, risuja, ruusuja, ehdotuksia:	
11. Kommenteja, risuja, ruusuja, endotuksia.	
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▼	

Appendix 4. The Framework of Partner Interviews

- 1. Coordination / implementation
 - Own or organizations role in the project
 - Implementation of project plan
- 2. Work load
 - Appropriate amount of work / too much work
- 3. Sustainability
 - Challenges for sustainability
 - Follow-up actions after the project
- 4. Co-operation
 - How was the co-operation
 - How was the FIN-EST co-operation
- 5. Objectives
 - Most important objectives
 - How the objectives were accomplished
- 6. Assessment
 - What was surprising
 - Biggest personal challenges