



EUROPEAN  
COMMISSION

Community research

## **EU RESEARCH ON SOCIAL SCIENCES AND HUMANITIES**

### ***Gender and qualification***

***Transcending gendering features of key qualifications  
for improving options for career choice and enhancing  
human resource potential***

**Interested in European research?**

**RTD info** is our quarterly magazine keeping you in touch with main developments (results, programmes, events, etc). It is available in English, French and German. A free sample copy or free subscription can be obtained from:

European Commission

Directorate-General for Research

Information and Communication Unit

B-1049 Brussels

Fax : (32-2) 29-58220

E-mail: [research@cec.eu.int](mailto:research@cec.eu.int)

Internet: [http://europa.eu.int/comm/research/rtdinfo/index\\_en](http://europa.eu.int/comm/research/rtdinfo/index_en).

**EUROPEAN COMMISSION**

Directorate-General for Research

Directorate K – Knowledge-based economy and society

Unit-K.4 – Research in the social sciences and humanities

*E-mail: [rtd-citizen@cec.eu.int](mailto:rtd-citizen@cec.eu.int)*

# **EU RESEARCH ON SOCIAL SCIENCES AND HUMANITIES**

## ***Gender and qualification***

### ***Transcending gendering features of key qualifications for improving options for career choice and enhancing human resource potential***

Final report

**Project HPSE-CT1999-00020**

**Funded under the key action 'Improving the socio-economic knowledge base' of FP5  
Directorate-General Research**

#### **Coordinator of project:**

Bildungswissenschaftliche Hochschule Flensburg  
BIAT — Berufsbildungsinstitut Arbeit und Technik  
Gerald Heidegger

#### **Partners:**

Karen Evans, University of Surrey, School of Educational Studies, United Kingdom  
Eduardo Figueira, Academus, Consultadoria, Formação e Investigação, Lda  
Department of Research and Development (R&D), Portugal  
Anja Heikkinen, Department of Education, Finland  
Bikitas Pakitiniotis, University of Patras, Laboratory on 'Sociology and Education', Greece

## EUROPEAN COMMISSION

### RESEARCH

#### Directorate-General for Research

Director General: Achilleas Mitsos

The Directorate-General for Research is responsible for implementing EU level policies and activities in view of the development of the European Research Area. It initiates and implements the necessary Community actions, in particular the RTD Framework Programmes in terms of research and technological development. It also contributes to the implementation of the "Lisbon Strategy" regarding employment, competitiveness at international level, economic reform and social cohesion within the European Union.

**The Directorate " Social Sciences and Humanities; Foresight" Directorate K**, addresses key societal, economic and S&T challenges for Europe. It identifies and analyses major trends in relation to these challenges and examines them in the light of the principal EU strategic objectives and sectoral policies. The overall context for its work is the transition towards the knowledge based economy and society in Europe.

Within this overall framework, the Directorate provides a policy relevant research based capability executed through the promotion and management of research activities in the areas of social sciences, humanities and foresight, the exploitation of their results and its own analyses. In this way, the Directorate offers knowledge for policies (including RTD policies) while supporting the formulation of policies for knowledge.

*Scientific Officer: Virginia Vitorino*

*virgina.vitorino@cec.eu.int*

<http://www.cordis.lu/fp6/citizens.htm>, for information on Priority 7 – 'Citizens and Governance in a Knowledge Based Society' under the 6th Framework Programme.

<http://improving-ser.jrc.it/default/>, the database of socio-economic projects funded under the 4th and 5th Framework Programme.

***Europe Direct is a service to help you find answers  
to your questions about the European Union***

**Freephone number:**

**00 800 6 7 8 9 10 11**

#### LEGAL NOTICE:

Neither the European Commission nor any person acting on behalf of the Commission is responsible for the use which might be made of the following information.

The views expressed in this publication are the sole responsibility of the author and do not necessarily reflect the views of the European Commission.

A great deal of additional information on the European Union is available on the Internet. It can be accessed through the Europa server (<http://europa.eu.int>).

Cataloguing data can be found at the end of this publication.

Luxembourg: Office for Official Publications of the European Communities, 2004

ISBN 92-894-7558-7

© European Communities, 2004

Reproduction is authorised provided the source is acknowledged.

*Printed in Luxembourg*

PRINTED ON WHITE CHLORINE-FREE PAPER

## PREFACE

Within the Fifth Framework Programme of the European Union for Research and Technological Development (RTD), the Key Action *"Improving the socio-economic knowledge base"* carried broad and ambitious objectives, namely to improve our understanding of the structural changes taking place in European society, to identify ways of managing these changes and to promote the active involvement of European citizens in shaping their own futures. A further important aim was to mobilise the research communities in the social sciences and humanities at the European level and to provide scientific support to policies at various levels, with particular attention to EU policy fields.

Since the launch of the Key Action in 1999 more than 1600 research teams from 38 countries have been mobilised. While most important collaborative efforts involve researchers from EU countries, the participation of accession countries is already noteworthy with 189 research teams.

The three Calls for proposals of the Key Action Call *"Improving the socio-economic knowledge base"* addressed different but interrelated research themes which contributed to the objectives outlined above. These themes can be regrouped under a certain number of areas of major policy relevance, each of which are addressed by a significant number of projects from a variety of perspectives.

These areas are the following:

- ***Societal trends and structural changes;***  
*16 projects, total investment of 14.6 Million Euro, 164 teams*
- ***Quality of life of European Citizens,***  
*5 projects, total investment of 6.4 Million Euro; 36 teams*
- ***European socio-economic models and challenges***  
*9 projects; total investment of 9.3 Million Euro; 91 teams.*
- ***Social cohesion, migration and welfare***  
*30 projects, 28 Million Euro; 249 teams.*
- ***Employment, and changes in work***  
*18 projects; total investment of 17.5 Million Euro; 149 teams*
- ***Gender, participation and quality of life***  
*13 projects; total investment of 12.3 Million Euro; 97 teams*
- ***Dynamics of knowledge, generation and use***  
*8 projects; total investment of 6.1 Million Euro; 77 teams*
- ***Education, training and new forms of learning***  
*14 projects; total investment of 12.9 Million Euro; 105 teams*
- ***Economic development and dynamics***  
*22 projects; total investment of 15.3 Million Euro; 134 teams*
- ***Governance, democracy and citizenship***  
*28 projects; total investment of 25.5 Million Euro; 233 teams*
- ***Challenges from European enlargement***  
*16 project; total investment of 12.8 Million Euro; 116 teams*
- ***Infrastructures to build the European Research Area***  
*9 projects; total investment of 15.4 Million Euro; 74 teams.*

The insights and information that the reader will obtain in the following pages constitute the main scientific findings and the associated policy implications of the research project ***"Gender and qualifications: Transcending gendered features of Key qualifications for improving options for career choice and enhancing resource potential"***. The work undertaken by this project, which brought together 5 research teams in a collaborative

endeavour lasting 26 months, has certainly contributed to the advancement of knowledge particularly in the areas of **gender, participation and quality of life** and of **education and training**.

As the results of the projects financed under the *Key Action 'Improving the Socio-economic knowledge base'* become available to the scientific and policy communities, Priority 7 "*Citizens and Governance in a Knowledge Based Society*" of the Sixth Framework Programme of the European Union for Research and Technological Development (RTD) is building on the progress already made and aims at making a further contribution to the development of a European Research Area in the social sciences and the humanities.

I hope readers find the information in this publication both interesting and useful as well as clear evidence of the importance attached by the European Union in fostering research in the field of social sciences and the humanities.

A. SORS  
Acting Director

## Table of Content

0	Abstract.....	8
1	Executive summary.....	9
1.1	Introduction .....	9
1.2	Research objectives .....	9
1.3	Methodological Design .....	11
1.4	Results .....	12
1.4.1	To develop a common concept of research .....	13
1.4.2	Contribution of actual VET practises to ongoing gender segregation by enhancing gendered key competences .....	15
1.4.3	Relation of “typical” key competences to gender .....	16
1.4.4	Conditions for the reproduction of gender segregation due to gendered features of key competences.....	17
1.4.5	Conditions for the development of key competences beyond gender segregation	18
1.4.6	Gender specific strategies in the approach to situations of occupational change	19
1.5	Recommendations .....	20
2	Theoretical background and objectives of the project .....	22
2.1	Background .....	22
2.2	Innovative approach .....	23
2.3	Gender and Key Competences – Segregated Discourses?!.....	23
2.3.1	The Discourse on Key Competences.....	24
2.3.2	The Discourse on Gender Relations.....	25
2.4	Problems addressed .....	27
2.5	Objectives.....	28
2.6	Summary .....	30
2.7	References .....	31
3	Scientific description of the project results and methodology.....	35
3.1	Analysis of Research.....	35
3.1.1	Introduction .....	35

3.1.2	Literature research .....	35
3.1.3	Empirical research .....	36
3.1.4	References .....	37
3.2	Methodology: Culturally embedded actor-based approach to gendered core competences .....	37
3.2.1	Gender as an attitude? .....	37
3.2.2	Gender, work, occupation, competences and skills as cultural concepts .....	38
3.2.3	Researchers as actors: discourses on education, competences and gender .....	41
3.2.4	How to research: sites, spaces and timing of practices of gendering skills and competences .....	42
3.2.5	Why transcend: Is gendering ethically right or wrong? .....	44
3.2.6	Methodological challenges and visions for future research .....	45
3.2.7	References .....	46
3.3	Description of results with respect to three target groups .....	47
3.3.1	Description and analysis of “Typical Cases” .....	51
3.3.2	Gender and Qualification` - The importance of the exceptional cases for the project .....	59
3.3.3	Career Changes and Gender .....	67
3.4	A model of key competences - An approach for the “Genderqual” project.	74
3.4.1	The concept of “key competences” .....	74
3.4.2	A model of personality .....	75
3.4.3	First set of perspectives on the model of personality .....	77
3.4.4	Second set of perspectives on the model of personality .....	78
3.4.5	Focussing the model on the Genderqual project .....	79
3.4.6	Gender-specific key competences .....	80
3.4.7	Conclusions .....	81
3.4.8	References .....	82
4	Conclusions and policy implications .....	84
4.1	Recommendations for policy makers and practitioners in vocational education and training and continuous vocational training .....	84

4.1.1	Introduction .....	84
4.1.2	VET and labour market practice.....	85
4.1.3	Policy making.....	87
4.1.4	Social life.....	87
4.1.5	Research .....	88
4.1.6	References .....	88
4.2	Genderqual: Necessities – Possibilities - Limits .....	89
4.2.1	Necessity - How necessary is it to transcend gendered features of Vocational Education and Training ?.....	89
4.2.2	Possibilities – What is it possible to change through Vocational Education and Training ?.....	90
4.2.3	Limits.....	91
4.2.4	References .....	91
4.3	Reflections on the Research Process .....	92
4.3.1	Introduction .....	92
4.3.2	The meaning and position of gender .....	92
4.3.3	Career women – Exceptional cases .....	93
4.3.4	International research on competencies and skills .....	94
4.3.5	Learning from the Genderqual project .....	95
4.4	Conclusion.....	97
5	Dissemination and exploitation of results.....	100
6	Acknowledgements and References .....	104
7	Annexes .....	110

## 0 Abstract

*Anke S. Kampmeier*

Gender and Qualification – Transcending gendered features of key qualifications for improving options for career choice and enhancing human resource potential – shortly named Genderqual – was a project of the Fifth European Framework Programme. The project aimed at investigation of the impact of gender segregation of European labour markets on vocational education and training, with special regard to key (core) competencies/qualifications. A special emphasis lay on the exploration of differences between women and men in view of the development of gender specific key competencies or in view of their existing sets of key competencies in situations of occupational change.

Empirical data of 270 interviews, observations in VET institutes and at workplaces and extensive content analyses of job advertisements, curricula, brochures etc. confirm the thesis that “gender matters” in view of the individual in terms of the development of key competencies, in terms of occupational choice and in terms of personal development. But empirical data also reveal “gender blindness” in VET institutes and at workplaces in view of positively and constructively considering gender differences for vocational education and training and for work.

Sources for the development of gender-typical key competencies are varied: personality and actions of the individuals, the cultural background, the structure of vocational education and training and the structure of the labour market, but above all socially ascribed gender stereotypes, which are not only social constructs but are lived experiences of individuals have a more determining influence. This conclusion bases on the interview-statements of “exceptional cases” (women and men in gender-untypical occupations) and of other interviewees who were asked about competencies of men and women in gender-untypical occupations. Accordingly men and women often choose gender-typical occupations due to social expectations or social “normalcy” and consequently develop or train gender-typical competencies and key competencies. Thus gendered key competencies are getting intensified by gender-typical occupations and gender segregation gets reconstructed, because occupational tasks and requirements influence the performance and practise of key competencies.

Transcending these stereotypes and gender-blindness to a gender-sensitiveness can contribute to transcend gender barriers of VET and labour market and thus contribute to enhancing human resource potential. Gender differences should be used for the benefit either of the individuals, for vocational education and training itself (lessons), for the benefit of the VET institutions and for the benefit of the enterprises. Gender differences should not be polarised but each individual must have equal opportunities for occupational choice and career (gender autonomy).

# 1 Executive summary

*Gerald Heidegger*

## 1.1 Introduction

Gender and Qualification – Transcending gendered features of key qualifications for improving options for career choice and enhancing human resource potential, shortly named Genderqual – was a project of the European Fifth Framework Programme. The project aimed at investigating the impact of gender segregation of European labour markets on vocational education and training, with special regard to key (core) competencies/qualifications. A special emphasis lay on the exploration of differences between women and men in view of the further development of gender specific key competencies or in view of their existing sets of key competencies in situations of occupational change.

The aim was to detect possibilities of how members of both sexes could be supported in acquiring features of key competences, normally associated with the opposite gender, during vocational education and training (VET) or later on during their work life, especially regarding courses of continuing vocational training (CVT). In that way people could be given more opportunities to develop their individual characteristics and follow an occupational pathway which suits them best, thus strengthening their individual autonomy. At the same time, this should lead to enhancing the human resource potential not only for the economy, but for society as a whole. The partnership included researchers from different countries, each representing a particular cultural and societal context. Research was carried out in

- UK (representing the market-oriented society),
- Germany (representing the strongly structured labour market in central Europe),
- Portugal (representing the strong modernisation of southern European countries),
- Greece (representing a society which still values highly traditional characteristics),
- Finland (representing the Nordic welfare state).

The partners aimed not only at comparing features of the research question as expressed in the title of the project. Above that, by way of “mutual learning” it was intended to gain hints from the other cultures as how to improve the respective own system, thus representing a European added value.

## 1.2 Research objectives

The research objectives are outlined in the proposal:

1. *To develop a common concept and understanding and to set up the cornerstones of the research.*

This applies to the concepts of gender, of key competences / qualifications, to their relation during adolescence and later on, and to the societal and cultural conditions represented by the partners' countries.

2. *To examine the contribution of actual VET practices to ongoing gender segregation by enhancing gendered key competencies.*

It was analysed if and how VET practices increase the gap between “typical” male and female key competences by looking at two fields of occupations, one dominated by women and the other dominated by men, namely nursery nurses and electricians. For that sets of key competences were empirically determined which can be particularly related to these occupations and thus tentatively more to female or to male trainees or employees. In addition a gender mixed occupation was chosen to explore if gendered VET practices can be detected: That one was an occupation in the catering services, mainly waiters and waitresses.

3. *To find out about the relation of “typical” key competences to gender.*

It was analysed if the occupation–related particular key competences detected according to objective 2 may be, to a certain degree, connected with more general gendered features of key competences. This question was related to age 16 to 19 (VET) and later on in life. In theoretical respect a model for researching into gender–related features of key competences was developed which should permit this analysis.

4. *To investigate the conditions for the reproduction of gender segregation due to gendered features of key competences.*

Based on the comparison of the results according to objective 2 it was assessed how and to which extent key competences related to gender tend to (re)produce gender segregation. This can be due to gender-specific career choice, or to gender-specific recruitment practices, both possibly partly based on gender-specific key competences. In addition, gender-specific VET practices can build a “bridge” between these two aspects. Therefore this was evaluated

- from the employees’ (individuals’) perspective, assessing how and to which extent “self images” contribute to the reproduction of key competences related to gender,
- from the VET and CVT teachers’ and trainers’ perspective, assessing possible gender-specific training practices,
- from the employers’ perspective, assessing to which extent employment practices of personal managers and/or occupational requirements tend to (re)produce gender segregation.

5. *To explore conditions for the development of key competences beyond gender segregation.*

For this objective especially so called “exceptional” cases were analysed, that is men working in female dominated occupations and vice versa. It was explored

- to which extent men and women trained or working in occupations dominated by the opposite sex tend to (further) develop other key competences than those who are attached to occupations dominated by their own sex,
- to which extent they make use of these other (additional) key competences, also with respect to their personal development,
- to which extent those (additional) key competences influence their occupational career.

6. *To explore gender specific strategies in the approach to situations of occupational change and the impact on the performance in the labour market.*

It was analysed

- whether there are differences in coping with situations of occupational change, particularly if occupational changes are perceived as an opportunity for further developing one's personality ("self-competence"), and if so,
- whether the differences can be related to gender-specific key competences and
- to which extent they contribute to a better performance in the labour market.

Particular attention was given to "women returners", women returning into the labour market after a "family phase", interrupting their work biography.

7. *To design recommendations for transcending gender barriers in the European VET systems with regard to key competences.*

These recommendations address VET practitioners and policy makers and also personnel managers responsible for recruiting staff. It turned out that transcending gendered features of key competences should mean that VET should support the autonomous development of one's individual personality and thus allow for more opportunities to pursue a career path which suits one best. This should be the aim for both sexes.

### **1.3 Methodological Design**

Research was carried through by hermeneutical and empirical methods.

Secondary analyses of national and international literature were done concerning

1. gendered structures of respective national VET systems and labour markets;
2. VET related gender studies including
  - historical, cultural and economic preconditions and
  - especially regarding the state of research on career orientation and gender,
3. the state of the art of the national discourses on key qualifications and
4. a synthesis, elaborating commonalities and structural differences of the participants' countries and of the views of the respective researchers.

Concerning the empirical part current VET practices and their relation to gender segregation and gendered key competencies have been analysed. To determine sets of related key competences the following tasks have been carried out:

- observation of classes in vocational schools,
- observation of work places,
- interviews with apprentices, VET students, trainers, teachers, employers, employees and
- analyses of VET curricula, ads for recruitment, brochures informing about VET and labour market opportunities for the respective occupations.

It should be noted that this qualitative research design has, as always, both advantages and disadvantages. To start with the latter, there remains the problem of reliability of the results or even – as far as this might be sensible at all for the problem at hand – objectivity because the problem is tackled from the view of the persons involved (including the

researchers themselves). The reason for this, representing the advantage, is that it is assumed that their view as expressed by themselves is a main factor explaining how people actually behave and carry through their tasks, even if those views are determined by prejudices. On the other hand, it might be that subconscious feelings may be equally or even more important. It appears to be nearly impossible to find out about these by way of interviewing people, particularly in such a sensitive area of life as represented by gender issues. In addition, it may well be that the interviewees did not always give away their real (conscious) views because they thought them not to be politically correct. This may explain many of the discrepancies which have been found during the empirical research. This restriction was in part counteracted by observing VET and work practices. At least that provided the researchers with a deeper understanding of the situational context in which the interviews were carried through.

The “structural” determinants (like “objective” recruitment practices in the labour market, earnings, child-care provided, opportunities for working part-time etc.) have not been empirically inquired into as they were not included in the objectives of the project.

The findings are based on all together 242 interviews in the five partner countries:

- 100 interviews with apprentices, students, employees, employers, teachers and trainers of the three chosen occupational fields. The Greek partners added further interviews with customers to their data collection.
- 15 exceptional cases (male nursery nurses and female electricians) and
- 127 interviews with occupational changers. The Finnish partners also made additional group discussions with (adult) teachers.

In addition to that all partners made observations in VET schools and at work sites and made content analyses of ads, brochures and other information material about the occupations.

## **1.4 Results**

The results are ordered according to the sequence of the objectives as outlined above.

One of the most important and interesting outcomes is that the differences between the partners’ countries proved to be much smaller than expected, as far as the narrow objectives of the project are concerned (transcending gendered features of key competences). This could be concluded in spite of the rather different historical developments of industrialisation and the concomitant societal developments. This overcoming of prejudices regarding the relation of gender and key competences within and between the participating countries represents the most remarkable core of the outcomes of the process of mutual learning during the project’s lifetime. Of course one has to bear in mind that the project could not probe very deeply into the underlying cultural consciousness.

The similarity does obviously not, however, apply to the “hard facts”, that is female and male share of employment and the level of gender segregation currently prevailing in the labour market. Nor does it apply to the legal frameworks protecting people in the labour market or the state’s role in providing pre-school child -care or redistributive services etc. But this is not the focus of the Genderqual project.

In particular, it turned out that the high valuation of affirmative action in a Nordic welfare state does not lead to significantly different results, with regard to the research objectives, as compared to southern Europe. Nor did the existence of a market oriented economy or a strongly regulated labour market and VET system influence the outcomes to a

remarkable degree. This led to the most important overall recommendation: To aim, by means of VET and CVT, not at equalising the numbers of people from either sex in each occupation, as it had been proposed by former projects under the heading of “women into male occupations”. Rather, the aim should be supporting “gender autonomy” as will be outlined later.

#### **1.4.1 To develop a common concept of research**

On the theoretical level, this turned out to be rather difficult because the partners held views which were often in variance. This is due to

- different disciplinary approaches as the researchers were specialists in more general educational research, VET research or sociology;
- divers cultural approaches, including the difficulty to translate the respective national concepts of gender and key competences into English, being the working language;
- divers views about the meaning of these concepts based on differently balancing the underlying theories.

Nevertheless, during the two years of rather close collaboration the partnership arrived at working concepts which allowed to agree to a considerable degree on the outcomes as far as the objectives of the project are concerned. It should be kept in mind, however, that the different approaches also led sometimes to divers interpretations of the empirical outcomes. But this also means that the project could profit from these various opinions by opening up a wider horizon and preventing the results from being biased by just one single perspective. In view of the diversity of European cultures this should not weaken, but quite on the contrary very much strengthen the European added value.

#### *Gender approaches*

In general the development of individual personal traits is assumed to result from a dialectical process of socialisation and individuation. This personal development process itself happens in a dialectical tension of innate predispositions and influences resulting from dealing with the (physical and social) environment.

For the objectives of the Genderqual project, it is not necessary to go into the heated debates about “nature or nurture” and not even into the discussion about the relative influences of socialisation and individuation during childhood. One reason for that is that there will never be a clear-cut distinction between “male” and “female” competences, but rather a wide distribution of them across the two sexes with probably a very large area of overlapping. The second reason for not going into these debates is that the objectives of the project are more modest. It deals with the possibilities of reducing gender differences during adolescence and later on in life, with regard to career choice in the course of VET and occupational success afterwards, when it comes to people trying or being compelled to change their occupational career track, due to external challenges like having been laid off – or to internal alterations of one’s own objectives in (occupational) life. It was assumed, at the start of the project, that in the course of the two interwoven dialectical processes, just described as representing the personal development, at the age of 16 there are indeed to be found gender differences with respect to key competences. As the respective chapters in this report show this assumption has been confirmed by the project outcomes, although not to the extent which could have been expected from the actual gender separation in the labour market and from data concerning extremely gendered occupational preferences as uttered from representative samples of the two sexes.

In this context, theories about attributing predominantly gendered traits to persons have also been taken into account, including the “doing gender” approach.

### *Key competences*

There is no unified understanding of key qualifications or key competencies in Europe. In some of the participating countries there even are no special terms for differentiating between skills, qualifications or competencies. If terms like those do exist, their meanings differ even within the countries and more so between the different countries. All in all there exists a wealth of terms with different definitions for the phenomenon describing skills or competencies whose meaning goes beyond the one in view of specific occupational tasks: key/core skills/qualifications/competencies. It was agreed to use the term „key competences“ which, however, have to be specified to make clear the meaning of this concept.

According to the distinction between competence and performance, established in linguistic theories, competences is meant here to designate the “inner abilities” of a person. They form a whole “compound” of interacting dimensions, which means that they

- cannot be clearly separated from one another,
- cannot be measured directly (in contrast to performance) .

Key competences are therefore different from e.g. “key skills”. They

- are developed very much through non-formal and informal learning,
- cannot be learned independently from concrete tasks,
- cannot be taught directly,
- have to be acquired autonomously.

The acquisition of (key) competences does not only refer to the question “What can I do?”, but it is also related to attitudes and values, that is to the question “What do I want to do?” Both aspects are closely interwoven because the ability to do something depends very much on the willingness to do so and vice versa. It is therefore sensible to relate both aspects not only to the theme of acquiring (key) competences but to look at them as two interconnected dimensions of the competences themselves. Similarly, the question “What am I allowed to do or forced to do?” is also of great importance. This is meant to indicate that the willingness, and therefore also the ability, to do something depends on the (social) circumstances under which somebody tries to perform a task. “To be allowed to do” is closely connected to the question if one is expected to do something, that is what the social environment views as appropriate behaviour. This appears to be particularly important for the development of gender specific key competences.

### *Key competences and gender*

In order to assess the outcomes of the interviews and observations a model of key competences related to gender was developed. It is based on the approach of pedagogical anthropology worked out by Heinrich Roth (1971). Roth subdivides personality into three crucial dimensions: self competence, social competence and subject-matter related (or in our context work-content related) competence. For the research work in this project mainly the first two competences – self and social competences – are of great importance. They include issues like insight into and acting in accordance with attitudes and values (self competences) and insight into and developing social relations through at the same time critical and constructive communication and co-operation (social competences). These dimensions can be viewed from different perspectives where four are important for underpinning the search for gender differences:

- societal perspective: societal influences, taking into account also possibilities to counteract them;
- occupational perspective: improving opportunities for gainful employment in view of conditions of the current labour market;
- activity related perspective: managing complex and often multiple requirements, time-management, decision-making;
- subjective perspective: cognitive and emotional striving for self-actualisation and happiness.

These four perspectives, regarding the two dimensions of personality (self-competences, social competences) taken as the important ones for the project, have been used in analysing the outcomes of the empirical research, although often in a more implicit way. This is due to the fact that they only evolved during the ongoing research process so that the findings in the national reports are usually not explicitly ordered according to this scheme. In addition, the partners with their distinct cultural embeddedness and their varying scientific orientations used specific approaches which, however, can be reconciled with the model just presented. In particular, the question as how far gendered features are only attributed to people, and not “really” actualised by them, remained an issue of dissent. It should be stressed that, by way of giving the “self-competences” a particular relevance, attitudes and values are prominent in this model. In this way it is able to “capture” the aspects which proved to be of particular significance for gendered features of key competences.

#### **1.4.2 Contribution of actual VET practises to ongoing gender segregation by enhancing gendered key competences**

This was examined by comparing the VET practices in “typical cases”, that is

- men in the male dominated occupation of electricians,
- women in the female dominated occupation of nursery nurses,
- both sexes in gender-mixed occupations in the catering trade, mainly waiters/waitresses.

For the two occupations with a clear affiliation to gender the learning was of course different according to the rather diverse work-related tasks, thus provoking different work-related competences. In the interviews this was sometimes concealed by the fact that it was taken for granted and therefore apparently not worth mentioning. For instance, knowledge of facts about electricity was often not referred to by electricians while knowledge about “human nature” was stressed by some nursery nurses, probably because it is up till now not always explicitly demanded. The main key competences which are been stressed as being important for the respective VET practise, if interpreted according to the outlined model, presented the differences which are customarily expected.

The female nursery nurses expressed very much the aspect of “caring for others” including a whole wealth of competences to be associated with it (tolerance, benevolence etc.). In contrast the male electricians stressed the importance of independence in work, including also problem solving, ability to explain, engagement etc. On the one hand, it may be surprising that the difference between these aspects is still so strong, representing in the first instance the societal perspective, that is the public image of the occupation.

On the other hand, also aspects which do not belong, at first sight, to the public image of the occupations were frequently mentioned. This relates to initiative, organisation, reflecting oneself etc. for nursery nurses while kindness, fantasy, teamwork, in general the ability to deal with people were mentioned for electricians. Thus the outcome is that VET practices indeed support gendered key competences, although to a much lesser degree than the public image of the occupations may suggest. This result was confirmed by the examination of the VET practices for waiters/waitresses. It was emphasised that there are no differences in dealing with female or male trainees. This was confirmed by trainees, trainers and employers. A distribution of work could however, sometimes be observed, leaving the physically heavier tasks to men and tasks like decorating tables etc. more to women. In advertisements for recruiting employees it was sometimes mentioned that waitresses should be good looking, a feature which could not be found regarding waiters.

In view of the partly different, partly complementary and partly overlapping key competences which have been exposed by the interviewees, and also fostered in VET, it appears to be advisable to further mutual learning of boys and girls in order to broaden the scope of their key competences, perhaps also in mixed courses which encompass both, male and female dominated occupations.

### **1.4.3 Relation of “typical” key competences to gender**

First it has to be stressed that differences between the sexes in view of key competences (gendered key competences) are meant as key competences which are typical either for women or men because they are more often performed or perceived by or expected from women or men in contrast to the other sex. Gendered key competences are not meant as specific features of one sex. Specific features of one sex would imply a determining influence of an unchanging (biological) nature, whereas typical features are open for a great variety and for changes. Typical features also imply the dependence on cultural, ethnical, economic, educational and family conditions. After all, we are all human beings and have therefore very much in common. The outcomes of the project confirm that most features of “gendered key competences” expose a very large area of overlapping between the two sexes. However, the model of key competences may give some hints as how to interpret the differences described above.

It appears to be especially the “self competences”, the insight into values and the development of respective attitudes, which make a difference. Particularly in the subjective perspective, different values and attitudes could be detected for the two sexes. Women and men have still often rather different predominant expectations with regard to their self-actualisation in their future occupational life. This can be already seen by looking at statistics regarding occupational choice. But it is also confirmed by the mentioned differences of the key competences which have been analysed in the previous section: for women caring for others is very important as is independence for men.

Of course, here the societal perspective comes in: these “self images” are corresponding to the public images of the two occupations, and also to the “far images” of the sexes, that is the prejudices the two sexes hold with respect to the respective other one. It is to be surmised that the societal influences play an important part informing those self-images. The interviews, however, provided only weak evidence for this. One reason might be that these influences are so obvious that the interviewees did not bother to mention them.

In addition, the occupational perspective appears to be important especially for explaining the career choice. It may be presumed that people tend to stick to the usual because they think that it is easier to follow a conventional path. Again, however, the interviews did not

support this argument. Most people quoted interest in and even fascination for the occupation as an important factor influencing their occupational choice.

It appears to be prudent to take the self-images as expressed by the interviewees serious and not to dismiss them merely as self-deception.

The gender-mixed occupation shows, however, that there are nowadays opportunities to seek self-actualisation and to expect acceptable career prospects within the same occupation for both sexes. Statistically this kind of occupations has become more numerous, particularly in the area of middle-level business and administrative occupations which render often a pay above average.

#### **1.4.4 Conditions for the reproduction of gender segregation due to gendered features of key competences**

Looking at the statistics, it is obvious that gender segregation in the labour market has not been considerably reduced during the last decades, as far as “typical” male and female occupations – like electricians and nursery nurses – are concerned. (However, it has already been mentioned that the area of gender mixed occupations in the field of business and administration has heavily expanded.) This holds also for the Nordic countries in spite of the strong measures of affirmative action which have been implemented there.

One should surmise that this fact is equally strongly reflected in the views of the people concerned (trainees, employees, trainers, employers). For this argument it would not matter if these views may be strongly influenced by societal prejudices (“societal perspective”). Important is rather what people actually think about this issue. (Obviously, other “objective” factors like earnings, possibilities for part-time work etc. have to be taken into account, too). The interviews provide, however, only feeble evidence for these deliberations. True, some interviewees uttered comments like “nursery nurse is a female job” and “electrician is more a men’s job”. This was also often related to the (supposedly) different key competences where again the self competences, attitudes and values played the most important part, complemented by social competences. But the majority of the interviewees, in all partner countries, also could not see strong reasons why members of the opposite sex should not be able to work effectively in an “atypical” occupation. This is a rather startling outcome because it shows that the explicit assessment of different key competences (or prejudices, for that matter) does not play a part as important as is usually suspected. This can be clearly illustrated when taking into account the German outcomes.

Questions about „which occupation fits in with men and women”, „are men better electricians than women”, „can men be good nursery nurses” etc. rendered two groups of opinions: Group A holds the opinion that there are no or need not be differences between the sexes with respect to successfully working in every occupation. Group B holds the opinion that there are clear differences between the sexes concerning occupational abilities.

Two thirds if the interviewees represent group A. But a lot of the members of this group also found it quite adequate that the strong gender separation still continues to exist. (However many of them expressed the wish that there may be more members of the “atypical” sex at their workplace because it is thought to improve the work atmosphere.) Accordingly, they could usually not give an explanation for the existing gender segregation. One reason could be that they just answered according to the (supposed) social expectations. The cliché of strongly gendered (key) competences has to be denied. Another reason may be that there do exist two rather different images in the mind of those people alongside each other. The societal perspective leads to taking things as they are

whereas the subjective perspective takes individual traits and wishes (regarding self competences and also social competences) more into account. However, whilst one is prepared to accept atypical choices one is, at the same time, quite content with the own typical behaviour.

Group B, one third of the interviewees, can be divided into two subgroups. The great majority of them (ca. 90 per cent) hold the opinion that there are clear differences between the key competences of men and women. But they add that times are changing and it could be different in the future, but they themselves could not really imagine. Only about 3 per cent of all interviewees hold the opinion that in any case only men can be good electricians and women are much better in caring for children in a kindergarten.

On the one hand this outcome is very promising for the endeavour to transcend gendered features of key competences. There seems to be no resistance from the people involved. On the other hand it appears to be difficult to derive from these outcomes recommendations for altered VET practices. After all, most people seem to be quite happy with the state of affairs. One may attribute this attitude in part to a “gender blindness” or “gender tiredness” in view of the many programmes of affirmative action in the past.

The just reported findings were taken mostly from the interviews with apprentices, trainees and employees. But very similar outcomes were produced by interpreting the opinions of teachers, trainers and personal managers or employers.

#### **1.4.5 Conditions for the development of key competences beyond gender segregation**

The “exceptional” cases, that is men working or being trained as nursery nurses and women in the occupational field of electricians provides extremely valuable information for this theme. These people have a “near image” of the situation, they know about gender differences from their own experiences: They can therefore compare these with the “far images”, the public opinion held with respect to gendered key competences. They are aware of the gender-blindness and gender-tiredness in VET institutions and at the workplace. They also recognise much more than the “typical cases” that indeed gender-“typical” behaviour and gender-“typical” key competences can be observed during training and at the work place.

It was found that these “exceptional” people indeed expose different key competences, according to the model described, as compared to the “typical” cases.

Most “exceptional” young people had developed non-typical interests during their childhood, that is particular self-competences. These were further developed during their training as female electricians and male nursery nurses. They were also sometimes treated differently as compared to their counterparts from the opposite sex. Trainers thought that female electricians trainees are tidier and more industrious than men, but they also sometimes thought them to be not so keen with respect to logical thinking and technological creativity. But all in all the female trainees felt to be rather well accepted.

Male nursery nurses opted often more to focus on playing with the children, particularly also during outdoor activities. Their female counterparts more often choose – or were urged – to do the basic caring. Apart from societal influences with respect to prejudices about gendered key competences (societal perspective) this may also be due to aspects related to the activity related perspective: self competences and social competences are thought to relate more to caring for women and more to challenging activities for men.

In contrast to the opinion of the above mentioned group A (“everybody can do everything”) the exceptional people felt that they had to overcome rather strong reservations and sometimes prejudices on the part of employers and colleagues, but also of family and

friends. A special problem is still that they have to struggle to assert their gender identity in view of those prejudices. All interviewees wished to live a gender-“typical” life and the older ones had already achieved that.

But the evidence suggests that overcoming the barriers in atypical training and employment requires particular resilience and much determination. Therefore it is no wonder that it was reported that a lot of young people leave an atypical training at an early stage because they find learning and working environments insupportable, through a mixture of attitudes and conditions encountered. Those people, however, who succeed appear to be more conscious about their occupational choice and thus sometimes more engaged. That is, they make use of their additional key competences, especially regarding their personal development, and that enhances their occupational career. They prove to expose “gender autonomy”, and recommendations should aim at supporting them.

#### **1.4.6 Gender specific strategies in the approach to situations of occupational change**

The most important outcome was that dealing with occupational change depends very strongly on the motivation for that. This can be more due to external circumstances, like being laid off or removal due to marriage, necessity to re-enter the labour market after a family phase (for our sample: only women) or adapting work conditions to supporting elderly parents. On the other hand, inner motivation can arise from the wish to improve one’s work situation, either looking for work which is better paid or which is more intrinsically rewarding and creative.

Members of both sexes showed a great and rather similar variety with respect to the relation of external factors forcing them, or inner motivation to change the occupation. In the first case, the satisfaction with the new job was, as can be expected, much lower than in the second case. Low job satisfaction leads usually also to low identification with the job and proved, in this way, to point to low “occupational identity” which is part of what is called, in the competence model, “self competences”. Although the reasons were, due to the different economic developments, rather divers in the various countries, in general the external factors for changing the occupation were found to be dominant and thus self competences like self-assurance or self-esteem were not supported. It was, however, reported that the broader experience provided by occupational changes could be useful. But this applies predominantly to “near transfer” where the profile of the new occupation is close to the former one’s.

The interviews did not provide evidence that women may more easily adapt to externally enforced occupational changes as is sometimes surmised because they are thought not to cling so much to an occupational career which has been planned and developed during early adult life. This may be due to the fact that most of them declared to be rather dissatisfied with their new job.

The remarkable exception was represented by women returning into the labour market after a family phase. This was particularly articulate in the German sample, but possibly due to a non-representative selection of the interviewees. Another reason may be the strong structuring of the occupational system in Germany which supports occupational identity. These women reported a strong inner motivation, high interest in the new job and therefore a rise in key competences, supporting the expectation that they may perform in the labour market rather well.

## 1.5 Recommendations

The recommendations aim, according to the project's clear cut objectives, at transcending gender barriers in European VET systems with regard to key competences. Therefore they do not focus on the macro-level, that is general societal or economic conditions, like status of "typical" female and male occupations and the concomitant pay differentials. Of course, these influences have to be kept in mind, and because of their importance they have also to be taken into account when it comes to the narrower aim of transcending gendered features of key competences. In addition, it was not the aim of the project to enquire into the reasons for developing gender-"typical" key competences during childhood. Rather, it was analysed if gendered features of key competences can be identified during early adulthood. These differences have been established by the outcomes, although not to the degree one might have expected in view of the rather strong gender separation in the labour market.

In general, the project's outcomes lead to the recommendation to strengthen and support gender autonomy. Gender autonomy is a special part of individual autonomy which itself is the core of "self competences" according to the competence model employed. With regard to occupational life the ability to pursue individual autonomy is sometimes called "competence to 'shape' one's own occupational biography". Independent of gender, this should be the aim in furthering key competences, especially self competences and also social competences. Gender autonomy then represents a special case for this, although one of great importance. It means that everybody, regardless of gender, should be given the opportunity to shape one's career path according to individual predilections, as far as possible. It is a significant outcome of the Genderqual project that supporting gender autonomy should be at the centre of improvements regarding gender segregation in the labour market – and not trying to find ways of equalising the numbers of people from each sex in each occupation.

To further gender autonomy then relates to two aspects:

- the individual level,
- the level of VET systems and recruitment practices in the labour market.

On the individual level people should be encouraged to further develop relevant key competences, particularly self competences connected to self-assurance, that is

- to try to become aware of one's own key competences beyond usual prejudices,
- to call in question the conventional perceptions of what is a male or female occupation,
- to dare to make "atypical" occupational choices,
- to develop perseverance in order not to give up at an early stage of an atypical career.

On the level of VET systems and recruitment practices it is important to provide this encouragement for all people, instead of reinforcing barriers, e. g. through recruitment practices according to gender stereotypes. In addition, it is of particular significance to support people of either gender who intend or have decided to choose an occupation which is atypical for their sex.

In VET (including training in companies) this means

- to counteract gender blindness and gender tiredness, as this is a major barrier for the "exceptional cases",

- to give opportunities to work in gender-mixed classes,
- to provide mentoring by people who have themselves made an atypical choice,
- to be aware of prejudices regarding gender-“typical” key competences.

These recommendations address VET practitioners and personnel managers responsible for recruitment. Because the focus is on key competences this level of micro-policies is particularly important. As far as policy making on a meso-level is concerned, it has to provide the framework conditions for that. This includes, for the narrow objectives of this project, especially training of teachers and trainers and informing personnel managers. In addition, general conditions which are not at the centre of this project are nevertheless of utmost importance, like setting wages according to gender equity, provisions of childcare, parental leave etc.

Still, the outcomes of the Genderqual project point to the great relevance of addressing, though the concept of “gender autonomy” , features of key competences for improving options for career choice and, in this way, enhancing human resource potential.

## 2 Theoretical background and objectives of the project

*Beatrix Niemeyer*

### 2.1 Background

In spite of many years of affirmative action the structures of labour markets and work life in the EU still show a general tendency to segregate women in low qualified and low paid jobs often requiring patience and accuracy as a manual skill. This gendered segregation is giving evidence of a social stratification based on a strictly gendered division of public and private spheres. This is signifying not only a disregard of unpaid homework, but subordinating women to a male provider in spite of their rising participation in the labour market, thus considering their occupations as a mere addition to the male income serving additional demands (Hagen/Jenson 1988; Kurz-Scherf 1996; Young 1998). As one consequence the promotion of women has become a generally acknowledged aim of employment policies. Measures to enhance equal opportunity of employment have widened the chances for women to enter higher estimated and better paid positions. At the same time, it is expected that processes of restructuring of enterprises, introduced on an international level in the course of globalisation, will evoke new gender regimes. The model of a male provider is increasingly losing importance in national economies, thus necessarily leading to a new stratification of gender regimes (cf. Young 1998:180).

Established structures of a general gender segregated division of labour are losing their functionality and seem to be outdated in various respects.

1. Women recently have been entering the labour market to a large extent either out of their own options or because of economic needs so that the division between homework and gainful employment as a gendered stratification structure of European societies has lost validity, consequently leading to new forms of gender relations and work patterns for both women and men. It should be mentioned that – though still being very few – men show a tendency to reappraise educational and family work e.g. by taking a family leave.
2. With labour becoming less available especially for young persons in many European countries, the individuals have to prepare for multiple changes and transitions during work life and for the strong demand of new skills and competences in other than technical / occupational fields, that is especially key qualifications / competences.
3. Following the expansion of service industries predominantly women have been profiting from rising employment rates. In contrast in some European areas, statistics show men to be more affected by unemployment and to bear a higher risk of unemployment. This is supposed to go back to different approaches to qualification and training – usually girls show a much better performance in the educational system – as well as to the changing work patterns and structures of the labour market.

New gender structures will emerge according to these processes with the risk of new inequalities. Already now the traditional view on women as being systematically disadvantaged cannot serve as a general explanation any more. Established gender barriers prove to be inadequate for a modernisation of work processes and, consequently, tend to lose validity because they will impede both individual career options of women and men as well as human resource development. Therefore, vocational education and

training (VET) systems should aim at competences corresponding to these challenges and at equal opportunities for both sexes.

**The scope of the project was to investigate the impact of the gender segregation of European labour markets on vocational education and training, with special regard to key (core) competences / qualifications thereby aiming at transcending gendered features of key qualifications for improving individual options for career choice and enhancing societal human resource potential.**

## 2.2 Innovative approach

The central approach of the project tried to relate two discourses, which – on the first sight - show incompatible features: one is the discourse of gender relations, which is one of – if not the - basic structuring categories of society; the other is the qualification discourse, especially on vocational education and training, shaping the access to work/labour in a society and all related consequences as social position, vocational identity, economic and social resources of the individuals etc. **The leading research question was to learn more about the practices of doing gender and of doing competences (qualifications) in the VET systems of the participating countries (Finland, Great Britain, Portugal, Greece and Germany).**

Gender as well as competence are important elements to form a persons' identity. Still there is hardly an academic approach which sets these both concepts in a relation to one another.

The innovative approach of this project was to bring together two different sources, contexts or perspectives. On the one hand the project related to VET research with special focus on key competences; on the other hand it also built on the results of gender studies. This double focus gave reason for continuous tensions throughout the research and work process and was of influence also for the research results. In addition these were shaped by the interdisciplinary approach presented in the partnership.

## 2.3 Gender and Key Competences – Segregated Discourses?!

In the research on key qualifications or competences gender obviously is not considered a relevant category. The majority of VET related research still appears to be gender blind, which means that results of gender studies are generally ignored, gender as an analytical category of research is rejected and that work which has explicitly been elaborated on the gender relations in VET remains marginal if not excluded from the main stream of research. Furthermore the fact that the term key competence was developed in view of a labour market on which men and women hold different positions, lead to a gender specific application of this term/concept.

On the other hand it can also be found that women/gender studies have treated the concept of qualification in general and the concept of key competences especially as marginal compared to other issues of gender inequality on the labour market. In addition **gender studies** still are mainly women studies in a double sense: performed by women researchers and focussing on women's concerns, respectively on the social conditions of women's life and work. A gender specific analysis of working and living conditions of men still is an exception.

To give evidence to the lacking relation between the discourses of gender and VET Michel Foucault's concept of discourse analysis can be a helpful tool to give evidence to the variety of perspectives and approaches, background theories of the multidisciplinary

research community engaged in this project. Applied to the context of the project this means to ask:

Who is determining the discourse of gender studies? Which are the dominating topics and theses? Which are the blind spots in gender research? Which statements are considered to be of general acceptance?

And vice versa: What is ruling the discourse of VET related research? Who is talking? Which statements are generally accepted? Which questions are in the focus, which are marginal? Which are excluded?

### **2.3.1 The Discourse on Key Competences**

The debate on key competences / qualifications in vocational education and training has concentrated on demands for changing work organisations. The main assumption is that new forms of work organisation, apart from technical skills, will require new skills, characterised as social skills, communications skills, analytical and methodical skills etc. , that is key qualifications / competences. So far gender specific qualifications have been analysed with respect to career choices of girls and boys in the perspective of education aiming to open up broader occupational chances for young women. The importance of gender-specific key qualifications for new job opportunities has not been systematically analysed .

What is meant by the term key competence is highly depending on who is applying this term, who is talking about key competences. The concept of key competences can be interpreted as a reaction of researchers concerned with the tasks and methods of vocational education and training to the growing difficulty of identifying demands of a future labour market and the growing uncertainty about the qualifications assumed to be needed by future workers to perform on a labour market, which seems to be less and less predictable.

Since Mertens first has tried to solve "the problem of adaptability and flexibility of the young employees, to counter problems of obsolescence of job skills, to anticipate the future in organising practice skills" (cf. Nijhof 1998:23), an "interweaving of different concepts" has emerged, "which all refer to two central dimensions in the qualification of individuals: their flexibility or transfer capability and their problem-solving ability or ability to give shape". (Hövels 1998:58) The related discourses have been dominated by two leading questions:

What is meant by key competences? Which special qualifications are included in this concept? and

How can key competences be acquired / learned or taught?

The everlasting attempt to define, re-define or extend the notion of key competences is based on the affirmative assumption that they are necessary and useful, though difficult to identify " especially when so many other different concepts are circulating, such as core skills, competence and competency, and generic skills ..." (Nijhof/Streumer 1998:13), in summary, key competences are designed to help to prepare young persons for life, for an occupation, for employability and for citizenship (Nijhof 1998: 20).

From a feminist perspective these aims of VET are one dimensional, because they are defined in view of the outside of the working world, or does it go without saying that "flexibility" or "employability" include to maintain the own workforce and health; or that "transfer capability", to equip young people with transferable skills and transition skills could also include to prepare for the transition through states of unemployment or that "learning for citizenship and culture" might include the shaping of a democratic social

environment in which future workers are educated and raised? What is outspoken is the reference to the public part of employability, the private part – the aching backs, the dirty laundry and the crying children – do not play a role in these concepts.

By maintaining this dichotomy the well established gender segregation is continually supported. Against the many narrow, functionalistic and technical-rational views on the relations between education and work, which have been dominating VET research for a long time we tried to open the perspective for questions about the social dimension of the work environment and VET practices and for a comprehensive view on the development of personalities instead of personnel.

The discourse on key competences presents itself as a specific problem of vocational education, because it is closely linked to the question: how can Key competences be imparted? Since one of the basic ideas of the concept was to enable individuals for situations of job transition and changes in career, women formed one of the first target groups for further training schemes, aiming to promote their re-entrance to the labour market, especially after a family leave. Key competences entered the curricula of these special programmes.<sup>1</sup> Still the vast practice in this field is hardly reflected by the theoretical work.

Especially but not only in Germany women who wished (or needed) to re-enter the labour market after a period of family work form a constant target group of further /continuing education. Various programmes of differing institutions aim to update their vocational competences on the one hand, but at the same time suggest to raise self-awareness, self-esteem, and to enhance a comprehensive list of abilities, which are summarised as social competences or key competences.

The acquisition of key competences does not exclusively take place in intentionally designed learning environments, but rather in informal contexts and everyday situations. Men and women do not experience these contexts equally and do not have equal access to them. Consequently informal learning might happen in a different way and the competences acquired informally seem to be of different kind. "The result is also a consistently different (self-)perception and (self-)evaluation of the same competencies, characteristics, actions, ways of thinking and ways of perception according to gender (cf. Engler/Friebertshäuser 1992:105).

### **2.3.2 The Discourse on Gender Relations**

Gender Studies on national level for a long time had as one major approach the historical and cultural background of gendered VET systems. For this research, which has contributed to "making women visible in the history of education" (Watts) the historical perspective was a necessary and fruitful methodological approach. Thus the way how

---

<sup>1</sup> In Deutschland erschien 1987 ein Buch, das explizit den Titel trägt: „Frauen und Schlüsselqualifikationen“, Untertitel: Chancen eines beruflichen Neuanfangs. Es handelt sich um den Bericht über einen Modellversuch zur „Motivation und Umschulung längerfristig arbeitsloser Frauen in Zusammenarbeit mit Klein- und Mittelbetrieben, der von der Münchner Volkshochschule im Auftrag des BIBB durchgeführt wurde. Der Projektbericht liest sich als Lernzielkatalog, in dem Schlüsselqualifikationen neben der Auffrischung schulischer Kenntnisse, der Vermittlung berufsbezogener Informationen und personenbezogenem Lernen stehen (de Sully / Schröder-Jänecke 1987). Schlüsselqualifikationen erscheinen hier also als Additiv zur allgemeinen und berufsbezogenen Bildung, die den Wiedereinstieg ins Erwerbsleben eröffnen sollen.

VET systems carry on gendered structures and gendered role segregations has been outlined. So far this has mainly been analysed from the women's perspective, the women's situation in society being shaped by political, social and economical inequalities and the equal opportunity policy being a leading principle, not only for historical research. On the history of vocational education and training under a gendered perspective excellent national research has been done (Mayer 1998, Heikkinen 1996, Kleinau 1996). Dealing with the history of women dominated occupations as well as with the history of women professionals, these studies critically point to the lack of a general history of vocational education. The classical female dominated occupational fields and a corresponding definition of occupational skills being linked to economic, political and social role concepts of female behaviour have been analysed in the context of history of mentalities (Heikkinen 1996), with regard to the needs of a national education policy (Henriksson 1996) or focussed on single female professions (Kuusisto / Vesala 1996).

It should be pointed out that the approach of gender-studies is focussing on the social conditions and interrelating circumstances of both women and men, and is rejecting an exclusive focus on women. **The question is not whether women and men should or could be equal but to understand the process of doing gender, i. e. to decipher those societal structures and conditions, which can be considered responsible for the different conditions of women and men in a respective society and thus to work against a gender related hierarchy (Young 1998:177).**

Gender could be defined as a couple of epistemes, which are socially constructed with regard to sexual differences and in the context of a male dominium (Gordon 1993). So gender would mean an overall network of hierarchically structured social relations, which are grouped according a gendered barrier (Kreisky/Sauer 1995). "Gender regime" (Young) can be understood as institutionalised forms and practices of gender, rooted as a network of norms, regulations and principles in the structure of social practices (Conell 1987: 139, 141). As a result "gender regimes" are not static, but subject of a „reflexive relation“ (Giddens 1984) with the given relations of power between women and men, which are constituted by conflicting social interests, formation and dissolving of accepted categories and the re-structuring of institutionalised relations. (Conell 1987: 139).

The main driving force of gender studies has been the question of equality. However, since gender equality in society and at the workplace is not a question of knowledge or special skills, but rather remains a matter of attitudes, beliefs and consequent behaviour (Haefeli: 92), the question of skills and competences has been of minor importance compared to the question of social construction of attitudes and beliefs and the social and institutional mechanisms regulating the exclusion and/or participation of men and women in specific spheres of social life.

General and vocational qualifications have proofed to be of secondary significance for women's participation in paid employment: neither their generally better performance at school nor professional achievements could change the under-representation on the level of decision making and the fact that they are often employed under value (Arbeitsamt, 2000:11). It has often been stressed that education and competence do not open up the same chances for women in society and do not reduce gender inequality. Raising the issue of qualification gender studies have rather been concerned with different types of questions.

### **Excursus: The German Case**

E.g. the question of qualification in Germany recently became an issue because of the reform of the caring professions. To be watched in this process was the attempt to re-determine as a competence features which were for a long time in history considered to be an integral part of a female character. The profession of nursing was founded as a

female occupation (although during the recent 15 years it has become more and more attractive for men) (126) and it was „set up with undefined professional standards. Under-valuation of the work and a lack of self-confidence towards its own occupational activities were the consequences of diffusion and comprehensively defined vocational requirements.“ (Christine Mayer,p.140) Historical texts define a nurse’s tasks by the criteria of subordination and obedience, not by professional skill and technical know-how. German research in the history of the caring professions, has highlighted the double intention of "female vocation". Since the normative bourgeois ideology of femininity stresses the natural vocation of *Hausfrau, Gattin, Mutter*, qualified work was only to be obtained by women in coherence with this ideological concept. It is not because women were especially qualified for caring activities that they opted for such an career, but because caring was considered to be in accordance with the so called female character. Women could only be employed in an occupation, which suited them - while men had to be trained or could train to acquire the necessary competences.

A European wide campaign is recently to be watched, aiming at the awareness, assessment, evaluation and acknowledgement of key qualifications, which here again are understood as social competences, many of them might have been acquired through home- and family work.

Directly addressing women, a recent publication of the German labour office says: “You might not have the latest vocational knowledge, but the family work you have performed, does equip you with key qualification, which are repeatedly demanded by employers. Don’t hide these qualifications.“ (Arbeitsamt 2001, translation BN)

Is there a chance to cure the blindness for family related work tasks and their significance and their tight link to the world of labour? Does the valuing of informal learning and experience could help to open up the perspective on so far women dominated fields of activity? Acknowledging qualifications, which so far haven often been considered to be part of the female character, marks a dialectical process, with the liberation of “female” key qualifications from historical bourgeois traditional concepts on the one hand – and their economisation on the other.

## 2.4 Problems addressed

On this background the problems addressed by the research project can be outlined as follows:

- In the course of changing work patterns traditional ways of choice of career and occupation increasingly work as a barrier to innovation and stabilise marginalisation. Moreover the possibility of new social inequalities cannot be excluded.
- A European labour market will require employees ready and capable to switch from one occupational field to another, to build a career upon changing occupational contexts and demands, even including periods of unemployment. It will therefore be essential for the individual work biography to constantly make use of new information and to be prepared to adapt to new occupational situations, thus referring to concepts of life long learning.
- Gender patterns of labour and education tend to lose their functionality and validity in this process – whether seen from the employees perspective with both, women and men, needing to qualify for a highest possible employability, or seen from the employers perspective making use of the highest possible human resources of women and men likewise.

- For the future of the labour market in some countries schemes of reduced working time are favoured to match the problem of a sometimes envisaged growing reduction of labour; therefore new skills / qualifications have to be introduced to education and training programmes in order to bring to the fore the necessary creativity and flexibility of the modern workers of the next decades.
- Mere technical skills to be acquired in a work based training or at the work place are supposed to lose importance in qualification systems whilst instead stress is laid on key competences / qualifications. The ability to adapt to new occupations and to transfer skills and qualifications acquired elsewhere which today mostly depends on the individual's motivation and accidental situation should become an integral part of vocational education and training curricula. Here the problem of defining gendered clusters of key qualifications / competences is of utmost importance in order to design measures for bringing them closer together.
- In addition, the fact that lower skilled workers will at the same time have to prepare themselves for periods of unemployment or work in fields with non-standard job forms stresses the importance of competences for self-learning and strengthening of personality. Thus the importance of key (core) competences / qualifications has been generally acknowledged in the overall European vocational education and training research, without, however, paying attention to their gendered structure.
  - The risk of new social inequalities cannot be excluded because of several reasons:- Women traditionally have been employed in the still expanding service sector, so they are less affected by staff reduction in the industrial sector. That men apply for service jobs so far mainly performed by women seems to be a rather new development.
  - Moreover changing family structures and mostly better basic qualifications have lead to successful women careers including occupation in leading positions.
    - New tendencies of the labour market might stop these improvements for women because of an increasing gender competition.
  - Examples might be young men qualifying for occupation in educational, health or service jobs. But these tendencies might better be perceived positively as the beginning of reducing gender segregation. Indeed, bringing gendered clusters of key qualifications / competences closer together should diminish the emergence of those new inequalities.
- The challenge for vocational education and training consists in preparing men and women for situations of occupational change and changing work patterns. In biographical situations of a new job orientation particularly men seem to show more difficulties to cope or to opt for a female dominated occupational field, either because of lacking the key competences / qualifications required, or because of refusing to adapt to an occupation that is lower estimated, often because it traditionally has been mainly performed by women. On the other hand women working in seemingly male professions have become much more common.

## 2.5 Objectives

### Objective 1

**Development of a common concept, common understanding and set up of cornerstones with reference to** the emergence of a gendered division of labour and its

reflection on the respective VET systems (initial and continuing vocational training, school to work and VET to work transition), taking into account the different historical cultural and economic conditions of occupational and VET-traditions. Special regard has been given to the understanding of key competences in the different national VET-systems and gendered clusters of key qualifications.

## **Objective 2**

### **Contribution of actual VET practices to ongoing gender segregation by enhancing gendered key competences**

It has been analysed how VET practices generate gendered key competences / qualifications in the selected fields of occupations, which are clearly dominated either by women or men. In a second step sets of key qualifications have been determined, specially relating to these selected occupational fields.

## **Objective 3**

### **Relation of specific key competences to gender and theoretical background of key competences in the European discourse**

It was assessed how and to which extent key competences could be related to gender. In empirical respect this question has been analysed from different points of view, from the VET perspective assessing key competences of importance for skill transfer in situations of occupational change and from the employers and employees perspective.

## **Objective 4**

### **Conditions for the reproduction of gender segregation due to gendered features of key competences**

It has been assessed how and to which extent key competences related to gender tend to (re)produce gender segregation. This was evaluated

- from the employers perspective assessing to which extent employment practices of personnel managers and / or occupational requirements tend to (re)produce gender segregation;
- from the employees (individuals) perspective assessing how and to which extent self images contribute to reproduction of key competences related to gender.

## **Objective 5**

### **Conditions for the development of key competences beyond gender segregation**

The approach was

- to explore conditions and motivations of career choice in the selected occupations
- to explore to which extent men working in women dominated professions tend to develop other key competences than men working in male dominated professions and vice versa
- to which extent they make use of these other ( additional) key competences
- to which extent those (additional) key competences influence their work career.

## **Objective 6**

### **Gender specific strategies in the approach to situations of occupational change and the impact on the performance on the labour market**

The differences in coping with situations of occupational change specially asking if occupational shifts or changes are perceived as a positive chance for further personality development and learning were explored.

### **Objective 7**

**Recommendations for transcending gender barriers and gender segregation in the European VET systems with regard to key competences were drawn up**, addressing VET practitioners and education policy makers and aiming at an improved implementation of the development of key competences in (initial or continuing) vocational education and training, helping to transcend gender barriers and gender segregation thus rising the individual employability and provide a broader option for career choice on the one hand and improving the human resource potential for a less gender segregated labour market on the other hand.

## **2.6 Summary**

- Historically key qualifications of women were rather considered to be character features, while those of men were rather considered to be a result of playful training or learning. Still both perceptions are socially and discursively constructed and object to historical changes.
- Gender studies and VET related research have different analytical categories and different discourses of reference. Therefore the terms gender and key competence (and the respectively underlying concepts) so far have been rarely related to each other.
- The fact that gender studies and studies on VET only marginally relate to each others outcomes reflects and reproduces gender segregation on the level of research and theory building.
- The fact that the term key competence was developed in view of a labour market on which men and women hold different positions, has led to a gender specific application of this term/concept.
- Gender studies are still mainly women studies in a double sense: performed by women researchers and focussing on women's concerns, respectively on the social conditions of women's life and work. A gender specific analysis of working and living conditions of men still is an exception.
- Gender is stronger than VET. Rather than perceiving gender as an individual characteristic, it must be seen as an outcome of social situations and arrangements. Gender is deeply inscribed into the daily routines and thinking (doing gender). "The British partners also stated, that our project and its aim are not only about gender or individual differences but more about gender inequalities which still exist and need to be changed.
- Consequently the gender perspective could not simply be added to the mainstream analysis of key competences. Research had to consider the socio-historical contexts and the importance (Wirkmächtigkeit) of gender as a basic structuring category of society.
- In conclusion the definition of key qualifications as a concept to prepare for occupation and employability, including learning to learn skills and entrance skills for higher education as well as transferable skills and transition skills and the education for citizenship and culture should be further extended and comprise to

care for one's own health and personal well being, value the activities and the time needed to raise children and to care for a family and keep a household running.

## 2.7 References

- Arbeitsmark für Frauen, Aktuelle Entwicklungen und Tendenzen im Überblick, Sonderdruck aus den Amtlichen Nachrichten der Bundesanstalt für Arbeit (ANBA) Nr. 4/2000
- Assen, Saskia (1998) „Überlegungen zu einer feministischen Analyse der globalen Wirtschaft“, Prokla 11, 2, 199 - 216
- Aulenbacher, Brigitte (1993), Technologieentwicklung und Geschlechterverhältnis. Beiträge zur industriellen und gesellschaftlichen Entwicklung, Frankfurt
- Benner, P (1984) From novice to expert, Addison Wesley, London
- Brown, A. (1997) 'The development of key skills across contexts and over time', Capability, 3,2, 16-20.
- Brown, A. (1997), Becoming skilled during a time of transition: observations from Europe, Paper produced for the Sixth National Career Development Association Conference, Daytona Beach, Florida
- Büchter, Karin: Zehn Regeln zur Ermittlung von Qualifikationsbedarf. In: Gewerkschaftliche Bildungspolitik 1999
- Bundesanstalt für Arbeit (Hrsg.): Frauen – Wege zur Chancengleichheit, Nürnberg, 2000
- Bundesanstalt für Arbeit (Hrsg.): Frauen und Beruf , Nürnberg, 2000
- Corno, L (1989) Self regulated learning. In: B.J. Zimmermann & D.H.Schunk (eds) Self-Regulated Learning and Academic Achievement: Theory, Research and Practice, Springer-Verlag, New York
- De Sully, Gabriele, Schröder-Jänecke, Ursula: Frauen und Schlüsselqualifikationen, Chancen eines beruflichen Neuanfangs. Bundesinstitut für Berufsbildung (Hrsg.), München 1987
- Ellström, Per-Erik: The many Meanings of Occupational Competence and Qualification. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998
- Engeström, Y, (1994) Training for change: New approach to instruction and learning in working life, International Labour Office, Geneva.
- Enkenberg, J (1994) Situated Cognition and cognitive Apprenticeship. New Framework for Education of Professional Skills. In: Heikkinen, A (ed). Vocational Education and Culture, Tampere, Tampereen Yliopisto.
- Erler, Wolfgang, Nußhart: Familienkompetenzen als Potenzial einer innovativen Personalentwicklung, Bundesministerium für Familie, Senioren, Frauen und Jugend (Hrsg.), Berlin, 2000
- Evans, K., Brown, A. and Oates, T. (1997) Developing work based learning: an evaluation of the YTS Core Skills Project, Sheffield: Employment Department
- Fraser, Kay M.: Same or Different: Gender Politics in the Workplace, Aldershot 1999
- Frerichs, Petra (1997) Klasse und Geschlecht. Arbeit, Macht, Anerkennung, Interessen, Opladen

- Gonon, Philipp: Schlüsselqualifikationen aus kontroverser Sicht: eine Einleitung. In: Gonon, Philipp (Hrsg.): Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 9–13
- Harney, Klaus: Cultural Patterns of Vocational Education in Western Europe as background for a German/Finland-Comparison. The peculiarity of the German case. Paper to be presented at the Bergen Conference 27.-30.August 1998
- Heidegger, Gerald: Von Schlüsselqualifikationen zu Schlüsselkompetenzen. In: Gonon, Philipp (Hrsg.) Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 101–106
- Heikkinen, Anja (1996) Gendered occupational ideals in Finnish vocational education. In: Heikkinen, Gendered History
- Heikkinen, Anja (ed.) Gendered History of (Vocational) Education – European Comparisons, Hämeenlinna 1996
- Heikkinen, Anja: Gender Bias in Nordic Vocational Education. In: Schweizerische Zeitschrift für Bildungswissenschaften, Freiburg 2000
- Heikkinen, Anja: The Making of the Masters and Mistresses of the Nation? Engineers and Nurses as Occupational Ideals in Finnish VET. In: Gender Perspectives on Vocational Education, Bern 2001
- Henriksson, Lea (1996) Occupational politics of health work – women’s involvement in creating the foundations of the Finnish welfare state. In: Heikkinen, Gendered History
- Hövels, Ben: Qualification and Labour Markets: Institutionalisation and Individualisation. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998
- Hyland, T. (1994) Competence, education and NVQs: dissenting perspectives, London: Cassell
- Kleinau, Elke (ed.) (1996) Frauen in pädagogischen Berufen, Bd.1: Auf dem Weg zur Professionalisierung
- Kleinau, Elke, Mayer, Christine (eds.) (1996) Erziehung und Bildung des weiblichen Geschlechts. Eine kommentierte Quellensammlung zur Bildungs- und Berufsbildungsgeschichte von Mädchen und Frauen, Weinheim: Deutscher Studien Verlag
- Lange, Ute (1996) Zum professionellen Selbstverständnis der ersten Generation von erwerbstätigen Sozialpädagoginnen, Kleinau (ed.), 105 - 126
- Laur-Ernst, Ute: Schlüsselqualifikationen in Deutschland – ein ambivalentes Konzept zwischen Ungewissheitsbewältigung und Persönlichkeitsbildung. In: Gonon, Philipp (ed.): Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 17–23
- Lave, J. (1991) Situated learning in communities of practice. In: L. Resnick, J. Levine and D. Behrend (eds) Perspectives on socially shared cognition, Washington DC: American Psychological Association
- Leat, D. (1993) Competence, Teaching, Thinking and Feeling. In: Oxford Review of Education, Vol. 19, No. 4
- Mansfield, B., Mathews, D. (1995) Job Competence: a description for use in vocational education and training, FESC, Blagdon.

- Mayer, Christine (1992) „... und daß die staatsbürgerliche Erziehung des Mädchens mit der Erziehung zum Weibe zusammenfällt“. Kerschensteiners Konzept einer Mädchenerziehung.. In: Zeitschrift für Pädagogik 5, 771 – 791
- Mayer, Christine (1996) Zur Kategorie ‚Beruf‘ in der Bildungsgeschichte von Frauen im 18. und 19. Jahrhundert. In: Kleinau (ed.), 14 - 38
- Mayer, Christine (1998) Berufsbildung und Geschlechterverhältnis. Eine historische Analyse zur Entstehung des Berufsbildungssystems in Deutschland“. In: Schütte, Friedhelm, Uhe, Ernst (eds.), Die Modernität des Unmodernen. Das ‚deutsche System‘ der Berufsausbildung zwischen Krise und Akzeptanz, Berlin
- Mayer, Christine: Vocational Education and Gender: The formation of the German Vocational Education System in a gendered perspective, Paper presented at Bergen Conference „Economical, Social and Political Embeddedness of Vocational Education – Historical and Cultural Perspectives“ from 27th – 30th August 1998 at the University of Bergen
- Mayer, Christine: Deficits of Professionalisation in the Field of Nursing in Germany – an Historical Analysis. In: Gender Perspectives on Vocational Education, Bern 2001
- Mertens, D. (1974) Schlüsselqualifikationen: Thesen zur Schulung einer modernen Gesellschaft (Key qualifications: themes for education and training in a modern society), Mitteilungen aus der Arbeitsmarkt- und Berufsforschung, 7, 314-325
- Niemeyer, Beatrix : Ausschluß oder Ausgrenzung? Frauen im Umkreis der Universitäten im 18. Jahrhundert. In: Kleinau/Opitz (eds.), Handbuch zur Geschichte der Mädchen- und Frauenbildung (12. – 20. Jahrhundert), Bd. I, Frankfurt/Main, Campus, 1996
- Niemeyer, Beatrix : Mädchen- und Frauenbildung von der Renaissance bis zur Frühaufklärung. In: Kleinau/Mayer (eds.), Erziehung und Bildung des weiblichen Geschlechts. Eine kommentierte Quellensammlung zur Bildungs- und Berufsbildungsgeschichte von Mädchen und Frauen, Bd. I, Weinheim 1996
- Niemeyer, Beatrix : The influence of history and culture on gendered features of the German system of vocational education and training“ – Forschungsbericht für das europäische Forschungsprojekt „GENDERQUAL - Gender and Qualification. Transcending gendered features of key qualifications for improving options for career choice and enhancing human resource potential“, Flensburg, 2000
- Niemeyer, Beatrix (1996) Weiblichkeit und Wissenschaft. In: Kleinau (ed.), Frauen in pädagogischen Berufen, 1: Auf dem Weg zur Professionalisierung, 127 - 139
- Niemeyer, Beatrix: Geschlecht und Qualifikation: Überwindung geschlechtsspezifischer Merkmale von Schlüsselqualifikationen zur Erweiterung der Berufswahlmöglichkeiten und zur Förderung des Arbeitskräftepotentials, Projektbeschreibung, Flensburg 2000
- Nieuwenhuis, R.H. (1991) Practical learning situations as a preparation for lifelong job oriented learning, Paper presented at the International Workshop on Developing Education for Lifelong Learning, Tampere, Finland.
- Nijhof Wim J. Streumer, Jan N.: The Demarcation Issue: Introduction. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998
- Nijhof, Wim. J.: Qualifying for the Future. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998

- Ostendorf, Helga (1996) Überlegungen zur Geschlechterpolitik staatlicher Institutionen, *Frauenforschung* 3, 14, 23 – 38
- Ostenk, J. (1997) Kernproblemen, ICT en de innovatie van het beroepsonderwijs ('Core problems, ICT and innovation in vocational education and training'), Amsterdam: SCO Kohnstamm Instituut
- Rahn, Sylvia: Gender, Social Background and Choice of Profession (Berufswahl) at the Beginning and at the End of the 20th Century: Historical Findings on the Plausibility of the Current Individualisation-Theses. In: *Gender Perspectives on Vocational Education*, Bern 2001
- Schulte, Dagmar: Gender-specific Choice of Career among Personal Development, Social Conditions and Educational Intervention. In: *Gender Perspectives on Vocational Education*, Bern 2001
- Simons, R.J. (1990) *Transfer-ability*, Nijmegen: Quick Print
- Sundin, Elisabeth: The social construction of gender and technology. In: *The European Journal of Women's Studies*, Vol 2, No 3, p. 335 – 353
- Van Zolingen, S., Blockhuis, F., Streumer, C. and Nijhof, W. (1997) Towards broad initial vocational education and training : a method for the formulation of key qualifications and core problems, Paper presented at CEDEFOP conference on Core Skills, Amsterdam
- Watts, Ruth: Making women visible in the history of Education. In Heikkinen, Anja (ed.) (1996) *Gendered History of (Vocational) Education – European Comparisons*, Hämeenlinna, 9 - 28
- Webster, Juliet (1996) *Shaping women's work. Gender, employment and information technology*, London
- Wetterer, Angelika et. al (ed.) (1995) *Die soziale Konstruktion von Geschlecht in Professionalisierungsprozessen*, Frankfurt
- Wolf, A. (1991) Assessing core skills: wisdom or wild goose chase, *Cambridge Journal of Education*, 21,2, 189-201
- Young, Brigitte (1998) Genderregime und Staat in der globalen Netzwerkökonomie. In: *Prokla* 111, 2, 175 – 198
- Young, M., Hayton, A. and Leney, T. (1997) *Report on the ASDAN Youth Award Scheme*, London: Post-16 Education centre, Institute for Education, University of London

## 3 Scientific description of the project results and methodology

### 3.1 Analysis of Research

*Anke S. Kampmeier*

#### 3.1.1 Introduction

With respect to the innovative intention of the project and the varied objectives in the European research field the steps of research were complex. The project work includes literature research – above all at the beginning – and empirical research.

In view of the empirical part occupations had to be found, which could be investigated. For the occupations those with “lower” vocational education and training degrees should be taken into consideration in contrast to academic professions. They should also include a female dominated occupation, a male dominated occupation and a mixed one. A further selection criterion was the comparability in the different countries in view of the same gendered features and in view of the vocational education and training. The chosen occupational fields were **nursery nurses** as a woman dominated occupation, **electricians** as a “male occupation” and **waiters/waitresses** as a gender mixed occupation. In the course of further research it turned out, that the occupational fields were well chosen. They actually show the same gender features in each participating country as was required before and complied also with the other criteria as mentioned above.

#### 3.1.2 Literature research

Secondary analysis of national and international literature were done concerning

1. gendered structures of respective national VET systems and labour markets:
  - VET related gender studies including
  - historical, cultural and economic preconditions and
  - especially regarding the state of research on career orientation and gender,
2. state of the art of the national discourses of key qualifications and
3. synthesis, elaborating commonalities and structural differences of the participants.

As far as the discussion about **key competencies** is concerned the literature research shows that there is neither a unified understanding in Europe nor in the participating countries nor in each country. The research about key competencies and gender is extremely scarce in all countries. Specialised literature was only found in Great Britain: the report of the Institute of Employment Studies (IES) (1997). Therefore it was agreed, not to use one single definition or description of key competencies or key qualifications but to enter the research field in an open way.

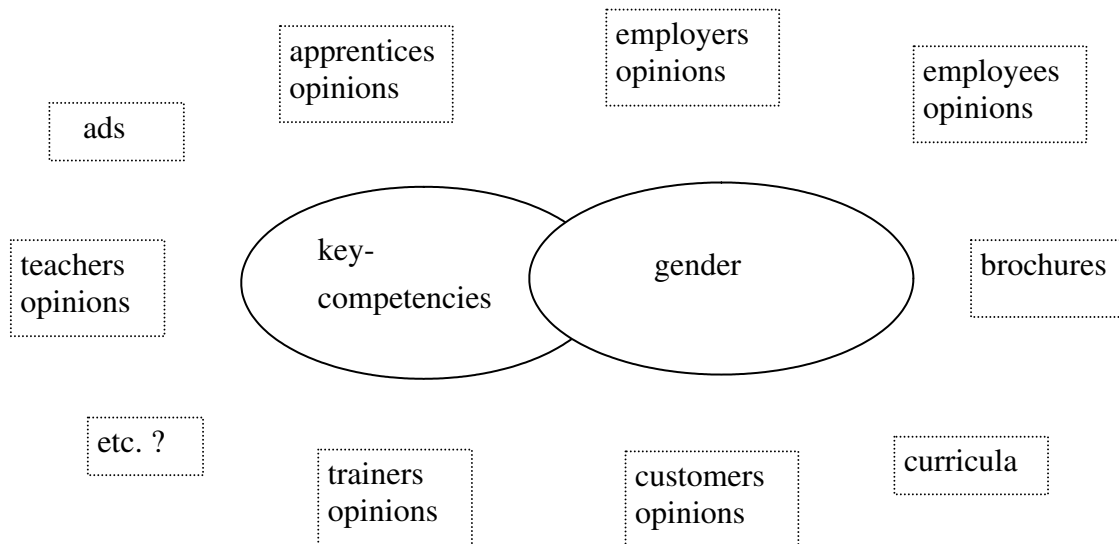
During the project work an appropriate model of key competencies was developed fitting to the special aims and contents of the Genderqual-project (cf. Heidegger in this report).

### 3.1.3 Empirical research

Current VET practices and their relation to gender segregation and gendered key competencies should be analysed. To determine sets of related key qualifications it was intended to

- do statistical research on the development of gendered structures in career choice and labour market,
- observe classes in vocational schools,
- observe working places,
- take interviews with apprentices, teachers, employers, employees etc. and
- analyse curricula, ads, brochures etc.

Figure 1. Broad view on the cases



The following plan for empirical research was developed (cf. also chapter 3.2: Methodology).

#### 1. In depth studies

Direct, non-structured, open, non-participatory field observations in VET schools and training places of the three chosen occupations. Focus lay on following aspects:

Aspects for observations	Aspects for basic conditions
language	structure of institution
dressings	sex of teachers, trainers, workers
working habits	culture of VET institute and of workplace (e.g. atmosphere)
involvement in work	gendered composition of classes and work groups
subjects of discussion	
contradictions	

2. Problem orientated interviews<sup>2</sup> in schools and/or training institutes of the three occupational fields with
  - students/apprentices
  - teachers
3. Problem orientated interviews<sup>1</sup> at the workplaces of all chosen occupations with
  - apprentices (if not already interviewed at school)
  - trainers
  - employers
  - employees
4. Case studies (observations and interviews<sup>1</sup>) with the exceptional cases (female electricians and male nursery nurses)
5. Case studies (observations and interviews<sup>1</sup>) with graduates from retraining courses
6. Content analyses of curricula, ads, brochures and newspaper articles

#### **3.1.4 References**

Institute of Employment Studies (IES) (1997): Skills, Competencies and Gender: Issues for pay and training. Report 333 by Strebler, M., Thomson, M., Heron, P.

### **3.2 Methodology: Culturally embedded actor-based approach to gendered core competences**

*Anja Heikkinen*

#### **3.2.1 Gender as an attitude?**

To start with, I repeat the objectives of the Genderqual project shortly: to explore the contribution of actual VET practices to ongoing gender segregation by enhancing gendered key (core) competences, to find out about specific key (core) competences relating to gender, to explore the conditions for the development of key (core) competences beyond gender segregation, to find out about gender specific strategies in the approach of situations of occupational change and the impact on the performance of men and women on the labour market, and to develop recommendations for transcending gender barriers and gender segregation in the European VET systems with regard to key (core) competences. The objectives were transformed into research questions: how are key (core) qualifications related to gender, which key (core) competences are mainly developed in occupational fields dominated by man, which key (core) competences are mainly developed in woman dominated occupational fields, how do VET practices contribute to ongoing gender segregation, how can VET contribute to reduce gender barriers and how can career options of women and men be improved. (Niemeyer 2002)

---

<sup>2</sup> The interviews with the students and employees form the inner circle for the case studies, the other interviews deliver further information.

An international study on options of transcending gender barriers in employment and occupations faces fundamental methodological challenges. (cf. Connell 2002, Dillabough et al. 2001) On the one hand, there is a temptation to adopt universal models about gendering practices, which would enable trans-national data-collection and comparisons. Typically this may take place through psychological individualisation, i.e. studying educational and career choices and identity formation as individual psychological processes. Another universalising approach is sociological, reducing gendering practices into stereotypical role-socialisation in segregated societal and labour market structures. Sooner or later, however, universalising comparisons face the problem of ‘underlying’ cultural and historical differences. In interpretations they are often understood as static and determinist attitudes, as residual factors, which cannot be explained or changed. The aim of this chapter is to explore an alternative methodology, a culturally sensitising approach, where culture is understood as interconnected individual, collective and meta-collective projects, which have their static, dynamic and generative components. ‘Gendering practices’ are thus conceived as dynamic, transforming processes, where the collective cultural projects of ‘doing gender’, are given special attention.

Even if comparing as making differences is a fundamental mode of human thinking and essential for any research, ‘comparative research’ or ‘comparative education’ have promoted paradigmatic versions of culturally and historically decontextualised research, which connects to the specific role researchers have in national and trans-national political and economic programmes. (Popkewitz 2000, Heikkinen 2001d) Therefore, especially in policy-driven EU-projects, the following methodological questions are not fundamental only because of research-intrinsic, but also because of research political and ethical reasons.

1. Why and for who do they do research? What are their aims and interests, to whom are they responsible and responsive? In Genderqual: why should gendering of competences be transcended?
2. What are they researching? How do they thematise, categorise, conceptualise the entities of their research? In Genderqual: how are gender (sex), competences, work and occupation as well as education defined?
3. Who are they as actors? What is their position in relation to the entities and interests of research? In Genderqual: which realities and discourses on competences and gender are identified and recognised?
4. How do they do research? What are their methods and ways of acquiring knowledge and understanding and of constructing interpretations? In Genderqual: which places, spaces and actors are observed and heard in the gendering practices?

In the following sections, the questions of what, who, how and why are shortly discussed. In the final section, retrospective comments are made suggesting the need for continuing research.

### **3.2.2 Gender, work, occupation, competences and skills as cultural concepts**

“Cultures are real, lived experiences turned into reason, engendering reasons for action and thus embodied in material life and material goods... we should expect that different social groups, situated in different objective conditions as to their capacity to earn a livelihood, will have distinct experiences giving different meaning to a cultural concept that at first might appear as homogeneous. Culture should not be the easy way out from economic questions: culture is the difficult way into placing economic questions in the larger framework of social reproduction.” (Narotzky 1997, 222-223)

There is no way of exploring how gendering of competences might be transcended without understanding what it means and hence without reflections on categories<sup>3</sup> of gender/sex, work, occupation (division of work) and (vocational) education. This requires immediately historicising and cultural reflections on their interconnected individual, collective and meta-collective constitution, which I start from gender. From this perspective, the definition of gender by Bob Connell sounds promising: “gender is the structure of social relations that centres on the reproductive arena, and the set of practices (governed by this structure) that bring reproductive distinctions between bodies into social processes.” (Connell 2002, 10)

Understanding gender learning as creation of gender projects allow both the agency of the learner and the intractability of gender structures. However, Connell focuses on individual gender patterns, which develop in personal life as a series of encounters with the constraints of possibilities of the existing gender order – i.e. institutional patterns or wider patterns among social relations: “there is likely to be overlap in the gender projects, a degree of social standardisation of individual lives. We might call these common trajectories of gender formation.” (ibid, 82) Gender can be understood as something done in, not something that exists prior to social life. However, when entering to classification of gender structures into institutional and discursive power relations, production relations, emotional relations and symbolic relations, Connell seems to trap into his own cultural and historical position. Despite admitting cultural differences in gender structures, he claims that they can be understood through a universal concept of gender.

If we understand occupational identity as a constituent of personal identity, and sex and gender as part of identity, we should have a more holistic view of how sex and gender are constituted in different cultural contexts.

Cultural reflections inevitably take place through language. While we need a language for common discussion, we tend to translate other cultural meanings into English, even if there were no counterparts in those languages for words like sex, gender, femininity or masculinity, which may lead to fundamental biases in collaborative interpretations. E.g. in Finnish, the word “sukupuoli” is composed of “suku” – kin - and “puoli” - half of something. Therefore, Finns have to add to “sukupuoli”, the word biological/sexual in order to refer to sex; and social in order to refer to gender. Similarly there are no words male-female or femininity-masculinity, but derivations from “mies” - man - and “nainen” – woman: “miehinen, miehekkyyys” - manly, manliness -, “naisellinen, naisellisuus” - womanly, womanliness. In the following, the category of “gender” as “masculinity” or “femininity” is meant to be open for cultural interpretations. The following existential characterisation of gender is primarily influenced by socio-historical, anthropological or folkloric, ethnological, philosophical and educational research on Finnish culture (cf. Apo 1995, Sipilä 1999, Löfström 1999, Östman 2001, Ronkainen 1999, Peltonen 1999, Heikkinen 2001a). In the research questions of Genderqual, the making of masculinities and femininities is connected to the development of sexuality (sexual dispositions) and to reproduction (reproductive dispositions) and to division of work (distribution of dispositions as competences and skills).

The doing of gender is always embodied in physical spaces and bodies. In this categorical design, (hetero)sexuality may be defined as a certain direction and satisfaction of human erotic and bodily desire, primarily through genital intercourse between adults of different

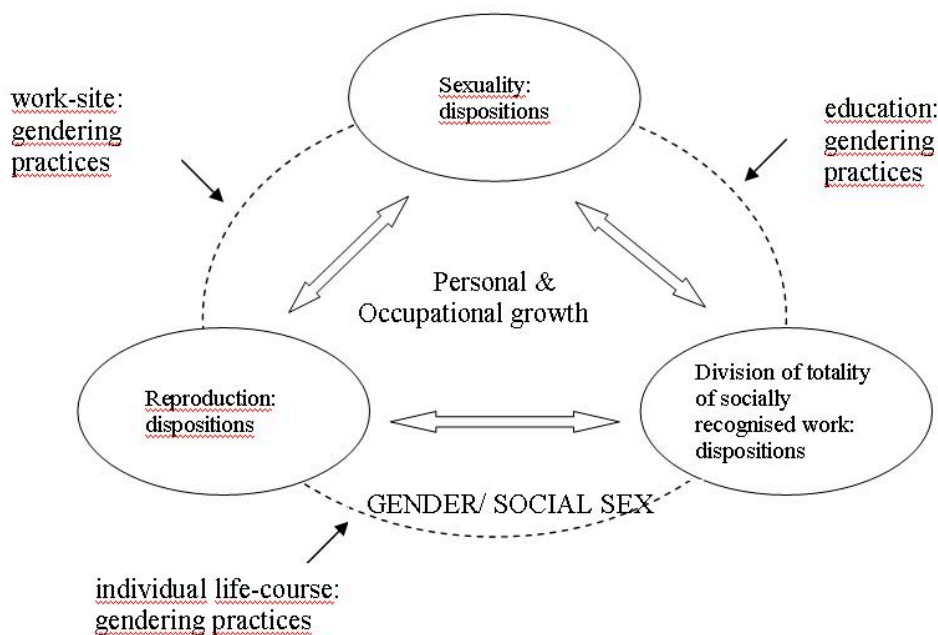
---

<sup>3</sup> In this context, category refers to thematisation of an existential sphere of human life, having continuity cross-times and cultural spaces. In scientific research, categories can be understood as kind of “bridges” between the existence (being in the world) and epistemology, underpinning a disciplinary or research area. In contrast, concept(ion)s refer to historically transforming mental representations and definitions of entities in the world either in everyday life or scientific discourse. (cf. Heidegger 1986, Toulmin 1972)

sex. Reproduction of human life may extend from biological to societal and cultural, from individual or family to human species. For example, femininity may be connected to the unique potential of some human beings to bear children, which in all cultures has labelled them with magic symbolic meanings, emanating to other aspects of life. Bearing children is not, however, enough even for biological reproduction of human beings. Division of human work may extend from family, to household or community, to society or humankind.

It is contestable, whether gender in its different historical and cultural materialisations in the first place functions as an opposition (or compensation) between men and women, or whether it rather is about making differences inside a sex. Following the legacy from “second wave” feminist research the struggle about societal recognition of femininity as an essential difference compared to historically superior masculinity is still common in gender discourse. (cf. Dillabough & al 2001, Irigiray 1996, Friedan 1983) The relational, post-structural feminism has shifted the focus to gender as a subjective and discursive construction, but with little interest in its wider political or economic context or in collective action. Since the 1980s, e.g. studies on ‘gendered policies of occupationalisation’ and ‘gendered citizenship’ have been developing in Nordic countries, but even they should proceed into more complex approaches, reflecting on struggles about femininity and masculinity inside and between collective cultural projects of men and women. (Anttonen & al 1994, Kinnunen 2001, Henriksson 1998, Heikkinen 2001a) Figure 1 is describing the research design in relation to gender.

Figure 1: Constitution of gender/social sex in relation to occupational growth



The holistic approach required in studying culturally and historically transforming meanings of gender is demanding, while research on work, competences and gender has become so fragmented. Thus, gender in relation to sexuality has primarily been explored

in anthropological and philosophical research, with restricted view on reproduction also little in economics and sociology. The main focus of sociology and labour market studies have been on sex/gender-segregated division of work. However, from educational perspective, the different components and meanings of gender should be related to personal and collective growth processes. They may e.g. vary during life-courses and be less rigid in childhood and old age than in periods, when sexual, reproductive and work dispositions all are crucial for individual and collective livelihood. The strength and rigidity of gendering always relates to physical features of bodies, places and spaces. The femininity and masculinity of bodies may e.g. vary according to age, being less rigid among small children and elderly, or according to exclusiveness of the space or functions of an activity in a place. In some cultural and historical contexts, gendering may be stricter in single-sex than in mixed-sex environment. Furthermore, whilst reproduction extends from individual-biological, through collective to meta-collective (societal) levels of life, the rigidity of its connection to sexuality and work may vary at those levels. Gender is not a separate characteristic, but a social project and a task, about developing dispositions, which enable individuals to participate in a gendered society.

### **3.2.3 Researchers as actors: discourses on education, competences and gender**

Genderqual is a multi-national research project, funded by the EU, which brings additional methodological issues to the fore. How do researchers position themselves in the multitude of discourses<sup>4</sup> that co-constitute the gendered landscape of work and VET? They should at least decide about their relation to the following discursive levels and fields, which are influential in their cultural context.

1) Practical discourses on competences, skills and gender as constituents of personal and collective forms of life in occupational and/or educational life-forms; individual (internal) or collective (interactive) negotiation of distribution of tasks and skills at work-site, educational institute or other relevant environment. 2) Negotiating discourses inside and between industrial and occupational branches, between representatives of industry and education; contributing to branch-specific learning programmes, i.e. to agreements on interpretations and definitions of crucial competences and skills. 3) Research discourses, which may serve educational institutions and actors or policy makers and educational reforms; conceptualisations and theoretical models on competences and skills and on efficient acquisition or learning of competences and skills. 4) Policy discourses at national and trans-national (EU) level, contributing to national qualification standards and guidelines for learning programmes, including political agreements on crucial competences and skills and qualification systems. 5) Relations (if any) of competence and gender in the previous discourses.

The commitment to culturally embedded actor approach means that we should not take for granted the dominant, universalistic prescriptions in the research discourse, i.e. the different conceptualisations and classifications of what counts as “competence” or “skill” and especially as “key” or “core” competence or skill. Neither would the limiting of research to trans-national or national policy discourses have given any valuable new information even to the sponsors. It may have been useful to study the representative negotiating discourses, because they would be closer to actors as discursive resources, through which they attempt to express and make sense of themselves. However, given the resources, we agreed on culturally embedded actor-based approach with a main focus on the practical discourse of actors, who should be given the opportunity to speak for themselves. They should identify and define gendering in relation to tasks, activities and

---

<sup>4</sup> Discourses are here understood as normative (normalising) conversations.

skills and with vocabularies, for which they feel ownership. However, the challenge for researchers still remains, whether they are able to recognise and reflect the influence of their prejudices and assumptions, which they inevitably bring into their seeing and reading. We should make transparent, which theoretical conceptualisations and models dominate our perceptions and whether we can avoid our position in the totality of work of our cultures as academic professionals. How far do we tend to identify with the upper or middle positions in the occupational order of different branches – e.g. by attributing easily the more stereotypical statements on gender to the ignorance of less educated workers? Does our background lead us to take the prestige of academic or general forms of education for granted and can we recognise our potential commitments to certain middle-class projects of femininity and masculinity of our cultures?

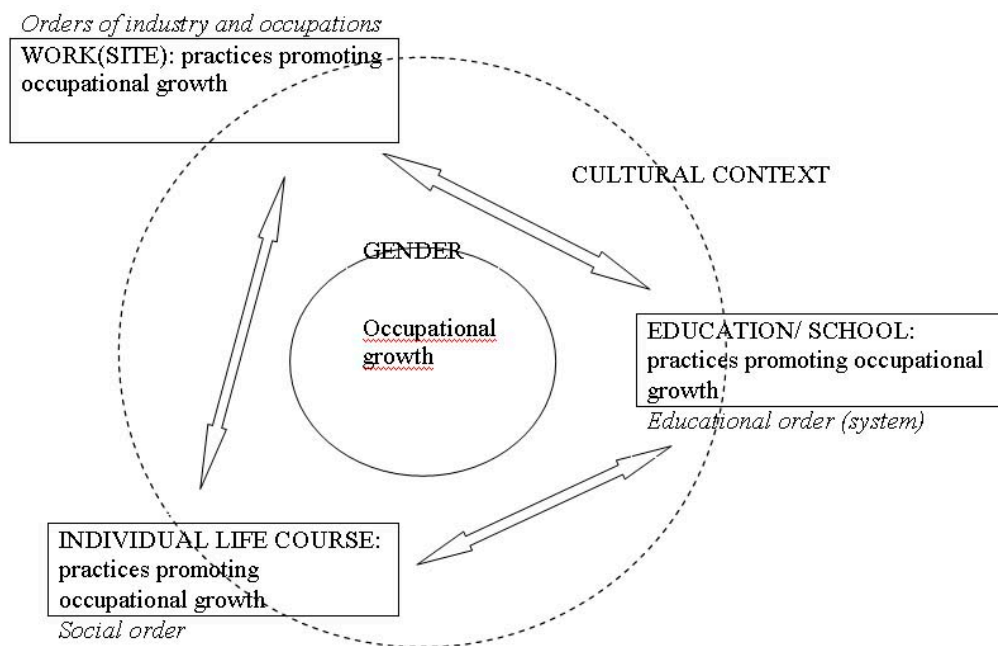
### **3.2.4 How to research: sites, spaces and timing of practices of gendering skills and competences**

Occupations are expressions of the division of work and thus of institutionalised distribution of tasks, skills and competences in cultural formations. What are the spaces and platforms, which are important for individual and collective occupational growth, where this distribution is accepted, reproduced or transformed, where corresponding skills and competences become labelled with gender? In each cultural context we should specify, which are the sites and times, where individual and collective actors negotiate about learning, education and performance of skills and competences, and where the different discourses on competences and gender take place. The culturally specific sites of work and education in nursery nursing, catering and electrical technology are located in the totality of work, the whole educational order and the order of social life. Firstly, each partner country has its specific set of industries, distribution of work into publicity and privacy and degree of societal recognition of different kinds of work. Furthermore, in each industrial order, division of work into occupations follows certain cultural patterns, setting boundaries and hierarchies inside and between occupational branches. The definition of competences and skills of nursery nurses or electricians are relative to the competences and skills performed by other, higher and lower occupations in the branch, like kindergarten teachers, electrical engineers and diploma-engineers etc. Still, each work-site has its specific ways of organising, dividing and integrating work-processes, where occupational boundaries and hierarchies are redefined. E.g. the skills and competences of a self-employed Greek electrician doing maintenance jobs may develop differently than those of a German *Facharbeiter* in a big multi-national company.

*Secondly*, in each partner country, the totality of educational activities and responsibilities is made up in a specific way. The educational practices are recognised, institutionalised and valued differently in the wider context. In one case, learning competences and skills may largely be informally organised in families and/or work-sites, in another it may primarily be controlled and guided by experts in specific pedagogical settings. In the sites of learning, education may be organised by family members and fellow workers (e.g. waiters in Portugal) or by trainers and teachers, who have even higher and academic qualifications (e.g. nursery nurses in Finland). The criteria for recruitment and progress of learners may also differ considerably. Thirdly, in each country, individuals enter sites of work and education in different ways. The meaning of home and family, of peer group, previous school or work-experiences may develop differently in different cultural contexts. The rationale in cultural embedding lies in the recognition of culture (with its transforming internal tensions and varieties) as something, which underpins the specificity of work-sites, occupational and industrial orders, of sites of education and educational orders and of patterns of individual life-courses. When gender as culturally specific social sex is

developing in its aspects of sexual, reproductive and work dispositions, the individual life-course, sites of work and education all contribute.

Figure 2: Cultural embedding of sites, space and timing of gendering practices<sup>5</sup>



The nature and rigidity of connections between sites, spaces and timing of gendering practices varies culturally and historically. E.g. in many cultures doing masculinities has more often taken place among men themselves, doing femininities more between women and men. However, increasingly femininities have been developed among women as well. In most contemporary cultures, gendering practices are quite separated and institutionalised. Anthropological, folkloristic and socio-historical research suggest that in many indigenous cultures developing femininity and masculinity in the growing generation can be a shared task of the whole community, subsumed to the survival and livelihood of the community. Therefore, also the features and boundaries of gender could be rather flexible. (Apo 1995, Narotzky 1997, Löfström 1999)

In order to develop a collaborative, cross-cultural research design, we agreed on focusing on cases of gendering practices and practical discourses from sites of work, education and individual life-course in the fields of nursery nursing, catering / waiters and waitresses and electrical technology. From each case we should learn both from the culturally dominant practices and practical discourses and - because of the question of transcending gendering - also from the exceptional practices and discourses. In order to enable reflective discussions on actors' perspective, we agreed on combining observations of practices with interviews with people, who were supposed to relate differently to occupational growth processes and to hold different positions in occupational and educational orders. Furthermore, additional documents from sites of work and education – curricula, guides, and leaflets – and from expectations and attitudes of customers and employers – interviews and advertisements – were collected to support the analyses of cases.

The different types of materials were supposed to highlight the complexity of gendering practices in occupational growth and vocational education contexts. In order to

<sup>5</sup> Practice refers here to repeated acts or activities, which furnish and signify entities (bodies, gestures, practices, language...) with meanings, like being/having gender.

understand the life course practices, the main documents were interviews with students, workers and employers. The approach was life-historical, discussing conceptions of work, skills, competences and their acquisition and the meaning of gender in any of them. Furthermore, comments on other actors and sites of work and learning were also asked. Beside “normal” life-courses and gendering practices, exceptional students and workers as well as career changers were interviewed in order to see how far and in which respects they were “exceptional”. The sites of education, primarily VET schools, were providing material both on gendering practices and practical discourses, but also from negotiating and national policy discourses. The material comprised observations on teaching-learning situations and on interviews with students and teachers, again also from exceptional students and from adult career changers and their teachers and trainers. The gendering practices and practical discourses at work-sites were studied through observations on work-situations and on interviews with workers and employers, some partners also with customers. All the collected data, especially from “exceptions” were analysed also from the perspective of possible transcending of gendered features of (key/core) competences and/or of transcending gendered practices, but some partners tried to maintain the case approach and continued reflections and discussions with practitioners at sites of work and education based on interim findings of research, and using this new data in analysis as well. Furthermore, additional interviews from career changers and their teachers were also used.

The analysis of data and development of interpretations was supposed to happen stepwise. Each partner should read the different types of materials in order to identify the essential features in the practices and discourses on the core of occupational competences and skills; on degree and quality of differences between their masculinity and femininity; on constitutive practices and factors (contexts) contributing to gendering. This was to follow with first, national comparisons between occupations, between contexts, between positions. In the second comparison partners should reflect and discuss their findings collaboratively. After this, the national and cross-national comparisons were supposed to be embedded into wider interpretative, cultural frameworks. In the third comparison, interpretations on gendering practices and discourses – and on options of transcending – should be discussed in relation to other discourses, nationally and cross-nationally. And finally, researchers should critically reflect on their assumptions and positioned projections in order to recognise their influence on research interpretations and outcomes.

### **3.2.5 Why transcend: Is gendering ethically right or wrong?**

The questions of categories, discourses and methods of research are inseparable from the ethical and political questions of why and for whom research is done. Whose projects are researchers promoting and which discourses do they serve with their findings? Despite explication of objectives, the target of Genderqual still is open to different interpretations: does transcending refer to competences without gender, or beyond gender or does it refer to transcending practices of gendering? Does the focus on key/core competences instead of occupational competences imply that they are more fundamental to transcend in combating gender barriers in employment and utilisation of human resources? Should we look at ‘generic competences’, which are exploitable in any work; or should we identify ‘general’, cross-occupational features of competences, which belong to any praiseworthy work? Or could we be open to the meanings and concerns expressed in the practical discourses among actors even if they challenge the imperatives deriving from other discourses?

From the perspective of shared humaneness: should the recognition of individual competences and all societally necessary work be encouraged and gender abolished?

Bob Connell has recently commented on the importance of developing competences in the gendering processes. "The idea of social embodiment, involving long circuits of practice allows us to recognize an important but un-theorized aspect of gender. Many gender processes involve bodily processes and capacities that are not sex-differentiated, that are in fact common capacities of women and men. Among the most important is the bodily capacity to labour. There are almost no sex differences of any consequence in capacities to work, apart from those created by different training, the treatment of pregnancy as a disability etc." (Connell 2002, 50) Whilst objectively, biological dispositions in reproduction need not to determine other features of individual very strongly anymore, then if sexuality would not be that dominant for being a human, perhaps gender as social sex could be abolished. (cf. Sipilä 1998)

However, gendered occupations and competences may have value as historical achievements of collectives and individuals and should they thus be respected? Consideration of VET as educational activity, not only as socialization, which is common in discussions about gender segregation, recognises its ethical and normative nature. (Cf. Heikkinen 2001a, Vogel 1996) It may be that some caring and technical competences, which have value for the whole humankind, have developed along with their increasingly gendered nature. Petri Sipilä, who considers gender as a tool for human reproduction in a wider sense, suggests that in the historically developed mentalities of people there are levels, which remind of the value of gendering. "Contrary to what we easily infer from sociological theories, we are not socialized into gender, because as boys and girls we are being given different names, different clothes and different toys; not because as children of different sexes we are being talked to with different tones and scolded for different reasons; not even because we are encouraged to enter different occupations and missions in life. We are socialized (into gender) because at some level of our thinking **we believe that all this is right.**" (Sipilä 1998) In relation to VET, we could say that the reason why we educate and let ourselves be educated into gendered occupations and competences, is our belief that it is good and just for human beings.

### 3.2.6 Methodological challenges and visions for future research

One of the biggest methodological challenges in Genderqual has been the difficulty to link approaches from gender studies to research on vocational education. According to Niemeyer (2002) this is due to their different categories and systems of reference. Discourses on key (core) competences are developed from the perspective of male-dominated labour markets and therefore underpinned by their gender specific interpretation. On the contrary, gender studies are mainly women studies: performed by women and focussing on the social conditions of women's life and work. How did the challenge materialise in the project? Whilst the competence discourse predominantly builds on individualised understanding of competences and the gender discourse on a socialisation model in adopting roles and construction of identities, the project tended to combine their universalising approaches. The original idea of reflecting on gendering practices as cases transformed into a search of typical characteristics of or advantages and disadvantages between men and women as individuals who were performing crucial competences and skills in the chosen occupations. We had difficulties to catch the transforming collective cultural practices, even if we had data from atypical students and workers as well as from career changers and their educators. Most of the respondents argued for core competences and skills, which rise from the occupational work, but we pushed them to report about (evaluative) differences between men and women. We had difficulties to theorise the differences as cultural femininities and masculinities, which the respondents attributed to empirical men and women. Since the gendering practices were not caught in the practical discourse, we moved the focus from the individuals directly to

the systemic economical and societal factors and segregated labour markets and structural inequalities. By looking for universal male and female characteristics we also lost the opportunity to question the clearly visible national (cultural) differences - in job profiles, division of tasks, occupational status etc. - between the occupational groups, which we had assumed to be very similar in all partner countries. For example, we did not discuss, why there were more similarities between Germany and Finland or between Greece and Portugal and how far "transcending" of gendering practices could mean the same in all these countries.

We learnt that gendering is so strongly and deeply inscribed into the daily routines and thinking that gender perspective cannot simply be added to the mainstream analysis of key competences. If the research could continue, how should we improve methodology? The first critical issue is the self-critical reflection of researchers about their role and position. The commitment to trans-national policy and the research discourse blinds researchers from practical discourses and actors' intentions. If they try to see closer, they cannot remain behind trans-cultural translations and interpretations, but have to proceed into cross-cultural sharing and dialogues on their material. Another improvement would be to strengthen the collaborative theoretical elaboration of basic categories and concepts, which the cultural embeddedness of researchers together with the disciplinary fragmentation of research on gender, work and vocational education makes especially important. Thirdly, cases (occupations, institutes, individuals) should more thoroughly be embedded into wider orders of work, occupational hierarchies and their relations to orders and hierarchies of education. The basic conditions for improvements in research work would, however, require more sharing of research practices and data collection, of cross-cultural discussions and ethical reflections and thus more time, engagement and resources in research.

### 3.2.7 References

- Anttonen, A., Henriksson, L., Nätkin, R. (eds.) (1994) *Naisten hyvinvointivaltio*. Tampere: Vastapaino
- Apo, S. (1995) *Naisen väki*. Helsinki: Hanki ja jää.
- Connell, R. W. (2002) *Gender*. Malden: Blackwell
- Dillabough, J.-A., Arnot, M. (2001) *Feminist Sociology of Education: Dynamics, Debates and Directions*
- Friedan, B. (1983) *Naisliikkeen uusi suunta*. Hämeenlinna: Karisto
- Heidegger, G. (1986) (1927) *Sein und Zeit*. Tübingen: Klostermann
- Heikkinen, A. (2001a) *Masters and Mistresses of the Nation*. In: Gonon, P. & Haefeli, K. & Heikkinen, A.
- Heikkinen, A. (2001b) *The Europe of Learning Organisations*. Draft for the final report of 5th framework project Forum for European Research on Vocational Education and Training. Forthcoming: ITB, University of Bremen
- Henriksson, L. (1998) *Naisten hoivatyö ja ammatillistumisen politiikat*. Helsinki: STAKES
- Irigaray, L. (1996) *Sukupuolieron etiikka*. Tampere: Gaudeamus
- Kinnunen, M. (2001) *Luokiteltu sukupuoli*. Tampere: Vastapaino
- Löfström, J. (1999) *Sukupuoliero agraarikulttuurissa. Se nyt vaan on sellainen*. Helsinki: SKS
- Narotzsky, S. (1997) *New Directions in Economic Anthropology*. London: Pluto Press

- Niemeyer, B. (2002) Gender and Key Competences – Conditions, Risks and Challenges of Researching Two Incompatible Systems. Paper presented at the Genderqual final conference 27.2.2002, University of London.
- Östman, A.-C. (2001) Kvinnorna och åkerbruksarbetet. Om det gemensamma arbetets betydelse. In: Rahikainen, M., Räisänen, T. (eds.). Työllä ei oo kukkaan rikastunna. Naisten töitä ja toimeentulokeinoja 1800- ja 1900-luvulla. Tampere: Tammerpaino
- Peltonen, M. (1999) Työnjako sosiaalisena tilana - Sukupuolenmukaisesta työnjaosta maataloudessa. In Parikka, R. (ed.). Suomalaisen työn historiaa. Helsinki: SKS
- Popkewitz, T. (ed.) (2000) Educational Knowledge. Changing Relationships between the State, Civil Society, and the Educational Community. State University of New York Press.
- Ronkainen, S. (1999) Ajan ja paikan merkitsemät. Helsinki: Gaudeamus
- Sipilä, P. (1998) Sukupuolitettu ihminen, kokonainen etiikka. Helsinki: Gaudeamus
- Toulmin, S. (1972) Human Understanding. Oxford: Clarendon Press
- Vogel, P. (1996) Scheinprobleme in der Erziehungswissenschaft: das Verhältnis von "Erziehung" und "Sozialisation". Zeitschrift für Pädagogik. 4/1996.

### **3.3 Description of results with respect to three target groups**

*Anke S. Kampmeier*

In between the selected occupations – electricians, nursery nurses and waiters/waitresses -focus of research laid on three target groups: "normal cases", "exceptional cases" and "occupational changers".

"Normal cases" in our research is the term for women and men in gender-typical occupations, so male electricians and female nursery nurses. Thus men and women in gender-untypical occupations were named "exceptional cases". Due to one of the research intentions, namely to investigate key competencies in situations of occupational change the third target group were "occupational changers".

Analysis of this three target groups led to a great number of results with regard to the questions of research.

First we can conclude that 'gender matters' in view of the individual in terms of the development of key competencies, in terms of occupational choices, in terms of personal development (cf. also Hoffmann in this report).

Boys and girls, women and men develop different key competencies. In general women show more strength in the area of social competencies and in the area of self competencies in view of industriousness, attentiveness, sensitiveness etc. In contrast to that men have advantages with self competencies like rationality and technical interest. In this respect the Genderqual results confirm results of other research about gender

differences (cf. Enders-Drägässer / Fuchs 1993<sup>2</sup>, Friese 1994, Helgesen 1992<sup>3</sup>)<sup>6</sup>. In the case of occupational changers it could be found that the relation between career changes and gender is dominated by the special situation of women in or out of labour market. This is due to key competencies acquired during family phases and due to special intrinsic motivation performed by women.

More detailed differences will be discussed in the three following subchapters, each elucidating them from different perspectives.

Although this research did not intend to analyse reasons and sources of gendered key competencies we could not discuss results without reflecting possible factors which contribute to the development of gender-typical key competencies and which in this respect are also responsible for gender segregation.

We came to the conclusion that of course personality and actions of the individuals, the cultural background, the structure of vocational education and training and structure of the labour market are determining factors for gender-different and thus gender-typical key competencies but socially ascribed gender stereotypes, which are not only social constructs but are lived experiences of individuals, have an influence that is even more determining.

This conclusion bases on the interview-statements of “exceptional cases” and of other interviewees who were asked about competencies of men and women in view of being or becoming either female electricians or male nursery nurses.

Concerning the effectiveness of these differences we can discuss four theses. One thesis is, that the differences affect occupational choice of women and men. E.g. because men are stronger they prefer hard work, whilst women prefer caring and social professions due to their higher grade of patience. Another thesis emphasises the influence of traditional social roles of the occupational choice. According to this thesis gender differences perhaps are advantages by doing the work but they do not have that determined influence for entering or for being successful in an occupation. This also goes for the third thesis: gender segregation in labour market is functional and holds up basic structures of society. According to the fourth thesis the “social hardware” (social and occupational conditions) has determinant impact on the occupational choice. Examples for this are

- vacant VET places and jobs,
- recruitment-practice of enterprises (some prefer either women or men),
- earnings,
- family organisation: who is responsible for household and children?
- childcare provided
- possibilities of working part-time and full-time
- etc.

Independent of these theses it has to be noticed, that occupational tasks and requirements influence the performance and practise of key competencies. Thus

---

<sup>6</sup> Male abilities, competencies etc.: to be the bread-winner, competitiveness, strong determination, orientation towards fixed rules, autonomy, referring to own interests

Female abilities, competencies etc.: caring for others, co-operation, communication, flexibility, to take different roles / ambiguity tolerance, creativity, responsibility, eagerness in learning

differences of gendered key competencies are getting intensified by gender-typical occupations and gender segregation gets reconstructed.

Research in VET institutions showed that gender and gender differences are not regarded as important, crucial or current issues for education and training methods and contents as well as for VET structure (gender-blindness, cf. Hoffmann in this report). Transcending this gender-blindness to a gender-sensitiveness can contribute to transcend gender barriers of VET and labour market and thus contribute to enhancing human resource potential. Gender differences should be used for the benefit either of the individuals, for vocational education and training itself (lessons), for the benefit of the VET institutions and for the benefit of the enterprises. Gender differences should not be polarised but each individual must have equal opportunities for occupational choice and career.

The following list contains some ideas for pedagogical and political measures:

1. Rising the awareness of gender specific key competencies in VET institutions and enterprises by reports, conferences, training etc.
2. Developing didactical and methodological models for mutual learning of male and female students with respect to key competencies: e.g. educational subject for men and technical subject for women, teamwork of women and men and reflection afterwards, student exchange and student co-operation of traditional male and traditional female occupations.
3. Appreciating "exceptional cases" as "magnifying glasses" (Hoffmann in this report) for gender segregation / discrimination in VET and on labour market and learning from them.
4. Supporting "exceptional cases" during VET by experienced exceptional cases (companions, mentors) through talks, special training and „political representation“.
5. Supporting "exceptional cases" in enterprises by special representatives.
6. Valuing and using key competencies acquired during family phase or times of unemployment by institutions of VET and CVET and by enterprises.
7. Supporting female and male dominated enterprises in view of acceptance of "exceptional cases" by information and sensitisation by discussions, visitations of other enterprises, exchange of enterprises in view of exceptional cases etc.

The following subchapters give detailed analyses of the situation, problems and possibilities with respect to gender and key competences of the three target groups "typical cases", "exceptional cases" and "occupational changers".

## References

- Enders-Drägässer, U. / Fuchs, C. (1993<sup>2</sup>) Interaktionen der Geschlechter. Sexismusstrukturen in der Schule. Weinheim, München: Juventa
- Friese, M. (1994) Frauen in „Männerberufen“ – Eine Pionierleistung der Gegenwart? Über den steinigen Weg der gewerblichen Professionalisierung von der Industriegesellschaft bis in die Gegenwart, dargestellt am Handwerk in Bremen. In: Dickmann, Elisabeth / Friese, Marianne (ed.) (1994): Arbeiterinnengeschichte im 19. Jahrhundert. Studien zum sozio-kulturellen Wandel und zum politischen Diskurs in den Frauenbewegungen in Deutschland, England, Italien und Österreich. Vorträge eines Workshops an der Universität Bremen 1993. Münster, Hamburg, S. 310 - 332

Helgesen, S.(1992<sup>3</sup>) Frauen führen anders. Vorteile eines neuen Führungsstils. Frankfurt,  
New York: Campus

### **3.3.1 Description and analysis of “Typical Cases”**

*Eduardo Figueira, Paula Salvador*

#### **3.3.1.1 Introduction**

This chapter intends to describe and analyse the situation of the so-called “Typical Cases” with regard to job occupation in the partnership involving five regions where investigation was developed. This study aims to compare typically female jobs and typically male jobs in the partner countries. “Typical” means something that occurs often and is ordinary. Thus, “typical cases” are regarded as the opposite of “exceptional cases”, in which women perform male jobs and men perform female jobs.

#### **3.3.1.2 Learning from Typical Cases**

##### **Professional choices**

With regard to the analysis of cases regarded as typical, it seems possible to declare that professional options are essentially influenced by the social and cultural context. Indeed, the majority of interviewees declare they have chosen their occupation through the influence of relatives, friends or their social surroundings (for instance, their father, mother or husband has the same job, their relatives own a company, they are used to taking care of their siblings or the neighbours’ children, in the case of nursery nurses). However, it has been proved that professional choices are different for men and women (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

Generally speaking, women tend to choose mainly fields related to serving the community, whereas men tend to pursue careers in the areas of commerce and transforming industries, namely electricity and mechanics. The tendency is for men to choose jobs traditionally dominated by their own gender. Interviewees have forwarded several reasons to account for this, emphasising social and cultural factors. Bearing in mind social representations, men and women play different roles in society: women spend a great part of their time doing domestic chores and looking after their children, and they need to have some flexibility at work, whereas men are in charge of financially supporting their family (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

Another discriminative aspect is related to the companies, which themselves do not provide the necessary conditions that will enable men and women to work in jobs traditionally dominated by the opposite sex (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

In Portugal and Greece, although there is no perception of opportunities and the education levels have been regarded as important factors with regard to professional choices, social bias and self-discrimination on the part of both men and women seem to have a greater influence when they have to choose their professional career (Figueira, Salvador, Patiniotis, Kaminioti 2001). These are probably the reasons why divulgation campaigns in Portugal promoted by the IEFPs in order to influence young women to attend traditionally male professional courses have not been successful. Even so, it has been seen that women are generally more determined to perform jobs dominated by males than men are determined to choose jobs dominated by females. For instance, in

Portugal, Greece and the United Kingdom, there are few men that choose to become a nursery nurse or a kindergarten teacher due to these jobs' low social status and low salaries (Figueira, Salvador, Patiniotis, Kaminioti, Hoffmann 2001). However, in Germany seemingly the opposite takes place, that is to say that women seem to face more difficulties when they try to occupy traditionally male jobs: there are more male nursery nurses than female electricians. In addition, men seem not to worry so much with the low wages and low social status of their job and try to make up for some lack of competencies by attending training seminars (Kampmeier, 2001).

In Finland, men don't even mind to work in female dominated areas because they believe women provide a better work environment. Women value their family's opinion more, unlike men, who don't tend to let themselves be influenced so much with regard to professional choices. In Finland, men will rather have also a higher income as they believe that salaries influence the quality of their work (Heikkinen, Huttunen 2001).

In Germany, an electrician has a good position in the labour market, and there is a high demand for this job, namely on the part of men. This situation can be explained by women's behaviour itself, since they don't like electricity and are afraid of it. Nowadays, a great part of women choose to have a college degree. Most women perform mainly administrative tasks. Their working experience is often diversified because they are also the ones most affected by occupational mobility. Trying to get better wages, motherhood, willing to overcome new challenges and the fact that they don't like to occupy themselves only with domestic work are the main causes for this situation (Kampmeier, 2001).

In Greece, part-time waiters are a very ordinary occurrence. For many people this is regarded as secondary work with the aim of getting an extra salary. Training in this area is not required, unless they work in hotel restaurants. Nowadays, there are several professional male and female workers that attend training courses at their own workplaces (Patiniotis, Kaminioti 2001).

Choosing a professional course in the several available offers is justified by the fact that individuals drop out of school after concluding the compulsive education level (Patiniotis, Kaminioti 2001).

## **Key Competencies and Gender**

According to this analysis and taking into account the research carried out in the United Kingdom, Greece, Portugal and Germany, we can say that, generally speaking, competencies are often related to male behaviour and female characteristics (Kampmeier, 2001). In Finland opinions are slightly different, with the conclusion that both men and women are competent but in different ways, using gendered expressions and attributes. Gender differences are more typical when habits and tasks are observed: women are characterised by their empathy, communication and aesthetics, whereas men tend to centre more on tasks that are physically demanding. Social competencies seem to be important for all occupations (Heikkinen, Huttunen 2002).

Nevertheless, some interviewees' declarations on the characteristics and performances of men and women at their workplace were obtained during the course of this study. Here is then a summary of some competencies that were frequently referred to by interviewees: "liking children" was regarded as an essential requisite for those who are/ aspire to be nursery nurses; "liking the job" and "knowing how to deal with electricity" were necessary conditions for electricians/ electricians to be (Kampmeier, 2001).

In the scope of the three areas under scrutiny, it is possible to say that there are characteristics and competencies associated with gender. For instance, waitresses are

depicted as braver, more patient, more precise and more apt for decorative and aesthetical tasks than their male counterparts. Moreover, waitresses are more affable and self-confident than waiters (Kampmeier, 2001). With regard to jobs that require a higher degree of technicality, men are more interested than women in performing technical activities and are also more well succeeded in more practical jobs such as electrician, mechanic, etc. (Kampmeier, 2002).

There are other data that suggest that women show some difficulty to adapt to dirty, uncomfortable and heavy work. Besides that, according to the pieces of information collected, competencies are often related to individuals' behaviour, which is on its turn related to personal characteristics. This leads to the perception that the concept of skill itself links individuals' strength and weakness in different working contexts (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

To sum up, from the pieces of information collected through interviews carried out in the five partner areas, it was possible to produce the table below, which includes a set of key competencies and characteristics associated with gender and organised in terms of advantages and disadvantages.

Table 1: Summary of general gendered key competences

More typical competencies for Women	More typical competencies for Men
<p>Advantages</p> <ul style="list-style-type: none"> <li>more industrious</li> <li>more attentive</li> <li>accept better routines</li> <li>accept better externally controlled work</li> <li>more sensitive</li> <li>more sweet-tempered</li> <li>more patient</li> <li>better in taking care of children</li> <li>take care of the basic nursing</li> <li>motherliness</li> <li>better with dexterity work due to physical preconditions and patience</li> <li>better with fine work</li> <li>work more emotionally</li> </ul>	<p>Advantages</p> <ul style="list-style-type: none"> <li>power</li> <li>intrinsic interest in electrical phenomena and processes</li> <li>emphasize entertainment</li> <li>better with heavy work</li> <li>work more rationally</li> </ul>
<p>Disadvantages</p> <ul style="list-style-type: none"> <li>less original in mathematical and technical thinking</li> <li>suspicious to adapt dirty, uncomfortable and heavy work</li> </ul>	<p>Disadvantages</p> <ul style="list-style-type: none"> <li>less emotional</li> <li>less relaxed in social contact</li> <li>less relaxed in acting with their bodies</li> </ul>

(Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby- Smith, Hoffmann, Patiniotis, Kaminioti, 2002)

Thus, by analysing the table above, we can see that the differences among competencies can be intensified by typically male or female occupations and gender segregation is prone to be rebuilt.

Women have advantages over men in the context of personal and social competencies, which is not to say that men don't possess some of those advantages in certain areas as well.

At the level of disadvantages for women, they are less apt for more technical fields (mathematics, technology, dirty, uncomfortable, heavy work).

### Examples of “typical cases” in Portugal

#### Electricians

Rui, male, 19 years old; attended a course of electro-mechanics. He is attending a vocational training course of instalment electrician. He chose this course because he wanted to work with his father in an electricity company; he has already done air conditioning instalment. He got information through some friends who attended the course. He states that women could perform this job, however as there are only men in the job market, women don't like. *“Certainly, women would fit more on other jobs for which we do not fit. It's a question of mind.”* In his opinion, in the professional school's leaflets, there isn't any kind of discrimination. There is a woman in the course and he likes having her as a schoolmate; he also refers that there should be more women choosing the electricians' course and job.

Jacinto, male: 21 years old. He has the 9th grade and he is electrician. After having attended the vocational training course of instalment electrician, he has worked for a month in a storehouse of electric material. He has been working in the company for 2 years. His situation is stable. His competencies are: doing instalments (connecting wires), putting tubes and turning on engines. For his good performance, he considers he needs good competencies and experience. He added that as requirements, it is necessary *“to pay attention to what you are doing, being professional and memorize”*. On what concerns motivations to vocational choice, he mentions that he liked wires and doing instalments since he was a child. Besides, his uncle is also an electrician and he motivated him. He always had a lot of interest by electricity and the rewarding is good. Then the opportunity to attend the vocational training course in IEFP came up and there were no hesitations. He admits that it is a dangerous job but it doesn't demand much physical effort. He is pleased with the working conditions and with his salary. He mentioned that his vocational training course was very important in the competencies' acquisition: *“Vocational Training was useful for me as a way to get adaptation to the job”*. As for representations, in terms of gender, Jacinto mentioned that this job is a man's destiny and that he can't imagine a woman as electrician. *“In this job, a male worker is a better performer, for sure (...) perhaps because women aren't educationally prepared. Women, when they were children, didn't play with electricity.”*

#### Nursery Nurse

Inês, female, 23 years old. She is attending a vocational training course of nursery nurse. She chose the course because she likes children. She made her inscription 4 years ago, but she was called only now. She worked in a grill house as shop assistant and she dismissed to attend the course. She was informed about the course through her friends and considers it a female's course. *“They care much more about children and give them affection. They are much more sensitive and they have more feeling. I can't imagine a*

*man changing diapers.”* In her opinion, women choose this job, perhaps because the informative leaflets appeal more to women. She would like to see men in these occupations, but she defends that they wouldn't know how to deal with children because they don't know what being a mother is.

Júlia, female, 33 years old. She has the 11th grade and she is a nursery nurse. After giving up studying, she started working as a shop assistant in a bakery, but she got pregnant and was dismissed. Meanwhile, she changed her address because her husband changed job and as she was unemployed, she made her inscription at the job centre. She wished being a kindergarten teacher since she was a child and when her son was born that desire became bigger. Then, there was the opportunity to attend the course and she started working in the kindergarten school, where she was a trainee and still works there now. In her opinion, a nursery nurse must be tender and understand children. She is in a classroom helping a kindergarten teacher with games, drawings and other spare activities. At the beginning, as she hadn't experience, the course was very useful. Presently she likes what she does and her salary is acceptable. If she finished the 12th grade, she would like to go to University and get a degree of kindergarten teacher, but she hasn't enough time. Concerning the possibility of having more men in this job, she says that it is a job with a female representation because since a long time ago this is a female job. *“It is a question of mind.”*

### **Gender segregation**

The issue of tasks performed by men and women remains an up-to-date discussion theme, often featuring professional situations where there are differences between the genders. According to observation and interviews carried out in training and workplaces, it was possible to ascertain that there are several differences between men and women both in typical professional areas and in exceptional areas.

In Greece, being a nursery nurse is a typically female occupation, and there is even gender segregation with regard to trainers in the training course. This is regarded as a low status job and it requires few qualifications (Patiniotis, Kaminioti 2001).

In kindergartens, women show some specific traits that distinguish them from men, such as being more tender and patient, being able to help children more effectively in their basic hygiene and feeding routines such as feeding or clothing babies, whereas men are more able in the scope of entertainment such as singing songs and playing games. Both trainers and female nursery nurses themselves consider that male workers have indeed less sensibility to work with children and show less aptitude to establish social contacts, either with children or with their parents (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

On the other hand, the division of labour between men and women is also noticeable in activities linked to restaurants. Men are given heavier tasks, such as carrying chairs and tables, whereas women perform lighter or decorative kinds of work, such as table ornamentation. Nevertheless, this labour division is not actually always in agreement with individual wishes and preferences for both genders. In Finland, there is the same percentage of waiters and waitresses in restaurants, although it's easier for men as they don't have the same family obligations as women do (Heikkinen, Huttunen 2002).

In electricity companies, even though women are able to perform tasks that demand physical competencies and patience, men seem in fact more able to perform the tasks that are inherent to this professional area due to their different physical abilities and strength. This segregation can still be justified by the fact that women don't become adapted to the dirty, uncomfortable and heavy work such as being an electrician requires.

Presently, the process of choosing a job is influenced by professional schools in the United Kingdom. One of the ways that has been suggested to overcome the gender segregation that takes place in the schools is the introduction of traditionally female and male subjects into the curriculum. With regard to possible propositions, it can be said that professional training schools should be able to encourage the reconceptualisation of the definition of “female” and “male” mores in the training culture and in the employer culture as well. Gender differences cannot be polarized (Hoffmann, 2001).

### **3.3.1.3 Final Considerations**

In general terms, we can say that gender segregation is a theme that has been discussed throughout the times, since professional situations in which behavioural differences and difference of competencies between the genders when performing the same activity are often found. Not only does this occur in the so-called male or female jobs, but it also happens in mixed professional areas. For some people, this is due to each gender’s specific competencies; for others, this is the result of the social, cultural and educational context which individuals belong to. Professional choices were indeed made due to the influence of either family or friends, or because of specific social pressure, in the most cases. This is the reason why men and women tend to choose jobs that belong to professional fields traditionally dominated by their own gender (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

Professional choices are different for men and women because their motivations and attitudes are also different. Girls don’t feel very motivated to attend courses where the majority of students are boys, and vice-versa. Women also prefer to perform more customary tasks which are related to social service, whereas men prefer technical and creative jobs more linked to transforming industries. On the other hand, by its reproduction of social representations, the educational system guide women into taking charge of family responsibilities and men into supporting financially their family. Men are also guided into performing heavier types of activities. We can also conclude that professional choices are determined by social prejudice and by self-discrimination itself. We can still say that occupational choices are affected by traditional roles as far as both genders are concerned. This in its turn shows on differences with regard to behaviour and competencies, which, however, are not decisive for success in a given job. On the other hand, one must take into account working conditions, since men and women may be influenced in their choices if the workplace doesn’t provide the necessary conditions for their working together (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

It can be said that there is no doubt whatsoever that men and women have different specific characteristics, namely biological in kind, that allow them to be clearly distinguished. Whereas men are more prepared to perform physically demanding tasks, women behave differently, being more patient and adaptable to decorative and aesthetic tasks, as well as taking care of children. This means that the inequality between men and women with regard to the labour market can be more easily justifiable by behavioural differences: traditionally women prefer one kind of activities, while men prefer another.

Despite the barrier breakthrough as regards gender that is taking place in contemporary society, a great part of the individuals’ distinctive traits for both genders are closely associated with social representations, thus being influenced by cultural, economic, educational, ethnical and even familial factors. Faced with this, the project Genderqual has aimed to analyse the impact of gender segregation in the labour market and in VET, paying special attention to key competencies and qualifications and to the process by

which they are acquired. There are multiple reasons that can account for these barriers, which are both biological and socio-cultural, that facilitate thus the process of gender segregation. There already is an unmistakable awareness of those factors, and it is clear that they are a hindrance for the updating of professional and social activities, although it's also known that they will not be easily overcome in the short run. These barriers influence individual options with regard to professional careers, no matter what the gender is, thus being also a serious obstacle to the development of human resources. So, VET systems should think of strategies that could provide men and women with equal opportunities in the labour market through the acquisition and acknowledgement of competencies and qualifications (Figueira, Salvador, Heidegger, Kampmeier, Heikkinen, Huttunen, Evans, Saxby-Smith, Hoffmann, Patiniotis, Kaminioti 2002).

The study has made it clear that the historical, social and cultural barriers with regard to the labour division in the labour market must be overcome, which will require policies and strategies that can lead to a change both in thought processes and in social representations. This won't be an easy task since one can't change thought processes out of the blue, which doesn't preclude the need to outline solutions in order that people may become aware of their competencies, namely through making of and divulgation of reports, conferences and promoting training seminars. Professional schools must also develop mutual learning models for both genders. They also must rearrange their training curricula by including educational themes for boys and more technical themes for girls. On the other hand, it would be advisable that sensitising campaigns targeted at employers and families were organised, in order that the children's education and values could be somewhat corrected by the family.

#### **3.3.1.4 References**

- CESO & D (2000) Diagnóstico e Estratégias no âmbito da Igualdade de Oportunidades, Relatório Final. Lisboa
- Costa, S., Santos, S. (1997) Estereótipo da mulher em Portugal e a sua relação com a discriminação sexual no trabalho, Lisboa: CITE
- Ferreira, V. (1999) A Segregação Sexual do Mercado de trabalho- Perspectivas teóricas e políticas. In: Sociedade e trabalho ( nº6 ) Lisboa: Ministério do Trabalho e da Solidariedade
- Figueira, E., Salvador, P., Heidegger, G., Kampmeier, A., Heikkinen, A., Huttunen, U., Evans, K., Saxby-Smith, S., Hoffmann, B., Patiniotis, N., Kaminioti, O. (2002) Género e Qualificação. A questão das competências-chave associadas ao género na escolha da carreira profissional. In: Economia e Sociologia: Évora: Estudos Superiores de Évora
- Jacobs, J. (1995) Gender Inequality at work, Thousand Oaks: Sage
- Reskin, B., Padavic, I. (1994) Women and Men at work, Thousand Oaks: Pine Forge Press
- Silva, M. (1983) O emprego das mulheres em Portugal: A mão invisível na discriminação sexual no emprego. In: Crítica e Sociedade. Porto: Edições Afrontamento
- Silva, M. (1999) A Discriminação Sexual no Mercado de Trabalho: As questões mais polémicas. Porto: Universidade Fernando Pessoa

### 3.3.1.5 Partners Reports

- Evans, K., Saxby-Smith, S. (2001) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 3rd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Surrey
- Hoffmann, B. (2001) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 2nd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Surrey
- Patiniotis, N., Kaminioti, O. (2001) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 2nd and 3rd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Patras
- Kampmeier, A. (2002) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual), Common Report (financed by 5th Framework Programme- Comissão Europeia). Flensburg
- Kampmeier, A. (2002) Gender and Qualification: Are gendered differences ignored? Flensburg . Presented at the ECER Conference in Lille
- Kampmeier, A. (2001) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 2nd and 3rd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Flensburg
- Heikkinen, A. (2002) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 2nd and 3rd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Jyväskylä
- Figueira, E., Salvador, P. (2001) Transcending gendered features of key qualification for improving options for career choice and enhancing human resource potential (Genderqual). 2nd and 3rd National Genderqual Reports (financed by 5th Framework Programme- European Commission). Évora

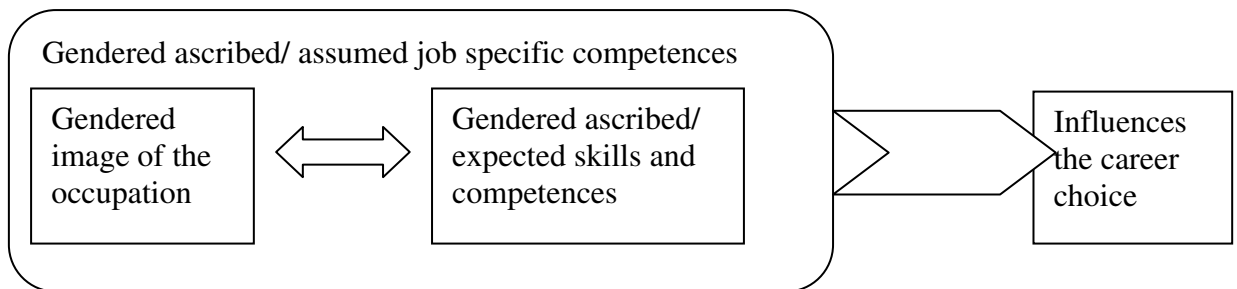
### 3.3.2 Gender and Qualification` - The importance of the exceptional cases for the project

*Bettina Hoffmann*

#### 3.3.2.1 Introduction

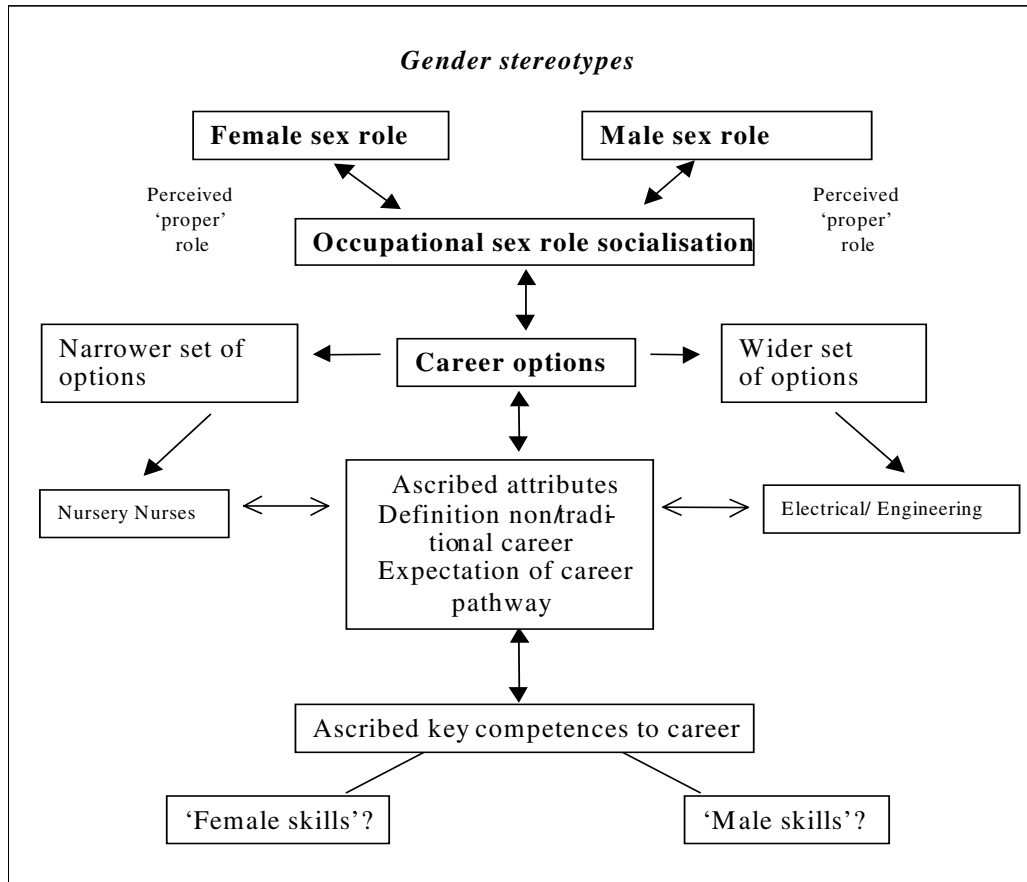
The most important outcome of the project (with respect to the exceptional cases) is that 'Gender matters!' for the individual in terms of the development of key qualifications, in terms of occupational choices and in terms of personal development.

Career choices especially young people undertake are highly gendered. The image of the job or occupation and the ascribed and expected skills and competences to it are highly gendered and young people seem to make career choices along gender and sexrole stereotyped lines.



As a result of sex-role socialization, sex differences in occupational orientation and preparation arise prior to entry into the labour market. The following model considers the probable relationship between this sex typing and subsequent sex segregation in the labour market.

**Figure 1: Model for thought clarification**



Some research participants considered the existence of sex differences in abilities, such as physical strength and verbal and quantitative skills, and in dispositional traits, such as aggressiveness, sociability, and self-confidence. Therefore it could be argued that all of these sex differences are determinants of sex segregation in the labour market. More specifically, it was argued that women and men occupy different positions in the workplace because they choose different occupations and are differentially qualified for various types of jobs, as some interviewees explained. These explanations attribute sex segregation to sex differences in individuals, including occupational preferences, skills, and other personal attributes. Here women and men are hypothesized to be employed in different occupations because they choose different occupations and because they are differentially qualified for various types of jobs.

## Gender stereotypes

=>

Jobs/ occupations are/ become sex-typed

=>

female/ male individuals (workers) internalise these stereotypes (negative stereotypes for women “engineering”, negative stereotypes for men “nursery nurses”)

=>

these stereotypes equate one’s job capabilities and skill level with sex “sexrole spill over”

=>

leading to an exclusion and ignorance of female and male skills in certain occupations

=>

women maintained as low-skilled and low-status => considered to be different than men

=>

**the sexist social framework intensifies the pattern of female/ male skill.**

These statements of the participants clearly show the ‘invisibility of gender’ in the practices and processes concerning education, training and working life. People’s perceptions and unconscious gender stereotypes become apparent and clear. These statements contrast firstly explanations of sex segregation that focus on the actions of employers and the structure of the labour market found in the literature. Secondly they contrast the explanation that gender is a social construct, which is culturally determined. They exemplify that gender is based on beliefs and gender stereotypes and refer to given roles of a society; a phenomenon against which the exceptional cases are set and against which they have to ‘fight’.

### 3.3.2.2 How do the exceptional cases experience and challenge this phenomenon?

The analysis directly draws on the experience of the exceptional cases and their reflections on how they feel and what difficulties, obstacles and barriers they have to face during their education and training period and in the working context/ life. The exceptional cases challenge our taken-for-granted understandings as they turn the above mentioned and general statement upside down and demonstrate that it is possible to take up the ‘different gender’ job and be successful in it. What is important here and highly relevant for the project are the exceptional cases as they represent a ‘magnifying glass’ through which the gendered nature of career pathways and labour market are pointed out. The exceptional cases represent an ‘outsider’ view, they question as what is seen to be the norm, they bring in a different perspective and outlook on the occupational field due to their ‘different gender’.

First of all the analysis of the ‘exceptional cases’ identifies and attests the ‘existence’ of gendered features of key qualifications and of occupations and jobs. The exceptional cases very much state that ‘Gender matters!’ for the individual in terms of development of key qualifications, in terms of occupational choices and in terms of personal development. The analysis of the exceptional cases shows a strong relation between gender and key competences or the relation of gender and areas of work. How gender is situated or

constructed is relevant for the enquiry into men's and women's experience in non-traditional areas of work. The exceptional cases also demonstrate that there is a different way and another possibility of choosing an occupational field, as they take up career choices – not along gendered lines - but according to personal interests and favours despite their gender. All in all the exceptional cases allow insights in how young peoples' choices of career pathways are influenced in general and how the gendered nature of occupational areas affect students' and workers' occupational choices, their personal life and feelings.

### **Description of the exceptional cases - Who are they?**

In this research, the exceptional cases are :

- women who are working or studying in electrical engineering/ or as electricians.
- men who are working as a nursery nurse or studying to become one.
- Experience of great difficulties in finding 'exceptional cases' due to the low status and low pay of the jobs and the gendered nature of the occupational fields.
- Distribution of cases: In the UK more females can be found in engineering than males in nursery nursing.

### **3.3.2.3 What do the exceptional cases tell us?**

The interviews and the case studies of the exceptional cases show that students' choice of subject and career pathway is not merely personal preference but a function of external forces and conditions channelling students into a choice (Thomas, 1990). This 'channelling' reflects the dichotomous notions of masculinity and femininity (Stanley, 1990), but interestingly female and male students in non-traditional areas challenge these false dichotomies.

The importance and implications of gendered understandings of practice received a different emphasis and urgency in the analysis of the exceptional cases than through the analysis of 'normal cases'.

The relative importance of gender to identity in the work context became visible. The students' identity (here the notion of identity does not refer to a single identity as people may experience more than one identity, here it became clear that the students were very much aware of and captured in their gender identity and gender difference in a non-traditional area of work) and the meanings, beliefs and interpretations about themselves and the field of work, which they bring into the context can be seen as one big key issue concerning work practices and the reproduction of gendered areas of work.

The students described as exceptional cases struggled with themselves being 'different' and representing the 'wrong' or 'inappropriate' gender for the field of work they are working in. Males and females in non-traditional occupations still feel different and 'know' about them being different, and are struggling with their gender identity. This phenomenon of 'gender identity' was clearly addressed by the exceptional cases. The issues of gender within individual identity are complex and play an important part in the development of identity within individuals, but seem to be treated as an oversimplified topic. Issues of sexuality and being seen as a 'real man' or 'real women' interplayed with the notion of gender identity. On the other hand, the students in non-traditional areas expressed feelings that the 'difference' of the occupational field attracted them. The female exceptional case e.g. was attracted to the very male characteristics of electrical engineering. As students, tutors and workers expressed concerns and feelings about their gender identity it became clear that the individual level is as important than the institutional level regarding "gender" in a work and learning context.

### **Emergent themes and issues**

- Untypical interests / hobbies & favourite school subjects
- Support of Significant Others
- Personal attributes: confidence, resilience, commitment, motivation
- Factors affecting occupational choice: 'calling' / vocation
- Sexuality ('real' man / 'real' women ?)
- Gender Identity
- Difficulties experienced (work / life in 'exceptional' job)
- Expressed thoughts about gender differences

Still the influence of parents (e.g. parental expectations), peer group pressure and sex role stereotypes is so strong that it prevents females and males from exploring and taking up non traditional career options. But on the other hand is very important and significant for the exceptional cases to experience a lot of support and positive encouragement in their decision-making process from a very close person, e.g. father or grandfather, from their families or friends. Newton (1987:195), in her study of women in engineering, cites a number of factors relating to the choice of engineering as a career. She makes the point that female engineers were quite likely to be the daughters of engineers, and that the father's attitudes are important in the choice process. She says also, 'they were significantly more likely to have played with unconventional (boys) toys in their childhood'. This would appear to be the case with Liz, who said that she preferred, as a child, to play with Lego® and 'try to assemble and dismantle things', rather than play with 'girlie toys'. The exceptional cases expressed their interest in the 'wrong gender' toys and hobbies. His was also reflected in their choice of school subjects.

All the exceptional cases showed a keen interest in the chosen field of work, were very committed to it and expressed a confident and motivated attitude. They were determined to follow the chosen career path despite the barriers set up for them. They all 'felt' a 'calling' for this career or job (vocation).

### 3.3.2.4 Conclusion

The exceptional cases show the 'invisibility of gender' in teaching and learning processes and in work and social life. Although in general staff and tutors of the colleges expressed an 'assumed' common understanding and belief concerning the gender issue, (they indicated that gender was of "no concern" and "not a problem" at the college and/ or workplace (found in the responses to the questions)), gender issues could be identified, underlying the work and learning context in an unarticulated way.

That 'there is more to 'gender'; it is not only a social construct (Gaskell, 1992/ Davies, 1999) but also a 'lived experience' (Cameron et al, 1999), "constantly subject to construction and reconstruction, it is imbedded in workplace institutions and provides a framework for how to be" (p.20). That at work and in the training place (college) gender is being regularly 'ignored', either because it doesn't seem to be important and 'everything seems to be fine'-there is no problem with this issue- , or because people are disappointed and discouraged from former experiences with gender awareness programs and the outcome of campaigns to attract students, especially girls, into non-traditional areas. But the 'invisibility of gender' is apparent when talking to the tutors and trainers as most of them cannot see a difference between female and male students and in their performance. Another characteristic was that the 'understanding' of the expression 'gender issues' differed among the research participants. It seemed as if the interviewees viewed the question "*Is gender an issue/ of concern to the staff and students in these courses?*" with a negative 'tinge' and interpreted it as either *Is there a problem in having male and female students on the course at the same time* or even on a more personal level *Do you experience a problem in having both female and male students on the course?*

#### What has come out of it?

The exceptional cases show:

- The 'invisibility of gender' in training and work practices, the denial of gender- it is not an issue
- The lived experience of gender is important to the individual and has to be acknowledged
- The potential for transcending gendered occupational choice as the exceptional cases show - this means opening up choices for people

Many teachers and trainers, both female and male, regard gender to be irrelevant to their work, another example for the gender invisibility in the work and learning place, and at the same time assumed that the same 'gender' understanding is present, e.g. a particular set of gender values are shared by everyone. But the exceptional cases expressed that they

perceived and 'felt' differences while being in this course/ occupation. These students were very aware of their gender roles and identities and sexuality in the courses and were very much aware of their position in the course and at work and their 'difference' in terms of gender. Also their colleagues 'felt' the gender and sexuality issue being present in the classroom.

### 3.3.2.5 Ways forward

As the data provides insights in gendered understandings and stereotypes, it at the same time illustrates that the values in the occupational fields are socially constructed and not inherent. This means that VET might be able to encourage a reconceptualisation of definitions of 'masculine' and 'feminine' values and gender issues in education and training culture/ processes and in occupational job definitions. It is important to emphasise that gender differences are not being polarised; instead the difference in the perceptions is made visible and gender inequalities are addressed. As practices and cultures as they currently exist are unacceptable and an aspect of the situation. Both school and post 16 education need to adequately address gender equity issues in order to overcome the 'invisibility of gender'. So far the career decision-making processes and career exploration process are neglected processes in school and in the transition to work and in the process of growing up. Moving from Gender-Blind to Gender-Sensitive Policies and Programs as suggested by Gaskell (1999) is essential; e.g. the use of gender-inclusive language. As the 'exceptional cases' – males and females in non-traditional occupations are still being regarded as exceptions to the norm and it is still expected of them to adapt to the current system and situation. This is an inflexible, one-dimensional process, which hardens stereotypical work conditions and environments and which VET has to overcome.

The exceptional cases and their colleagues need a 'space' to try out, play and find an understanding of their 'different gender'

### Ways forward ?

Rethinking has to take place ...

- How can VET overcome 'gender-blindness' and integrate the lived experience of gender into the pedagogical process ?
- A place for the individual and their gendered experience.
- A new concept of key competences which includes gender ?
- What do people understand and mean when talking about 'gender', the concepts of 'gender' and 'equal opportunities'
- Why did the initiatives in the 1980s not succeed in attracting women to male dominated jobs / careers ?

VET would need to offer an alternative model of education and training where gender is not viewed as a divided system or opposites. A model in which feminine and masculine traits are challenged and equally treated. A different pedagogy, which is not gender-blind and challenges the underlying unbalanced, gender-inequity curricula in all (three) occupational areas could contribute to transcending gender barriers and segregation. Trainers, employers, tutors need support to acknowledge and recognise the difference in experiences of male and female students/ workers; and to confidently address and explore these gender issues. The experiences and 'stories' of the exceptional cases should be valued and integrated in the VET practices.

As on result a hypothesis could be set up: as to find an expanded or new concept of key qualification could overcome gendered features of key qualifications; it is needed to contribute to the transcending of gender barriers and gender segregation!

### **3.3.3 Career Changes and Gender**

*Anke Kampmeier*

#### **3.3.3.1 Introduction**

This chapter deals with situations of occupational changes focusing on differences between women and men as well as (key) competencies and their transferability.

The statements result from interviews with 127 interviewees and group discussions in the five partner countries.

Four aspects with regard to the situation of occupational changers will be lighted up:

1. Occupational choice and motivations for occupational changes
2. Occupational identity
3. Key competencies and occupational changes
4. Gender, key competencies and occupational change

The first two subchapters will describe the situation of occupational changers or occupational changes in view of significant aspects of this third target group of our research. The third subchapter analyses key competencies and occupational change in detail and the fourth subchapter combines all findings in view of the main question of our research: Gender and key competencies.

#### **3.3.3.2 Occupational choice and motivations for occupational changes**

In our research-sample occupational changers can be subdivided into two groups:

1. Occupational changers, male and female, due to economic or personal reasons
2. Women returning into labour market after family phases

The occupational choices of our interviewees are affected by a range of factors:

- unemployment,
- higher pay,
- skills and competencies,
- educational and work experiences,
- personal wishes of changing and improving private situations,
- qualifications (certifications)
- family (parents, husband / wife, ...),
- gender distribution in the labour market,
- needs of the labour market,
- training opportunities,
- caring and domestic responsibilities,
- ...

These factors depend on different life phases of the individual. The first occupational choice surely is very much dependent on the influence of the family (parents), whilst further occupational choices are more dependent on personal interests (mature personality) and circumstantial factors („social hardware“: social and occupational conditions, cf. Kampmeier 1/2002).

A kind of “social hardware” affected Finnish people in view of their occupational choice: the special industrial situation in Finland. Changes of the industrial structure (rationalisation of manufacturing and service jobs, collapse of agricultural jobs) result in rapidly increasing casualness of employment together with educational policy of „qualifying“ all workers and thus an erosion of experiential pathway into recognised occupational positions.

Women are seldom complete occupational changers, but they enter vocational courses in fields they already have experienced due to their (unskilled, unpaid?) work in family enterprises, also untypical occupations (“exceptional cases”) (cf. Heikkinen / Huttunen 12/2001).

In contrast to that men have other motivations for occupational changes, e.g. more rewarding and creative work or change of work due to change of their personality as a result of „ethical awakening“ due to serious illness, death etc. (Heikkinen / Huttunen 12/2001).

If occupational change is produced by personal wishes of changing and improving private situations as mentioned just above, transitions really can be seen as **occupational choices**. People then have strong personal motivation of gaining new challenges, new activities and new aims for their life.

In addition to the Finnish men this also went especially for the women returners of the German research sample. >>Changes in these cases are very much regarded as **personal choices** instead of outer constraints.<< (Kampmeier 2/2002, 9).

In contrast to that are the British interviewees, who mainly reported outer constraints (earning money for supporting relatives) as reasons for their occupational changes. They mostly were not satisfied with their choices because they did not really have the choice.

The same is true for the Portuguese female interviewees. Most of them had personal reasons for an occupational change like marriage and removal or children. For others there were outer constraints (e.g. support of the parents due to illness, end of contract or company’s closing) that led to unemployment or occupational change.

The following chapter about occupational identity gives additional information about regarding occupational transfer as occupational choices or not.

### 3.3.3.3 Occupational identity

Kind and quality of motivation for occupational change affects satisfaction with the occupation or the job and **the occupational identity**. Big satisfaction leads to strong occupational identity, whereas low satisfaction makes the feeling of occupational identity more difficult or even prevents it. Occupational identity can be understood as a part of the social identity of a person. The type of occupational identity someone has, depends among other things on the value system of the person and on his / her priorities about his / her professional and personal life (Patiniotis/Kaminioti 12/2001).

Most of the interviewees of our European sample reported about dissatisfaction (cf. British interviewees who are forced by outer constraints) and low or non existing occupational identity with their occupational change. The Greek partners reported exclusively about interviewees, who do not have an occupational identity. The Portuguese partners

emphasised the problematic situation of women due to a generally low level of education and a lack of professional qualifications. The following list contains reasons for dissatisfaction with occupational change and/or lack of occupational identity:

- the occupation is not appropriate for the educational background
- occupation or members of the occupation are not appreciated
- other things (e.g. enterprise, institute, earning money) are more valued than the occupation itself
- features of personality (e.g. shyness, modesty) make the development of occupational identity more difficult or prevent it
- status of occupation<sup>7</sup>
- outer constraints: end of unemployment, supporting relatives

(cf. chapter 2 of this contribution).

Only the German interviewees – mostly women - reported about **strong occupational identity** due to their strong personal motivation for career change. As the German partners emphasised in their report this result has to be qualified by taking into consideration that the sample of their research represents rather positive cases. Many interviewees told about big motivation by personal improvement. This might be due to the recruitment of interviewees. They all were participants of training courses of continuous vocational training and were either nominated by the institutions or the interviewees signed up for interviews after having heard about main purposes of the project.

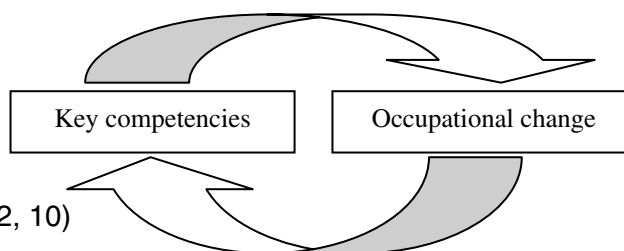
It is remarkable, that so many persons of our sample seem to have no occupational identity. This leads to the following questions:

If we understand occupational identity as one part of the social identity, which is affected by a person`s value system and priorities of life, do people with no or low occupational identity balance this part of their social identity with other more positive identity parts? Or do they try to balance it? How do they cope with their low or non-existing occupational identity?

In our research we did not go deeper into the persons` personalities. For further research these questions might be interesting.

### 3.3.3.4 Key competencies and occupational changes

>>Occupational changers are in a special situation in view of key competencies etc. In some respect they have more experiences than people without occupational changes. These experiences are supposed to influence skills, roles and key competencies positively by increasing their number, quality and understanding (this goes above all for understanding of social roles). In addition to this the influence goes the other way round: Skills and competencies influence occupational changes positively and are supposed to make changes more easy.<<



(Kampmeier 2/2002, 10)

<sup>7</sup> Status of occupation is one factor influencing the strength of somebody`s occupational identity, but not the only factor. It can be suggested, that people practising high status occupations have stronger occupational identity than people practising low status occupations (cf. Patiniotis/Kaminioti 12/2001)

Concerning the transferability of key competencies we have to distinguish between two kinds of transferability: the „near transfer“ and the „far transfer“ (Evans / Saxby-Smith 10/2001).

Near transfer refers to the application of competencies in similar contexts whereas far transfer refers to use of competencies in different contexts. For far transferability of competencies awareness of competencies and their value are very important.

Our research shows key competencies learned during family phases, during times of unemployment and by changes between enterprises or jobs. Some interviewees were very aware about their competencies learned in life phases beyond working life and reported about strong interplay between work and private life.

With reference to the Genderqual key competence model (cf. Heidegger in this report) the competencies mentioned clearly belong to the categories “self competencies” and “social competencies”.

(Key) competencies mentioned by the interviewees are listed in table 1.

**Table 1: Key competencies learned during family phases, during times of unemployment and by changes between enterprises or jobs**

<b>self competencies</b>	<b>social competencies</b>
(cf. Genderqual key competence model)	
<ul style="list-style-type: none"> <li>- assertiveness</li> <li>- self security, self esteem</li> <li>- confidence</li> <li>- organisation, administration</li> <li>- management</li> <li>- budgeting</li> <li>- analytical and synthetic competencies</li> <li>- systematic understanding</li> <li>- patience</li> <li>- problem solving</li> <li>- flexibility</li> <li>- tolerance</li> <li>- responsibility</li> <li>- creativity</li> </ul>	<ul style="list-style-type: none"> <li>- communication</li> <li>- dealing effectively in various situations and with various people</li> <li>- relating to colleagues, supervisors and customers</li> <li>- teamwork</li> </ul>

↓

To get a better view on the range of competencies **self competencies** can be clustered into **four groups**:

1	2	3	4
<u>self consciousness:</u> assertiveness, self security, self esteem, confidence	<u>organisation:</u> organisation / administration, management, budgeting, analytical and synthetic competencies	<u>dealing in and with situations:</u> patience, problem solving	<u>general personal attitudes and competencies:</u> flexibility, tolerance, responsibility, creativity

Though these key competencies seem to be very useful in all cases their **effectiveness has to be reduced**. According to the above mentioned „reduction“ of only near transfer some key competencies acquired during family phase are not really transferable into work life. They are only useful for caring professions (Evans / Saxby-Smith 10/2001).

For a far transfer a broader awareness and value of the whole range of these competencies would be needed. This awareness has to be possessed by the occupational changers as well as by the employers (cf. chapter 5). Both sides have to be conscious about those transferable competencies and they have to appraise them.

Another reduction results from incompatibility of some competencies in view of some occupations. Not every competence is useful in every occupation or job, it even can be in the way. Studying economics and learning organisational competencies very well for example suppressed creativity and imagination on the other hand. The sharpness and clarity one interviewee has learned in communication processes in the air force was damaging to him in the business world (cf. Patiniotis/Kaminioti 12/2001). It has to be concluded, that the accumulation of competencies is no linear process. Some competencies are more useful for some environments compared to others.

The adaptability of competencies in very different environments can even be impossible. Learning a new occupation can mean learning new skills and competencies, above all when the occupations are different from each other but also when they are similar.

All in all the competencies mentioned by the occupational changers are very similar to or identical with those mentioned by “typical” members of the three chosen occupations of the research project (male electricians, female nursery nurses and waiters/waitresses) and exceptional cases (female electricians and male nursery nurses) (cf. Kampmeier 2/2002).

### **3.3.3.5 Gender, key competencies and occupational change**

Especially the British and German partners emphasise gender differences of competencies. But it has to be taken into account, that these differences may not be interpreted as generic and special features of sexes. Gender differences are understood as typical for men or women, not as specific! (Kampmeier 1/2002).

#### **3.3.3.5.1 Family-phase-competencies**

**Women** of the British and German research samples gave more accounts on **self and social competencies** than men. This is among others due to experiences acquired during their **family phases**. The family phase seems to play a very important role with regard to gaining competencies. In this phase, which is mostly taken by women, a big share of informal learning takes part.

Thus, in addition to the peculiarity of occupational changers in view of their amount of (life) experiences (cf. chapter 3.3.3.4) occupational changers after returning from family phases have another special feature, which makes them peculiar (in a positive meaning) amongst employees.

These “family-phase-competencies” are not yet totally unknown by employers. Some enterprises – mostly U.S. American – promote these competencies by supporting the employment of women and men after family phases, by offering employees special conditions for taking family phases and by practicing appropriate further education courses.

It can't be missed, that former “female competencies”, not or low regarded, made their way into people's consciousness and that they lost their shadowy existence.

### 3.3.3.5.2 Intrinsic motivation

Another quality of gender differences in view of key competencies and occupational changes results from the **satisfaction with the occupational change** and the perception of occupational transfer as personal choice.

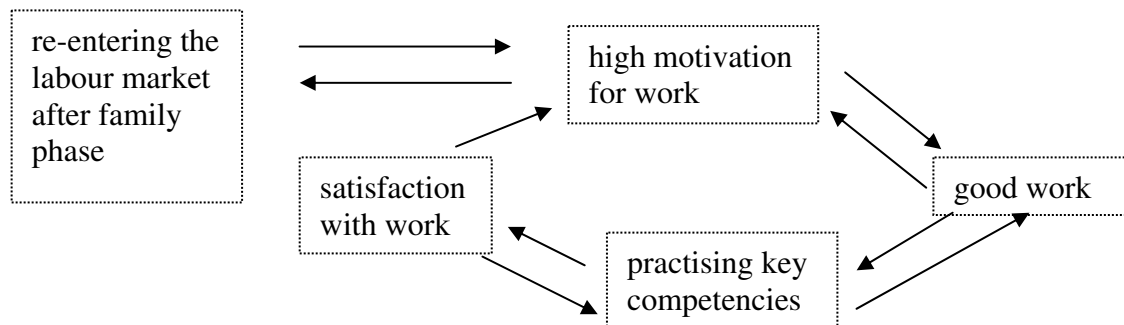
Although many interviewees of the whole sample do not seem to be satisfied with their occupational change, many women of the whole research of all countries (above all the German and Finnish ones) nevertheless reported satisfaction with their occupational shifts. They were motivated by personal interests of improving their situation in view of social and occupational participation, social assessment and realisation of personal wishes and acquired these by changing their occupations or re-entering the labour market. In contexts of this key competencies are supposed to be more aware and valued than in contexts of occupational shifts due to outer constraints (cf. chapter 3.3.3.2).

In contrast to that men more often reported outer constraints as reasons for their occupational changes (earning more money, unemployment). They described themselves as not that satisfied with their occupational changes like women did.

### 3.3.3.5.3 Summary

The following **sequence of positive effects** gives a summary of the various factors and their interdependency. This sequence is added here in the chapter about gender issues, because re-entering the labour market after a family phase can still be described as more typical for women.

Of course there can be other – negative – effects, like unsuccessful work experiences, no practice of key competencies etc., but the chance for a positive sequence is relatively high due the interdependence of the factors.



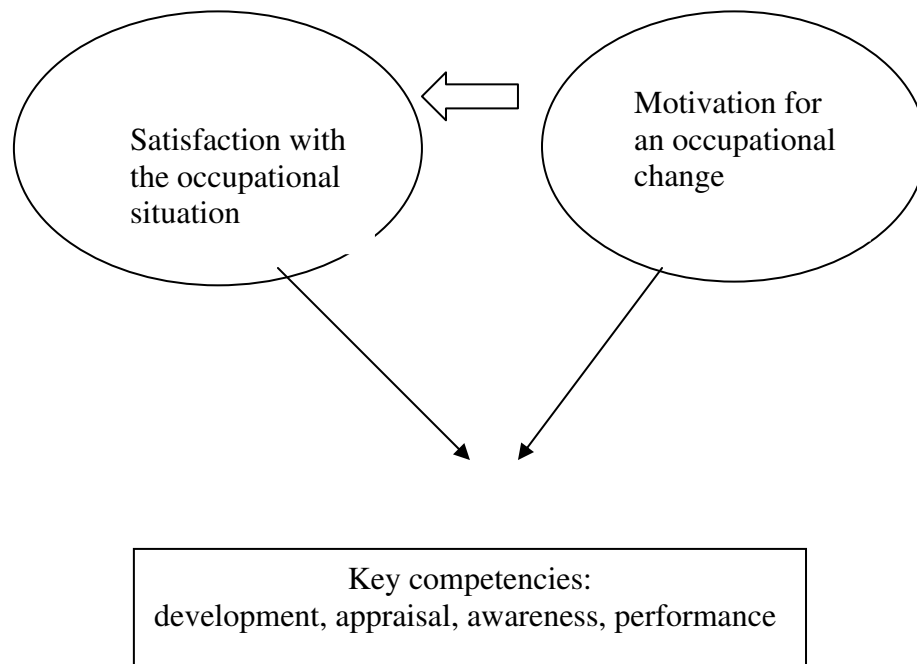
In this context it has to be mentioned, that the role of the family phase has to be qualified by taking the time of this phase into consideration. If the family phase lasts only for a few month the effect of re-entering the labour market does not have such an important meaning for the individual in view of social assessment etc. as it has after a long period of family phase.

For those employees who only had a few month family phase other features are very much more important than being especially highly motivated or practising key competencies etc. They rather have to cope with their new situation of being employed, taking care of their children and doing the housework. But these tasks also result in practicing important key competencies, such as organising, management, confidence etc.

### 3.3.3.6 Conclusion

Focusing the relations between career change and gender with respect to key competencies we can conclude that a positive and effective way of coping with this issue very much depends on the range of satisfaction with the occupational situation. At the same time the satisfaction depends on the motivation for the occupational change (outer constraints versus intrinsic or personal motivations). Both factors effect the development, appraisal, awareness and performance of key competencies.

Positive examples were especially reported by women re-entering the labour market after family phases.



### 3.3.3.7 References

- Evans, K. / Saxby-Smith, S. (10/2001) Fifth Workpackage Interim Report (including initial analysis of exceptional cases). London, Guilford
- Figueira, E. / Salvador, P. (1/2002) Fourth National Report. Analysis of Occupational changers. Évora
- Heikkinen, A. / Huttunen, U. (10/2001) Third National Report. Reflections on exceptional cases. Jyväskylä
- Heikkinen, A. / Huttunen, U. (12/2001) The Fourth National Report. Jyväskylä
- Kampmeier, A. (1/2002) First Common Report. D 5: Results of D 3 and D 4. Flensburg
- Kampmeier, A. (2/2002) Fourth German report on workpackage 5. D 6: Career changes and gender. Flensburg

### 3.4 A model of key competences - An approach for the “Genderqual” project

Gerald Heidegger

#### 3.4.1 The concept of “key competences”

For a project carried through by partners from different European countries it is at the same time very important and very difficult to define what is meant by the term “*competences*” and even more by the term “*key competences*”.

Basically there are two main approaches, one related to the “inner” abilities of a person and one which stresses the outcomes of actions based on those competences. Both are originally grounded in linguistic theories of the 1960’s (Searle, 1971) although there the difference between competence and performance is crucial. In educational theory the concept of competences, in the sense of “competences to act”, is meant to underline the difference to (abstract) knowledge which still represents the core of many curricula in school. But it is often questioned of how much use this abstract knowledge may be when it comes to performing tasks in everyday life and especially in the world of occupational work. Therefore the concept of competences has gained more and more importance for VET and CVT (CEC, 2001) since it bridges the gap between knowledge and skills where the latter are directly tried to performance.

With respect to the aims of the Genderqual project it appears to be obvious that it is more the “inner” abilities that count when it comes to transcending gendered features of key competences. For it is assumed, and has been substantiated through the empirical results, that gendered features can hardly be detected with regard to performing clearly cut specific and narrow tasks, perhaps apart from physical strength.

The concept employed here encompasses the whole “compound” of “inner” abilities of an individual which, of course, interact with each other. The outcome comes to the fore through performance, but both should be seen in a dialectical relation.

This means two things with regard to competences as they are understood in this chapter:

- Competences cannot be clearly separated from one another. Rather they represent a complex compound of abilities which closely interact and support each other. The focus is on “inner” abilities while the dialectical connection to performance has to be kept in mind.
- Therefore competences cannot be measured directly. On the contrary, what we are looking for are abilities which are not clearly visible but could be made effective if the situation to perform is favourable.

What has been said before applies even more to the concept of “key competences”. This represents those competences which are applicable to a whole range of concrete tasks, but even less directly related to outcomes. In this way, they may be called “generic capabilities” which is probably closer to the English term “core competences”. Accordingly it is assumed that key competences

- are developed very much through non-formal and informal learning, and therefore they
- cannot be learned independently from concrete tasks, but also they
- cannot be taught directly, rather they
- have to be acquired autonomously.

The acquisition of (key) competences does not only refer to the question “What am I able to do?”, but it is also related to attitudes and values, that is to the question “What do I want to do?” Both aspects are closely interwoven because the ability to do something depends very much on the willingness to do so and vice versa. It is therefore sensible to relate both aspects not only to the theme of acquiring (key) competences but to look at them as two interconnected dimensions of the competences themselves.

Similarly, the question “What I am allowed to do or forced to do?” is also of great importance. This is meant to indicate that the willingness, and therefore also the ability, to do something depends on the (social) circumstances under which somebody tries to perform a task. “To be allowed to do” is closely connected to the question if one is expected to do something, that is what the social environment views as appropriate behaviour. This appears to be particularly important for the development of gender specific key competences.

The discussion about key competences had gained momentum in the debate about European competitiveness during the 1990's. The fostering of key competences in the workforce was meant to increase its ability to cope with the demands of new forms of work organisation and to adapt itself more easily to the use of the “new technologies”. It is this “adaptation approach” which still dominates much of the discussion about key competences as the CEDEFOP reference publication (Kämäräinen et al., 2002) shows. During the same time, a countermovement gained strength which stresses the autonomy of the individual workers to influence these developments in companies. This “shaping approach” (Heidegger et al. 1997) aims at empowering workers to do so, particularly also through collective activities. “*Shaping competences*”, with regard to work content and work conditions, focussing on “*personal autonomy*”, turn out to be the centre of key competences in the view of the shaping approach.

Whilst these retain their significance also for the research objectives of the Genderqual project, a second function of key competences becomes even more significant here. This is the ability to develop one's own personality under the uncertainties of life in a time of progressing modernisation. This theme has become ever more significant the more the complexities and contingencies in life have been realized. This is also an important theme in the debate about active citizenship, personal fulfilment and social inclusion as they are highlighted in the mentioned communication on life-long learning (CEC, 2001, p.3 and passim) to represent, together with employment related aspects, the major aims of European life-long learning policies.

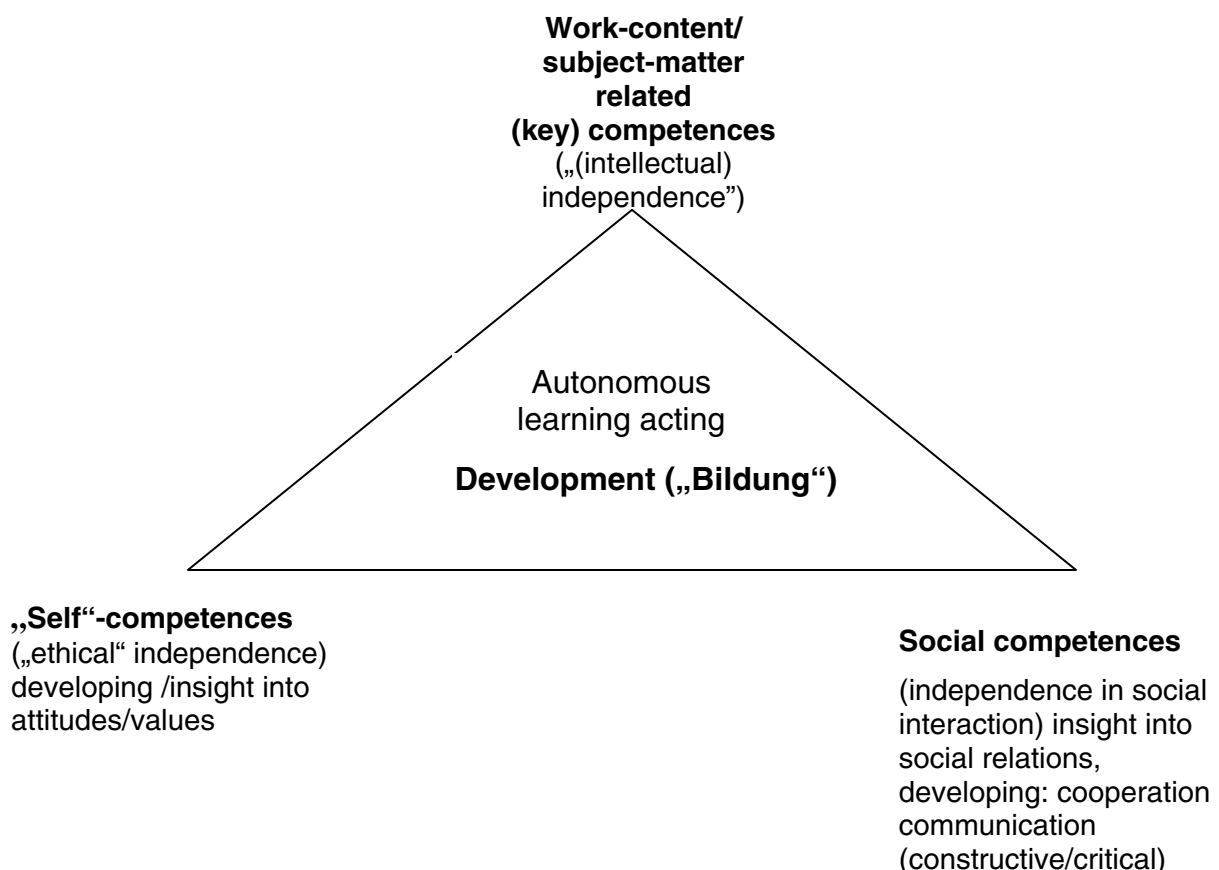
This is where “*biographical key competences*” (Hendrich, 2002) gain their extraordinary importance. The aim is then to be able to shape one's own biography under conditions of complexity and contingency so that, also in retrospect, a meaningful pathway can be (re-) constructed which underpins the (further) development of one's own identity. As far as possible this should also relate to one's work biography, thus presenting a considerable challenge for VET and CVT. It appears to be obvious that the core of these “*key competences for shaping one's own work biography*” is represented by personal autonomy which has to be related to the changing external conditions in a manner which focuses on critical creativity. Apparently those key competences are the ones which are particularly important when transcending gender stereotypes in the world of work is at stake, and they are closely connected to the “shaping approach”.

### **3.4.2 A model of personality**

When trying to develop a model of key competences for the Genderqual project we start off, because of prominence of the “compound” of “inner” abilities, from the “model of personality” designed by Heinrich Roth (1971). Roth, who at that time played an important

role in German pedagogical research and educational politics stresses indeed the aspects of “inner” abilities for his understanding of human personality. It is not just by chance that we go back as far as more than 30 years in order to find a starting point for our deliberations. Rather it was at this time that pedagogical thinking was oriented towards reforms which should strengthen individual autonomy in the face of disempowering social circumstances. In contrast, for about two decades now educational “reform”, particularly regarding VET and CVT, has turned much more to the aims of employability and adaptability. That means that shaping one’s own (work) biography autonomously is thrust into the background. It is consistent then that Roth depicts human personality through dimensions of competences in the sense of what has been said above. This is shown in figure 1. It should be noted that the model designed by Roth represents a dialectical approach. He defines three dimensions of competences, but they have always to be looked at as closely interacting with each other.

Figure 1: A model of personality  
(according to Heinrich Roth, 1971, Pedagogical Anthropology)



These are subject-matter related competences, “self”-competences and social competences. To develop true competence means to acquire “Mündigkeit” (in German) which means something like autonomy, based on critical insight. It is important to note that the model aims at the relevance of agency in human life while at the same time stressing, in the tradition of the enlightenment, critical thinking or insight, thus representing a dialectical approach in this respect, too. In addition, the aspect of personal *development*

is very significant, indicating that a static model would miss the point. Through autonomous learning and acting the human being accomplishes more and more “Bildung”. The aim is “*critical creativity*” which enables a person to contribute to respective innovations with regard to work and family life and also the societal conditions.

Accordingly, self-competences and ethical autonomy build upon insight into values and developing respective attitudes. Social competences and autonomy in social interaction build upon insight into social relations and upon developing cooperation and communication in an at the same time constructive and critical manner. Subject-matter related competences and intellectual autonomy build upon insight into the “knowing-why” regarding the field of interest and upon developing effective manners of agency in the respective field.

Because the Genderqual project aims at improving career choice and work performance in gainful employment we mention explicitly the aspect “work-content related” competences. On the other hand, these competences are to a great degree rather specific for different work-contents and can be acquired by formal learning. Therefore there is no reason to assume that important underlying gender differences can be found in this respect. And indeed, neither the scarce examples of former research concerning specialist competences nor the findings of our own research provide outcomes underpinning significant gender differences. This could be, however different for the related key competences which anyhow are the focus of the Genderqual project. They include the capacity to use cross-occupational knowledge, experiences and practical skills effectively.

### **3.4.3 First set of perspectives on the model of personality**

In order to arrive at a model which suits especially the Genderqual project we will use two sets of “perspectives” with regard to the model of competences (Schmidt, 2002). For the first set we start with a distinction put forward by Kaiser (1992), although in a changed way. We distinguish three perspectives under which the whole compound of “inner” abilities of a person should be viewed. These represent the dialectical relation of knowledge and (practical) skills, but on a more abstract level, including methodological abilities in a bridging function between the two. This leads to the following three perspectives:

- Cognition-related perspective: it encompasses problem solving, analytical thinking, reflection, critical thinking and creativity.

Here it becomes clear how important it is to view the perspective as being one regarding all three dimensions of (key) competences. Although problem solving and analytical thinking are usually thought to be connected mainly with the “subject-matter” related competences it is obvious that they can be and actually are applied likewise to social competences and self-competences. In fact, they are at the heart of “insight” and represent the factor of enlightenment built into the model.

But when it comes to agency, that is developing something new and better in all the three dimensions, the other two perspectives become playing a decisive part.

- Methodological perspective: gaining information, learning to learn, analysing and interpreting information.
- Activity-related perspective: managing complex and often multiple requirements, time-management, decision making, etc.

Managing complex and often multiple requirements, time-management and decision making are competences which rely heavily on non-formal and informal learning. Indeed

those are competences which cannot be taught so that they have to be learned in a non-formal way even if they represent requirements of an occupation for which one has undergone formal training. This is where apprenticeships (also “cognitive apprenticeship” (Brown et al., 1989)) gain their special importance. At the same time, this perspective is particularly significant for the Genderqual project just because it brings competences not gained through formal training to the fore. Therefore it points to new occupational opportunities so far not perceived by the individual because he or she has not been trained for this occupation. This is especially true for women seeking a new occupational field, also when re-entering the labour market after a “family-phase”, because activities outside the official labour market can greatly enhance the relevant competences looked at here.

#### **3.4.4 Second set of perspectives on the model of personality**

It appears to be useful for the Genderqual project to add a second set of perspectives which relate to the aim of improving individual career choice in the occupational area – and thus enhancing the societal human resource potential. These additional three perspectives are taken from Feldhoff, Jacke, Simuleit (1995).

To start with, there is an obvious tension between two aspects. One is meeting the demands for the sake of earning money, that is keeping the job and being successful in the day-to-day challenges. On the other hand, especially in the Marxist tradition (Marx, 1970/1844) work should be serving and partly serves always as a means of “self-actualisation”. Maslow (1981/1954) is another author who put this at the top of his “pyramid of human needs” where his ideas are based on philosophy and social psychology. This is of course not to say that these two aspects contradict each other completely. The usual case will be that one looks for some opportunities of self-actualisation in gainful employment. But normally this will be only partly successful so that striving for self-actualisation remains a never ending task. Here again we find a dialectical relation. The result of these deliberations are the following two perspectives.

- Occupational perspective: improving opportunities for gainful employment under the conditions of the current labour market;
- “Subjective” perspective: cognitive and emotional striving for self-actualisation and happiness.

It appears to be self-explanatory that this tension bears great consequences for gender-specific career choice and also for seeking a new occupational area later on in life which one thinks suits oneself better. And it appears to be obvious again that this relates to all three dimensions of the model of personality. For instance, striving for self-actualisation is based, of course, on insight into values and developing corresponding attitudes. But at the same time, for almost all occupations it is necessary to develop appropriate social competences in order to be successful in self-actualisation. Similarly one cannot do without work-content related key competences. The same is even more obvious for the occupational perspective, although leading to different orientations.

In addition, it is important to widen the horizon beyond the challenges posed to individuals by the immediate conditions of work. In fact all competence development has to be viewed in a societal perspective as well which represents the third perspective in this scheme. This perspective relates to the societal conditions of all three competences because it is again obvious that those are always developed under special, historically and culturally determined, societal circumstances.

Above that this perspective has also a more concrete meaning. Competences to act imply also to take into account these external conditions, e. g. general economic, political, socio-

cultural and environmental issues. At the same time, here again dialectical relations should be observed. For these external circumstances are not to be seen as unchangeable, but one has – limited as this may be individually – possibilities to influence these circumstances. Those influences become more powerful if they are exerted collectively. This means that here again the “*shaping approach*” becomes prominent.

As far as the individual acting is concerned it is particularly important not to view oneself just as a victim of the external circumstances. Here the shaping approach points to the fact that with respect to the immediate conditions governing one’s field of activities one can indeed often exert significant influence. This is obviously particularly important for the questions of the Genderqual project. As an outcome of this project, it has been shown that women in male dominated occupations can be quite successful and happy, and vice versa. These “exceptional cases”, people who have chosen an occupation atypical for their gender, provide evidence of how important especially the self-competences and the social competences are in order to hold out under sometimes adverse conditions.

The perspectives described in section 3 can be seen as the ones which encompass more the psychological aspects of key competences. The perspectives mentioned in section 4 should emphasize more the aspects which are connected to the opportunities offered and the restrictions posed in the world of gainful employment.

### **3.4.5 Focussing the model on the Genderqual project**

The model developed so far presents a large amount of perspectives. It is obvious that for pragmatic reasons this whole set has to be reduced in order to yield an instrument usable in concrete research. The model has already to some degree been developed in view of the particular objectives of the Genderqual project while being based on more general deliberations. In a dialectical process, now the main findings of the project are used to put aside some of the perspectives to arrive at a more handy instrument.

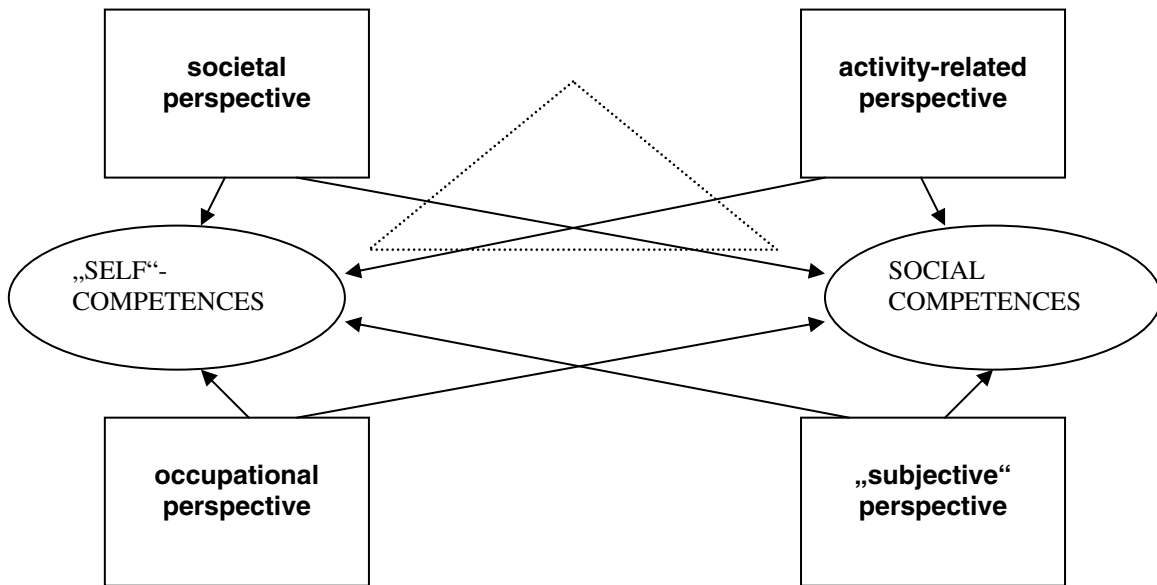
For that the relevant findings observed already during the research process will be briefly outlined. No important gender-related differences could be found with regard to:

- The dimension “subject-matter or work-content related (key) competences” according to Roth’s model of personality. Because most of those competences are developed in the course of formal learning, most interviewees could not see important reasons for gender differences.
- The “cognition-related perspective” in the first set of perspectives. Contrary to many findings in psychology, gender differences did hardly turn up, probably because they are not that important in the world of work.
- The “methodological perspective” in the first set. Here anyhow gender differences have not been prominent in previous research.

This means that out of the first set only the activity-related perspective remains included. And indeed, the outcomes of the project point to the great relevance of this perspective with respect to the objectives of the Genderqual project. For the same reason, all three perspectives of the second set are kept for the model. That means that the four perspectives as shown in figure 2 make up the set of perspectives specific of the Genderqual project. Because, according to the arguments above, only the dimensions “self-competences” and “social competences” of the model of personality are taken into account this adds up to two times four, that is eight perspectives. Those are the perspectives which in fact have been used in analysing the outcomes of the empirical research. But it should be stressed again that they only evolved during the ongoing research process so that the findings are usually not explicitly ordered according to this scheme. In addition, the partners with their distinct cultural embeddedness and their

varying scientific orientations used their specific approaches. This includes, above all, the diverse meaning of the English terms presented in this scheme (figure 2) which are translated from German into English, due to their basis in the literature used. Looking at the common outcomes, however, it appears that the scheme embodies indeed the overall structure of the findings.

**Figure 2: Key competences model for the GENDERQUAL project**



### 3.4.6 Gender-specific key competences

So far the scheme has been presented in order to explain the criteria which have been used in interpreting the outcomes of the field research. In reversing the arrows, however, it can also be used for structuring a set of dimensions of gender specific key (or core) competences. That is, those are the dimensions where gender differences – at the age of about 16 – 19 years – can indeed be found and which appear to be enhanced by gender-specific features of VET. And the same appears to be more or less true with regard to adults and the concomitant schemes of CVT. The other way round, those are the dimensions where VET institutions could (and should) try to reduce their contribution to further gendering of key competences. In conclusion, these dimensions are summed up in table 1.

**Table 1: Dimensions of gender-related key competences**

<b>“Self-competences”</b>	<b>“Social competences”</b>
<b><i>Societal dimension</i></b>	
“Self-image” / presentation of the self	Social activities / behaviour
<i>influenced by society, ”shaping” the environment</i>	
Activity related dimension	
Capabilities of “self-management”	Abilities of “social management”
Occupational dimension	
Connecting career choices to one’s own orientations	Improving one’s social competences
<i>in view of current labour market conditions</i>	
<b>Subjective dimension</b>	
Striving for self-actualisation on a satisfactory career pathway	Collaborating with other people in order to “shape” better conditions for common self-actualisation

It should be noted again that all eight dimensions have to be viewed as being closely interacting. But because they, nevertheless, point into different directions, most obviously with regard to the occupational and the subjective dimensions, and both in view of societal conditions, they altogether represent a dialectical relationship.

And it should be stressed, as above, that cultural diversities have to be observed. But to most partners they did not turn out as strong as one could have imagined, given the variety of historical developments of gender relations in the participating countries. It is those dimensions where major gender differences could be found. To give just some examples of those:

- the “self-image” and the social behaviour of women are (often) different from the male ones;
- the abilities of “social management” are gender-specific (without conceding “higher” values to one or the other);
- the career orientations are (still often) very much in variance for the two sexes;
- striving for self-actualisation is pursued very often according to gender-specific predilections.

### **3.4.7 Conclusions**

The model of key competences which can be related to gender is based on the model of personality designed by Heinrich Roth and has been enriched by two sets of perspectives.

The second set of perspectives includes in particular the “societal perspective”. The latter one points to the fact that all dimensions of personality development have to be viewed as being heavily influenced by societal conditions, even if the “shaping approach” calls special attention to the opportunities to influence one’s (occupational) environment, and more so by acting collectively – and be it on a rather small scale. These societal relations which in turn are closely connected with cultural conditions have proven to be of particular importance for transcending gendered features of key competences. Even taking this into account the model still represents a rather individualistic approach, due to features of Roth’s model being based on (German) Idealism. It would be worthwhile to set it into a dialectical opposition to a “social theory of learning”. This is for instance exemplified by the relation “identity” versus “communities of practice” as presented by Wenger (1998). That represents, however, a very difficult theoretical task which has to be left to further research, particularly under the conditions of a multi-cultural partnership working on this theme.

The arguments presented can be summarized in the following orientations: It appears not to be sensible to “convert” people from one or the other sex to a career choice which does not suit her or his gender-specific self-image. Rather the persons who already strive for a career which is not usual for his or her gender should be given support to continue their chosen pathway. That is, the “exceptional cases” should be given better circumstances not to feel all that exceptional. For the others who tend to follow the conventional pathways, VET and CVT institutions should provide more opportunities at least to try something out which, at first sight, may look strange for their own gender.

This means that VET and CVT institutions should strive not for approaching the “sameness” of the two sexes, but for “*gender-autonomy*”. This is the core of the key competences related to gender, as mentioned above: biographical key competences with relation to career choice. To strengthen that appears also to enhance the societal human resource potential in the best way.

### 3.4.8 References

- Brown, J. S., Collins, A., Duguid, P. (1989) Situated cognition and the culture of learning, *Educational Researcher*, 18, 1, 32-42
- CEC (Commission of the European Communities) (2001) Making a European Area of Lifelong Learning a Reality. Brussels: COM (2001) 678 final
- Feldhoff, J., Jacke, U., Simuleit J. (1995) Schlüsselqualifikationen für neue Anforderungen in Betrieb und Gesellschaft (Key qualifications for new requirements in enterprises and in society). Düsseldorf: Hans-Böckler-Stiftung
- Heidegger, G., Adolph, G., Laske, G. (1997) Gestaltungsorientierte Innovation in der Berufsschule (Innovation of vocational schools according to the shaping approach). Bremen: Donat
- Hendrich, W. (2002) Implizites Wissen für erwerbsbiographische Gestaltungskompetenz (Implicit knowledge for shaping competences regarding the occupational biography). Flensburg: University of Flensburg (thesis for habilitation)
- Kämäräinen, P., Attwell, G., Brown, A., (eds.) (2002) Transforming of learning in education and training. Key qualifications revisited. Luxemburg: Office for Official Publications of the European Communities.
- Kaiser, A. (1992) Schlüsselqualifikationen in der Arbeitnehmerweiterbildung (Key qualifications for continuing training of employees). Neuwied: Luchterhand

- Marx, K. (1970/1844) Ökonomisch–philosophische Manuskripte (Economic– philosophical essays). In: Marx-Engels-Werke, Ergänzungsband 1, Berlin, p. 465-588
- Maslow, A. H. (1981/1954) Motivation und Persönlichkeit (Motivation and personality). Reinbek: Rowohlt
- Roth, H. (1971) Pädagogische Anthropologie (Pedagogical anthropology). Hannover: Schroedel
- Schmidt, F. (2002) Gestaltungsspezifische Schlüsselqualifikationen – Entwicklung eines Schlüsselqualifikationskonzepts und Auswertung von Interviews (Gender– related key qualifications – development of a model of key qualifications and evaluation of interviews). Flensburg: University of Flensburg (master´s thesis)
- Searle, J. (1971) Spreakte (Speech acts). Frankfurt a. Main: Suhrkamp
- Wenger, E. (1998) Communities of practice. Learning, meaning, and identity. Cambridge: Cambridge University Press

## **4 Conclusions and policy implications**

### **4.1 Recommendations for policy makers and practitioners in vocational education and training and continuous vocational training**

*Anke S. Kampmeier*

#### **4.1.1 Introduction**

Findings of this research emphasise the fact, that gender plays a significant role in vocational education and training in view of occupational choice and career paths although it often is not regarded as such important. The challenge of the Genderqual-project, namely to combine the gender issue with (the) conception(s) of key competencies led to detailed outcomes with respect to typical male and female key competencies – socially ascribed or not – and to possibilities of measures – partly very concrete – to overcome gender segregation in VET and instead beneficially use key competencies consciously.

Although policy making activities are often said to be the first condition to establish the gender question seriously activities on lower levels like teaching trainers, holding lectures in kindergarten etc. can raise awareness on a long-term basis and help to change attitudes and values. But anyway: Programs have to be started on higher and/or lower levels to realize the recommendations of the project. Through this gendered features of key qualifications can be transcended, options for career choice can be improved and human resource potential can be enhanced.

All the recommendations depend on the will and understanding of VET practitioners and policy makers. Some recommendations aim therefore at raising gender awareness, whereas others assume that there is an awareness of the problem and make suggestions on how to overcome it. The crucial aim of the recommendations is to guarantee occupational choice and vocational education and training for both sexes according to their personal wishes. Individuals shall be able to choose typical or atypical career paths without penalty or disadvantage (gender autonomy, cf. Evans in this report). All national recommendations are a very good collection of ideas for transcending gendered features of key qualifications and gender segregation in VET and labour market. Bearing in mind that there are different historical, social and cultural backgrounds in every country that have shaped the gender conception over decades and that type and extent of gender segregation vary some recommendations would sometimes need to be individually adapted to each country.

The recommendations cover

- VET and labour market practice,
- policy making,
- social life and
- research.

#### 4.1.2 VET and labour market practice

Concerning **VET and labour market practice** the process of career choice should be supported by parents and teachers in view of a wider range of possibilities either for girls and boys. Each individual should choose the occupation being well matched and the so-called exceptional cases should become more “normal” in all occupations.

Therefore teachers and trainers have to be sensitised for supporting individual competencies and for supporting exceptional cases. Teachers and trainers should use didactical and methodological contents and methods, through which students would get a broader field of experience and judgement of their interests and competencies when it comes to the choice of occupation.

Especially for continuous vocational training and for the labour market a general awareness for tacit key competencies and skills that women (or men) acquire in family phases (cf. Kampmeier 2/2002 a, b) needs to be developed.

To proceed to a “gender inclusive approach” VET needs first of all to recognize the problem/the phenomenon or to overcome a “gender tiredness” of many tutors and trainers in memory of former gender programs. Furthermore the view that ‘gender’ equals ‘feminism’ needs to be overcome.

For an improved gender awareness, a lessening of the impact of social norms and stereotypes and a change in practices across institutions and occupations the following points have been collected. Due to the pragmatism of most of the ideas the collection can well and quickly be used in VET and other educational institutions for further development institution-specific measures for reducing gender segregation.

##### Career choice

- VET has to create an understanding of career pathways within the framework of gender equity.
- Help students to make better informed career choices and decisions.
- Broaden up discussions and materials as it seems that in discussions about requiring youth participation in job training activities there are few references to gendered features of the labour market (low status/ low pay).
- Work against an early foreclosure of options for career choice (early choices).
- Change assumptions of young people, trainers and employers concerning suitability of females or males for different careers.
- Support and enable students to make informed career choices without regard to gender stereotypes.
- Inform of dis/advantages of non-traditional employment.
- Raise awareness towards the strong value judgement inextrinsically attached to the traits of femininity and masculinity.
- Give students accurate earnings data, potential earnings for any given occupation and the effect on the standard of living.
- Raise awareness of inequalities in pay in different fields of employment.
- Raise awareness of career progression.
- Raise awareness and sensitivity of tutors and trainers towards the ‘lived experience of gender’ of young people in VET.

### VET practice

- Teaching methodology has to reflect equity issues and has to integrate the 'lived experience of gender' into the pedagogical process, also valuing if experience.
- Encourage critical, reflective thinking.
- Enhance confidence and self-assurance.
- Include concepts of gender and development of self: stress the importance of gender identity of each individual; as gender identity is subject to normative prescriptions of how to act/behave and also to work.
- Use gender neutral language.
- Provide an experience of heterogeneous work groups rather than same sex classes.
- Give opportunity to work in mixed gender groups across occupations
- Offer longer work tasters and wider variety.
- Show examples, invite 'exceptional cases' to talk about (gender) issues.
- Aim to reduce sex-role stereotyping in the career decision making process – encourage changes into different fields of work (as considerable amount of students are dropping out of courses anyway for all sorts of reasons, mostly unidentified reasons).
- Acknowledge the importance of support for students in non-traditional occupations.
- Develop effective partnerships with businesses and industries, which are sensitive to equity issues.

### Parents and other "influences"

- Acquaint parents' fears and concerns about their children pursuing non-traditional careers.
- Provide appropriate role models.
- Prepare students for what to expect in the world of work outside the college, as the college is a 'cushioned' experience, some tutors exclaimed that girls will do alright in colleges, but in the world of work they 'won't survive' – especially in engineering as it is too hard in the 'real world'.
- Mentoring (a-typical cases) as a means of support.

### Workplaces

- The creation of a learning environment, which includes gender issues will make non-traditional students feel more respected and comfortable in their environment. As so far 'exceptional cases' have to adapt to 'other sex/gender' work environment , the people are 'just' placed in there without reflection or adaptation of the work environment towards the young person's needs. This is neglected from VET practices so far.
- Reflect upon the interaction process of producing and reproducing gender on a daily basis, e.g. every time people make an assumption, use of every day language, tutor and trainers own unawareness etc.
- Recruitment material has to be free of sex bias and stereotyping.
- Provide effective careers advice and guidance

### Skills and competencies

- Raise awareness of employers' attitudes towards jobs and duties, assumptions about skills.
- Advertise formal recognition of "female" skills in terms of pay and occupational status (invisibility of female skills/semi-skilled jobs, in part together with wider changes, change in definition of skill).
- Identify which key competencies are emphasized for which jobs ensuring all are equal and important.
- Rethink current concepts of skills as they prepare students for jobs based on necessary skills, not including gender issues. Not just 'prepare' for the job, in terms of 'teaching' a narrow set of work related skills but support interpersonal, transferable skills, critical thinking and key qualifications.

### Media

- Change images in media, brochures.
- Avoid media promotion of "female" skills pushing females into certain jobs.

(cf. Hoffmann 3/2002)

#### **4.1.3 Policy making**

**Policy making** is the first condition in order to establish the gender-question seriously and work effectively for an improvement in any field. Based on political initiative a better co-operation between educational institutes, work organisation and administration concerning this topic can be reached (e.g. establishing networks).

Trade unions and labour market organizations should be included as the recognition and valuing of different competencies and skills manifests itself in contracts on salaries and wages. From their side programs can also be started that dissolve the gendered rigidities of competencies and skills. Moreover can they support the recruiting of exceptions.

Also working conditions for parents should be made more attractive.

And when raising gender awareness at work and in school and promoting it in teacher training the consequences for curriculum and school book contents and didactics must be taken into consideration. It is important to avoid a separation on curricular or pedagogical practice. The aim of gender awareness is not to emphasize the differences between men and women and to extend the gap between them but to acknowledge and support individual competencies.

#### **4.1.4 Social life**

A person's **social life** has a major impact on shaping a concept of gender. As a consequence there is also the family's gender awareness that needs to be raised in order to prevent them from supporting the development of stereotypes.

To raise family awareness to this topic it is necessary to make it a topic in the field of child raising, holding lectures in kindergartens and schools and to make it public through media.

Next to the family it is also the media that play an important role in producing gendered notions. They also support often gendered images of workplaces. They can though be used to work in the other direction, i.e. to change the gendered image of competencies and to step in for gender awareness.

#### **4.1.5 Research**

More **research** in the field of gender and competencies is generally needed and it must be linked to practice so that it can have long-term effects. The role of the exceptional cases has often been mentioned. They also need to be integrated into research in order to get more detailed information through co-operation. (cf. Heikkinen/Luoma 4/2002, Kampmeier/Wigger 4/2002)

#### **4.1.6 References**

Figueira, E., Salvador, P.(2002) Final Considerations and Recommendations for transcending gender barriers in the VET System and in the Employment. Évora

Hoffmann, B. (3/2002) Recommendations. Guilford

Heikkinen, A., Luoma, M. (4/2002) The Fifth National Report: Recommendations. Jyväskylä

Kampmeier, A., Wigger, A. (4/202) German national recommendations. Flensburg

Patiniotis, N., Kaminioti, O. (4/2002) National recommendations for transcending gender barriers in the VET system. Patras

## 4.2 Genderqual: Necessities – Possibilities - Limits

*Karen Evans*

### 4.2.1 Necessity - How necessary is it to transcend gendered features of Vocational Education and Training ?

Vocational choices and attitudes continue to be strongly controlled by social prejudices and by self- discrimination. Our evidence showed how strongly individuals continue to have gendered occupational preferences for themselves, although many are very ready to say that there should be no discriminatory barriers for others . Horizons and the zones of occupational possibilities that individuals are prepared to consider as suitable or appropriate are often limited to a range of quite highly gendered options, female typical occupations or male typical options.

In this research, we have been interested in exploring how the zone of possibilities people are prepared to consider for themselves can be expanded. But we have not been looking for ways of making social groups the same. It is not our objective to find ways of equalizing the numbers of people from either sex in each occupation.

*Gender autonomy* is what we aim for. How far advanced we are in relation to the goal of gender autonomy is measured by *the extent to which people can choose to follow typical or atypical paths with out penalty or disadvantage*. This applies both to material disadvantage and social approval/disapproval.

If our aim is to counter gender stereotyping, we have also to be alert to the need not to stereotype societies in undertaking our cross-national researches. The research study 'Gender Autonomy in Europe'- An Imprecise Revolution ) Tina Singh, 1998, showed that Nordic countries can be classified as advanced despite a high level of gender segregation, as policies and practices are in place which enable both women and men to exercise gendered preferences without penalties nor unfair advantages.

*'The Nordic countries unequivocally provide the most sound basis for gender autonomy, .....although Nordic women experience above- average segregation in the labour market, any disadvantages accruing to such work are more mitigated than elsewhere by protection afforded by the high unionisation of part-time work and the public sector, as well as through generous social benefits.'* Singh 1998 p. 150

Southern countries, particularly Greece and Portugal were classified as having high progressive potential, in the sense that they have potential to progress by virtue of their present modernizing process rather than by their actual performance. Recent laws have yet to be fully enacted but are generally in line with the latest European guidelines. Both countries also have strong non-formal sectors which potentially allow for high levels of role sharing between men and women.

*'..since these countries simultaneously support the family and favour the concept of the welfare state..., the combination works well for women's abilities to balance the private and public spheres.*

Germany and England were both classified as conservative, with change taking place slowly.

*'because of the belief either that it is not the state's role to provide redistributive services (the UK) or that egalitarianism is at best of secondary interest to stability (Germany), the conservative mode tends to minimise the structured inequalities between the public and private spheres'*

Impediments and entrenched barriers (such as lack of adequate affordable pre-school child-care in England and relatively weak legal bases for equal opportunities (UK and Germany) have slowed the pace of change in women's experiences in the labour market despite the strong rises in female educational participation and achievements.

Switzerland and Ireland were classed separately as underdeveloped, with major barriers in the fields of reproductive and legal rights, and rankings 'near the bottom' in all of the indicators of reconciliation between the private and public spheres of activity- maternity leave benefits, child care policies and gender role sharing initiatives. Resistance towards state intervention and change also characterised these societies in the field of gender autonomy.

The preceding sections have focused on outer frameworks, the limits which are difficult (but not impossible) to change.

#### **4.2.2 Possibilities – What is it possible to change through Vocational Education and Training ?**

Changes in the nature of male and female labour force participation do take place over time, but these should not be overestimated.

If our aim is to move towards greater gender autonomy, we need to achieve fewer penalties and barriers for those who make atypical choices. Our question is 'what can VET do to encourage and support this?', while recognising that what VET can do will always be very partial. Social structures take much longer to change, but what influences can be exerted by VET practitioners to support change in the desired direction?

Our research has identified some of the most important, (and has discussed these through a range of consultation and dissemination seminars ):

The 'exceptional cases' have produced powerful lessons and suggestions, as Chapter 3.3.2 has shown:

1. Our evidence suggested that overcoming the barriers in atypical training and employment requires particular resilience and much determination.
2. Our research studied the exceptional cases who 'survived' the challenges experiences encountered in being a male in a female dominated occupational area or female in a male dominated occupational area. It is reasonable to surmise, on the basis of other evidence, that drop-out in the early stages of training or occupational experience occurs quite frequently for people who are less resilient and determined.
3. This does not lead us to a deficit model conclusion that people should become more resilient and determined to succeed, while the barriers remain untackled.
4. It leads instead to some insights into the kinds of support needed for individuals who want to exercise their gender autonomy by going in to atypical fields .
5. We found that people who survived in a typical occupational situations found different ways to assert their gender identity. The UK male nursery nurse, regarded as 'one of the girls' by his peers in the occupational training course, spent his leisure time with male friends in characteristically male pursuits. He experienced the way in which he was incorporated into the occupational group as disempowering. The female engineer, by contrast, asserted her gender identity in the workplace, through jewellery, perfume and other modifications to the standard dress of overalls. She reported her success in operating in a male – dominated environment as empowering. Being 'special' in achieving in a male dominated environment is a finding also shown in related studies (Evans et al. 2002). It may be that their respective experiences reflect the relative

power and social position of the gendered occupation they are seeking to enter. But both mask the experiences of those who find learning and working environments insupportable through a mixture of attitudes and conditions encountered, and leave the training at an early stage.

6. These insights lead the recommendation that:

- Use of key competences as tools for policy and practice cannot advance the cause of gender autonomy alone, without the active building in of gender issues to pedagogical processes – ‘doing gender.’
  - There needs to be much more mixed gender teaching across occupational areas to explore and challenge assumptions about skills , to consider gender identity issues and provide identity support.
  - Creation of supportive networks of practitioners who are gender sensitive and committed to change. For example, in the same way that colleges would not dream of sending a trainee to a placement which had poor health and safety practices, VET institutions could take steps to ensure that placements are only used which can demonstrate good gender practices. This can be done in a non-bureaucratic and direct way by establishing networks of practitioners with common aims and goals.
  - Take steps to counter gender blindness and gender tiredness of teachers and practitioners who are not already committed to change in this field, with approaches that are fresh (e.g. based on identity work and evidence- informed practice) and feasible (e.g. networks- based).
  - Working for policy change takes longer but should take place alongside and in parallel with creation of such networks.

#### **4.2.3 Limits**

VET can only exercise partial influence on the forces and factors that restrict gender autonomy. It cannot by itself change macro-social forces nor the early experiences of individuals. But is the space that VET does have being used fully?

Our aim in this project has been to expand awareness of the spaces which can be used by VET practitioners to advance the cause of gender autonomy. In summary, we need to find ways of making the ‘exceptional’ less exceptional in the future, by reducing the penalties (social and economic and emotional) for those who exercise their gender autonomy in new directions.

#### **4.2.4 References**

Singh R (1998) Gender Autonomy in Western Europe: An imprecise revolution. Macmillan Press , Basingstoke

BCS and NCDS statistics provided by T Oates, QCA

### **4.3 Reflections on the Research Process**

*Nikitas Patiniotis*

#### **4.3.1 Introduction**

Genderqual research focuses on the analysis of specific cases belonging to the social subsystems of labour and education. Special attention is paid on the relation between gender and the demonstration of key competencies or key skills. The research was conducted on an international level, and, researchers came from different institutions, mostly universities.

In the text below I intend to make some brief remarks drawn from my personal experience in this momentous research work. It has been an interesting piece of research and its findings are worth to become widely known. We arrived at the conclusion that in the societies where this research was carried out, the factor related to gender is not of great importance to the acquisition of key skills and competencies. Apart from gender, a number of other factors should also be included in order to fully understand the differences noticed between the two sexes during the acquisition of key skills and key competencies.

The fact that Genderqual is an international research work is one reason out of many, that all the research institutions should adopt a joint approach and a joint understanding of theories and methodologies. The scientific approaches that were used have their origins in various disciplines. Therefore, significant scientific terms should be well defined and well perceived in order all the participants to be able to use them in the same manner. It is an arduous task, which, however, we managed to accomplish to some extent during our two-year collaboration.

In my intervention I intend to present both the research per se and, the outcome of my personal experience. I will discuss our common experience up to this day. Without the presentation of experience from the research procedure, the reader would not be able to have an in depth understanding of the outcome of the research. I have a straightforward scientific motto: the way a research process is conducted and the knowledge of the framework within which this research process is produced, provides a better understanding of the research results in retrospect.

#### **4.3.2 The meaning and position of gender**

Since gender has been the principal research parameter, we could reflect on the definition of the terms “female” and “male”. Is the knowledge of the biological sex of an individual enough to realize whether someone demonstrates a female or male attitude? I wonder if other behaviourist forms and practices have to be included in order to achieve an integrated analysis of the reasons an individual, either man or woman, in the biological sense, behaves in a certain way.

Undoubtedly, men and women do not behave in the same way, nor do they have the same experience, ideology and views. Our societies are separated or divided on the basis of the term “sex”. This has been clarified in our research. Besides, research has pointed out that there is not a considerable difference between the two sexes, as we initially thought; the same applies to the differences between northern and southern European societies, between industrially developed countries and agricultural societies that at the same time practice trade and services extensively. By means of research results we have

realized that similarities exceed in number the differences prevailing among the European countries. In most countries the factors that qualify human behaviour in the acquisition of key competencies or key skills are similar; however, because this behaviour is attained in the context of diverse socio-economic environments seems to be different.

We should bear in mind that researchers have prefabricated analytical images. One of them stands for woman's position in European societies as different from another, that, with regard to equality of the two sexes in the north things are more liberal than the oppressive south. Research has disproved our initial hypotheses. There is evident female presence in miscellaneous professional paths and subsystems, along with strong male presence or weak presence.

Gender discrimination and inequality is substantial in European countries, but to a lesser degree than we initially thought. Individual differences with regard to the acquisition of key competencies and key skills can be fully understood provided their comprehensive social, economic and cultural status and background is taken into account. Gender is among the highly possible interpretation parameters concerning the demonstration of skills and competencies to individuals. From our research, a series of parameters has a parallel and cumulative effect on the relation between gender and key skills, for instance, social class and nationality, namely, if individuals live in a society in which the majority belongs to the same nationality as them or if they belong to a minority; another parameters include age, place of birth and residence, economical background, socialization and work experience. All these factors lead to safe conclusions regarding the reasons why women, just like men, do not behave in the same way and, are differentiated among them on the one hand and, towards the main subject of our research work on the other; that is, the interpretation of the individual's deviations in terms of key competencies and key skills.

### **4.3.3 Career women – Exceptional cases**

In this program we examined exceptional cases of women who are successful in male jobs. At first we ought to give a clear definition of the term success. Does it refer to success mainly in the public sector? For instance, is it measured in terms of higher positions held by women? Does women's success in the private sector play an important role? Can politicians, managers or, even mothers become "successful professionals"? Has this success the same quality? Can it be measured in the same way? Can a manageress whose offspring have gone astray be considered successful in her life? Men are not an exception, since the same "success" criteria hold good for them as well.

The success of the above mentioned classes should be considered alternatively, since from our experience we know that it is almost impossible for a successful manageress, a popular politician or a highly skilled professional to be a successful mother or wife at the same time. Social experience bears witness that this applies to both men and women.

What are the features of a successful woman? In which sphere of her life is she expected to be successful? In her private or public life? Obviously, the definition of women's success is directly related to the way researchers view this success.

In the present research we examined the exceptional cases of successful professionals. We have also dealt with individual cases that were not expected to develop particularly positive practices in various workplaces and, in spite of all odds they managed to survive. I wondered as I heard and read our colleagues interesting conclusions, "who has the right to decide whether an individual is an exceptional case or not". The problem arises because in the societies where exceptional cases were examined, the case that we approached as exceptional ones, i.e. men as nursery nurses or women as electricians,

are not considered under this spectrum. They think of themselves as ordinary people. That is another point of similarity among the various European countries.

This fact brings about a second thought; that modern societies have left behind the past permanent structures and the ways of organization and function. Nowadays we have a multi-coloured norm if we can call that so, a normality of living conditions, which includes an increased number of diverse individual attitudes and practices, compared to the past. As a result the use of the term exceptional in today's societies sounds superfluous.

In these multi-coloured, differentiated societies, people are entitled to live a satisfactory life. Nevertheless, it is difficult to define what a satisfactory life means to everybody. Today's societies and economies ought to provide the conditions that would enable individuals to materialize their plans and satisfy their wishes provided they do not clash with their fellowmen's plans and wishes. Researchers do not know better than the interviewees, what a satisfactory life means to them. This is not their work after all. They have to pinpoint those parameters that play an important role to the formation of conditions related to employment, education and gender discrimination. Undoubtedly, we live in hierarchically organized societies and civilizations. This has always been so and the concept that one-day we should live in a perfect society seems to be a utopia. The structure of societies should offer people the opportunity to live their life with satisfaction and pleasure. This means that societies and social subsystems such as the education or employment system, should promote among individuals the potential to live their life in the way they believe and wish.

I think that in our research it is evident that individuals were successful in their professional life in those sectors in which they had the freedom to materialize the things they knew, the things they wanted and the things they could accomplish.

#### **4.3.4 International research on competencies and skills**

The research of such a complicated situation as the relation between gender and key competencies/skills in European societies required disciplinary approaches that, sometimes according to my opinion, were difficult to be easily realized. At first, it required the use of a common language in understanding and communication.

It is usual in our days this common language to be English. But are researchers fluent in English? Even if they master the English language well, to what extent are concepts grasped in their linguistic understanding? The great issue is whether the terms used by researchers have the same content in different countries and scientific approaches.

We should not disregard the fact that in our own generation, the English language used in communication is called European English. As far as I am concerned, even after so many years of international research I am left with a number of questions. For instance, some key terms used in our disciplinary field, such as the terms work, occupation, vocation, job. Although I have repeatedly asked my British colleagues to give me a clear explanation I have not fully comprehended the rationale between those terms as yet. All the non-English speaking scientists endeavour to comprehend the context of British society that has produced those terms in order to meet its practical needs. We should, thus, understand the structure of economy, society and culture in the United Kingdom in order to comprehend English terms. And when this is achieved, we should try to transfer those terms to the actualities of our own society, economy, labour and employment systems, so that to use those terms in the same sense. It is something very difficult, if not impossible, to be fully achieved. It is beyond any doubt that even if the communication language were different, the same problems would arise.

Scientific communication and argument faces a large number of problems, sometimes even more difficult than those posed in the society in which scientists and researchers work. In Greek we use the terms “douleia”, “ergasia”, “ergon”, “apascholisi” “epaggelma” with reference to labour. This last term is close to the respective terms of vocation or Beruf. The etymology comes from the words invocation and call. The most used Greek term for labour “douleia” includes the etymology of a “doulos”, a slave. Therefore, the term work according to most used Greek expression mean slavery, the daily routine of a slave, whereas the Greek term “ergon” has a creative connotation. From the above discussion it is evident that if Greek were used as the communication language our colleagues would face the same difficulties as we do when communicating in the English language.

Due to the different level of competencies in the use of English, theoretical and scientific discussion is not possible to go in a very depth since the participants are not native English speakers. That explains why scientific discussion on a European level does not always probe deep into the issue. This is common practice in research on humanities and social sciences. In the course of the last decades, I have the feeling that the understanding of scientific views and the discussion as such have become more disciplinary and analytical. I think this is due to the individual’s improved ability in the use of English and the expanded scientific collaboration of the last period.

From the above discussion becomes evident the difficulty researchers experience on the European level. Difficulties are also experienced for diverse reasons. There are different legal regimes and financing structures that regulate our research institutes, and therefore, there are different working conditions and social realities. In order to illustrate these differences I will quote a recent event. Last academic year, while the present research was still in progress, the students in our university had a sit-in demanding the fulfillment of certain requirements. This had as a result the suspension of the university’s administrative and economic services for more than two weeks and therefore, we were unable to meet certain deadlines. Furthermore, this happened in a period when in the rest of Europe everything was running smoothly and there was not any spirit of understanding of our situation.

#### **4.3.5 Learning from the Genderqual project**

In spite of the aforementioned remarks I strongly believe that Genderqual research is successful. We have worked in an open minded manner and with great interaction and, therefore we have reached the interesting conclusion that the situation in our countries does not bear great differences as it was initially thought; generally speaking, gender discrimination is not so sound as we initially believed. It is a significant conclusion worth to become broadly known in the scientific community.

Now that Genderqual research is coming to an end, I have to admit that the researchers have demonstrated a better understanding about the various European societies and the prevailing attitudes regarding the relation between the two sexes and their qualifications; we have also a better understanding with regard to the theories and the terminologies used. We have also developed a better approach to our discipline that stems from different disciplines displaying an interest in the topics of gender, competencies, skills, labour and education. Moreover, we have seen the role social factors play in the analysis and interpretation of phenomena related to our research.

We have also realized that changes in issues concerning gender equality and their work prospects are left on the hands of social subjects, of certain people, of groups, of societies and civilizations in general. In other words, it falls within the sphere of their work and responsibility. It is their efforts that can make the differences between the two sexes seem smaller and, therefore, to create more equal, more democratic and more liberal societies.

Within this context education seems to play a more liberal and significant role. However, it does not seem to be more important than the self-action of social subjects and groups in the context of their formation. It is not possible to eliminate sex discrimination and inequality, merely by reforms in education, as our research has shown.

We, as professionals who treat the question of educational process consider that all forms of education, either general, or vocational, or technological are critical to the promotion of democratic and other reforms and changes in society. These reforms should lead to the elimination not only of gender discrimination but also of inequalities within social groups.

Our research has attested to the fact that education plays an important role in this reform in the strict or broadest sense of the word, but this role is not so critical as we usually believe. I can therefore reach to the safe conclusion that education plays a liberal role but nothing more nothing less. Society, culture, the conditions and the employees' competencies and skills cannot change solely by means of education.

## 4.4 Conclusion

*Anke S. Kampmeier*

This final report of the Genderqual-project mirrors the wide range of approaches of Gender and Qualification which shaped the project. Due to the advantage of working in an European project we could profit from the different scientific backgrounds of the researchers as well as from their various historical, cultural and socio-economical backgrounds. We also profited from the European variety of backgrounds of the individuals of our research field.

The participating researchers emphasised different topics during their work and had different opinions about issues. Sometimes it was hard or even impossible to find agreements for different opinions. First of all it took time to get to know each others backgrounds and main focus of research. It took another time to combine the different approaches. For finding solutions for different or even opposite approaches the period of the project sometimes was too short (cf. also Patiniotis in this report).

This is one important feature, issue and challenge of European projects.

Crucial issues of Genderqual were the understanding of Gender in view of the aims of the Genderqual-project (cf. Heikkinen and Niemeyer in this report), theories of key competencies (cf. Heidegger in this report) and solutions or recommendations for overcoming gender segregation in VET and the labour market (cf. Evans and Kampmeier in this report). These issues of course are interdependent and can be seen as milestones on the Genderqual-ray.



In between these milestones desktop-research, empirical research as well as international comparisons were done. Some outcomes of the empirical research correspond with our expectations and/or other research results (confirmation of typical female and male key competencies, confirmation of cultural and social impact, importance of informal learning with women returners etc.) others are rather unexpected (contradiction between general opinion about gender differences in view of occupational abilities (no differences) and gender-segregated labour market, relative similarities of many outcomes in the participating countries, importance of "exceptional cases", frequency of gender blindness, ...).

The milestones should not be understood as isolated or self-contained and their discussion can be continued. The picture of a ray expresses, that on the one hand the discussion of the milestones shall be seen as ongoing processes during the project's work and thought process. On the other hand the discussion of Gender and Qualification in view of transcending gender barriers in VET and labour market is now based on a broad European research, which can be the foundation of further research (e.g. in view of questions directly arising from the Genderqual-project, e.g. research on concrete measures recommended in this report).

With the approach of Gender autonomy (cf. Evans in this report) a central and connecting result of the project could be found. It allows all opportunities for the male and female

individuals in view of their occupational choice, occupational life and occupational career: being different, being equal, being exceptional – in all cases being individual.

Instead of offering supporting programmes for women in male dominated occupations and men in female dominated occupations, all individuals should be supported in view of their individual competencies and predilections and the awareness of them. Many recommendations for this have been collected, which can easily be implemented by educational and VET-institutions in many cases (cf. chapter 4.1.).

Especially raising the awareness of gender typical competencies or various competencies of individuals and supporting them by practicing mutual learning, reflecting them etc. must be an issue and an aim of all schools - primary, lower and higher secondary, VET schools – as well as of working places where apprenticeship takes part.

And this must not be only an issue for schools or training places but for every individual in his or her life contexts in general. Thus individuals could have the chance to develop their personal strengths independent of and first without social barriers.

These measures do not need order from legislative committees, but can be done by teachers and trainers and employers themselves. Orders from legislative committees of course would emphasise the measures and their importance and perhaps their practice. But often things are more effective and individuals are dealing with them more committed when they do not have to do things ordered from higher hierarchies but planned by themselves.

I'd like to conclude this chapter and the final report with a collection of issues and ideas learned from the Genderqual-project.

### **What did we learn from the Genderqual-project?**

1. Men and women act differently in occupational or working environments; they show typical (not specific !) behaviour. This also goes for key competencies. Outcomes of our empirical research confirmed findings of former research in view of gender differences (e.g. female competencies = soft competencies).
2. In some cases these gender differences lead to different preferences and choices in view of occupations. This can be seen as one small (!) source for the development of gender typical occupations.
3. Although we did not go deeper into analyses of reasons for those differences, social attitudes and values, the respective educational contents and methods as well as the "social hardware" (social and occupational conditions) are found to have great impact on the development of individual occupational choice and performance.  
Gender typical behaviour is deeply inscribed in social and cultural conditions and is very resistant for changes.
4. In many / most VET institutions gender is no explicit topic of discussion neither in view of methodical nor in view of didactical issues.  
Genderqual has shown that although or maybe because there have been supporting programmes for reduction of gender segregation in all countries since years the value of the gender issue has lost significance (gender blindness). Transcending this gender blindness and raising the awareness of gender issues – in view of key competencies and others - is one issue that needs to be changed for reducing gender segregation and enhancing human resource potential. This does not only go for VET institutions but for educational institutions in general and best for whole social life (media etc.).

5. Gender blindness is also a problem in enterprises. The special situation of “exceptional cases” in view of their difficulties as well as in view of their advantages is not noticed enough if at all.
6. In addition to that female and male dominated enterprises are often not prepared for exceptional cases (attitudes, prejudices, ...). They need to be prepared, sensitised by discussions, visitations of other enterprises, exchange of enterprises in view of “exceptional cases” etc.
7. Students need to be supported in view of their strengths and weaknesses irrespective of their sex (cf. “gender untypical” strengths)
8. Women and men working in “gender-untypical” occupations are more conscious about their occupational choice and thus sometimes more engaged.
9. Men and women working in “gender-untypical” occupations have to cope with four things:
  - their personal identity, which is affected by their “untypical” occupation
  - social reservations and prejudices of employers and colleagues
  - social reservations and prejudices in general (family, friends, customers,...)
  - demands of the job”Exceptional cases” are in a very special and difficult situation and need to be supported by representatives in schools, enterprises and by policy.
10. Due to their special situation women and men in “gender untypical” occupations they are very aware about “gender-typical” behaviour, “gender-typical” key competencies, gender segregation etc. This knowledge and experiences can well be used for improving the situation of the “exceptional cases” themselves as well as that it can be used for mutual learning of girls and boys, men and women in VET and at working-sites.
11. A special kind of key competencies were found with individuals (mostly women) returning to labour market after family phases. During their family phase they developed a lot of valuable competencies by informal learning, which can well be used in working life if they only are noticed, valued and practiced.
12. More awareness and valuing of key competencies, of gender and of gendered key competencies could be satisfying, useful and effective for individuals as well as for economic contexts.

## 5 Dissemination and exploitation of results

Results of the Genderqual-project were continuously disseminated. Dissemination contexts were national and international conferences of education and sociology as well as work groups such as the Education and Training Cluster and lecture courses at universities.

<b>Title of dissemination</b>	<b>Partners involved</b>	<b>Exploitation intention</b>
Regular reports of project work	University of Flensburg, Germany, Department of Vocational Pedagogy	Education and Training Cluster
Regular reports of project work	University of Jyväskylä, Finland, Department of Education	Network maintenance with VET institutes and work-sites
Gender and Key Competencies – key terms of unrelated debates?	University of Flensburg, Germany, Department of Vocational Pedagogy	VET and Culture Network Annual Conference 2000 in Arvidsjaur, Sweden
British discourses on key competences	University of Surrey, Great Britain, School of Educational Studies	DGfE Conference Education in Transforming Societies, Georg-August University, Göttingen, Germany, September 2000
Making learning visible	University of Surrey, Great Britain, School of Educational Studies	SKOPE Workshop, University of Warwick, 9th March 2001
Vocational Training in Greece (Presentation based on research findings of the Lifequal and Genderqual projects).	University of Patras, Greece	Yearly Conference of the Hellenic Sociological Association at Panteion University: Recent Social Changes in Greece and Europe, 24-26th May 2001, Panteion University, Athens

<b>Title of dissemination</b>	<b>Partners involved</b>	<b>Exploitation intention</b>
Symposium: Transcending gendered features of key qualifications for improving options of career choice and enhancing human resource potential	All partners	European Conference on Educational Research 2001 in Lille, France  Network on Vocational Education and Training Research (VETNET)
Round table: Approaches to Human Resource Development (HRD) in Europe	University of Flensburg, Germany, Department of Vocational Pedagogy	European Conference on Educational Research 2001 in Lille, France  Network on Vocational Education and Training

		Research (VETNET)
Does the recognition of key competences increase or decrease inequalities in the workplace?	University of Surrey, Great Britain, School of Educational Studies	ESRC Working to Learn Seminar Series, London, June 2001
Learning and the workplace	University of Surrey, Great Britain, School of Educational Studies	Keynote Lecture, International Conference on Vocational Education and Training, (Biennial JNET Conference), Bolton, July 2001
Presentation in Adult Education and Gender section	University of Jyväskylä, Finland, Department of Education	Conference for Research on Adult Education, Helsinki 12-13.10.2001
Researching learning in the workplace: issues of methodology and content	University of Surrey, Great Britain, School of Educational Studies	Symposium for BERA 2001, Leeds

<b>Title of dissemination</b>	<b>Partners involved</b>	<b>Exploitation intention</b>
Power Context and Perspective: Confronting the Challenges to Improving Attainment in Learning at Work	University of Surrey, Great Britain, School of Educational Studies	University College Northampton, November 2001
Key competences and workplace learning	University of Surrey, Great Britain, School of Educational Studies	Learning and Skills Network Annual Conference, University of Cambridge, December 2001
Männer sind anders. Frauen auch. Zusammenhänge zwischen Geschlecht und (Berufs-)Kompetenzen	University of Flensburg, Germany, Department of Vocational Pedagogy	Lecture course in winter semester 2001/2002 at the University of Flensburg, Germany
Challenges of cross-national research on VET and gender	University of Jyväskylä, Finland, Department of Education (Anja Heikkinen)	Lecture at the University of Leicester, 23.02.2002
Social and Structural Dependency of Gender Segregation. (Presentation based on research findings of the Genderqual project)	University of Patras, Greece	Final conference of "Gender and Qualification" at the University of London, Institute of Education, School of Lifelong Education and International Development, 27-28 of February 2002
Presentation on	University of Jyväskylä,	Final conference of "Gender

methodological issues of Genderqual	Finland, Department of Education	and Qualification" at the University of London, Institute of Education, School of Lifelong Education and International Development, 27-28 of February
<b>Title of dissemination</b>	<b>Partners involved</b>	<b>Exploitation intention</b>
A model of key competences for the Genderqual project	University of Flensburg, Germany, Department of Vocational Pedagogy	Final conference of "Gender and Qualification" at the University of London, Institute of Education, School of Lifelong Education and International Development, 27-28 of February
Gender and Key Competences – Conditions, Risks and Challenges of Researching Two Incompatible Systems	University of Flensburg, Germany, Department of Vocational Pedagogy	Final conference of "Gender and Qualification" at the University of London, Institute of Education, School of Lifelong Education and International Development, 27-28 of February
Transcending gendered features of key qualifications? What did we learn from the project?	University of Flensburg, Germany, Department of Vocational Pedagogy	Final conference of "Gender and Qualification" at the University of London, Institute of Education, School of Lifelong Education and International Development, 27-28 of February
National recommendations	University of Jyväskylä, Finland, Department of Education	Email-based feed-back on national recommendations to Ministry of Education and to national partners
Presentation on transformation of vocational education from a gender perspective	University of Jyväskylä, Finland, Department of Education	Conference 'Futures of Education', University of Zürich, 23.- 25.04.2002
<b>Title of dissemination</b>	<b>Partners involved</b>	<b>Exploitation intention</b>
Presentation of the results of the Genderqual project: "Research Findings of the Project Transcending Gendered Features of Key Qualifications for Improving Options for Career Choice and Enhancing Human	University of Patras, Greece	Center for Research on Women Issues, Athens, Greece, 2002

Resource Potential".		
Symposium: Gender and Qualification: Transcending gendered features of key qualifications for improving options of career choice and enhancing human resource potential	All partners	European Conference on Educational Research 2002 in Lisbon, Portugal Network on Vocational Education and Training Research (VETNET)
Symposium on Human Resource Potential (HRD)	University of Flensburg, Germany, Department of Vocational Pedagogy	European Conference on Educational Research 2002 in Lisbon, Portugal Network on Vocational Education and Training Research (VETNET)

### Internet-presence

Biat, University of Flensburg	<a href="http://www.biat.uni-flensburg.de/biat.www/index_projekte.htm">http://www.biat.uni-flensburg.de/biat.www/index_projekte.htm</a>
EHRD Network	<a href="http://www.b.shuttle.de/wifo/ehd-per/lisbon.htm">http://www.b.shuttle.de/wifo/ehd-per/lisbon.htm</a>

## 6 Acknowledgements and References

- Anttonen, A., Henriksson, L., Nätkin, R. (eds.) (1994) Naisten hyvinvointivaltio. Tampere: Vastapaino
- Apo, S. (1995) Naisen väki. Helsinki: Hanki ja jää.
- Arbeitsmark für Frauen, Aktuelle Entwicklungen und Tendenzen im Überblick, Sonderdruck aus den Amtlichen Nachrichten der Bundesanstalt für Arbeit (ANBA) Nr. 4/2000
- Assen, S. (1998) Überlegungen zu einer feministischen Analyse der globalen Wirtschaft, Prokla 11, 2, 199 - 216
- Aulenbacher, B. (1993) Technologieentwicklung und Geschlechterverhältnis. Beiträge zur industriellen und gesellschaftlichen Entwicklung, Frankfurt
- BCS and NCDS statistics provided by T Oates, QCA
- Benner, P. (1984) From novice to expert, Addison Wesley, London
- Brown, A. (1997) The development of key skills across contexts and over time, Capability, 3,2, 16-20.
- Brown, A. (1997) Becoming skilled during a time of transition: observations from Europe, Paper produced for the Sixth National Career Development Association Conference, Daytona Beach, Florida
- Brown, J. S., Collins, A., Duguid, P. (1989) Situated cognition and the culture of learning, Educational Researcher, 18, 1, 32-42
- Büchter, K.: Zehn Regeln zur Ermittlung von Qualifikationsbedarf. In: Gewerkschaftliche Bildungspolitik 1999
- Bundesanstalt für Arbeit (Hrsg.) Frauen – Wege zur Chancengleichheit, Nürnberg, 2000
- Bundesanstalt für Arbeit (Hrsg.) Frauen und Beruf, Nürnberg, 2000
- CEC (Commission of the European Communities) (2001) Making a European Area of Lifelong Learning a Reality. Brussels: COM (2001) 678 final
- CESO & D (2000) Diagnóstico e Estratégias no âmbito da Igualdade de Oportunidades, Relatório Final. Lisboa
- Connell, R. W. (2002) Gender. Malden: Blackwell
- Corno, L. (1989) Self regulated learning. In: B.J. Zimmermann, D.H.Schunk (eds.) Self-Regulated Learning and Academic Achievement: Theory, Research and Practice, Springer-Verlag, New York
- Costa, S., Santos, S. (1997) Estereótipo da mulher em Portugal e a sua relação com a discriminação sexual no trabalho, Lisboa: CITE
- De Sully, G., Schröder-Jänecke, U.: Frauen und Schlüsselqualifikationen, Chancen eines beruflichen Neuanfangs. Bundesinstitut für Berufsbildung (Hrsg.), München 1987
- Dillabough, J.-A., Arnot, M. (2001) Feminist Sociology of Education: Dynamics, Debates and Directions
- Ellström, P.-E.: The many Meanings of Occupational Competence and Qualification. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998

- Enders-Dragässer, U., Fuchs, C. (1993<sup>2</sup>) Interaktionen der Geschlechter. Sexismusstrukturen in der Schule. Weinheim, München: Juventa
- Engeström, Y. (1994) Training for change: New approach to instruction and learning in working life, International Labour Office, Geneva.
- Enkenberg, J. (1994) Situated Cognition and cognitive Apprenticeship. New Framework for Education of Professional Skills. In: Heikkinen, A (ed). Vocational Education and Culture, Tampere, Tampereen Yliopisto.
- Erler, W., Nußhart: Familienkompetenzen als Potenzial einer innovativen Personalentwicklung, Bundesministerium für Familie, Senioren, Frauen und Jugend (Hrsg.), Berlin, 2000
- Evans, K., Brown, A. and Oates, T. (1997) Developing work based learning: an evaluation of the YTS Core Skills Project, Sheffield: Employment Department
- Feldhoff, J., Jacke, U., Simuleit J. (1995) Schlüsselqualifikationen für neue Anforderungen in Betrieb und Gesellschaft (Key qualifications for new requirements in enterprises and in society). Düsseldorf: Hans-Böckler-Stiftung
- Ferreira, V. (1999) A Segregação Sexual do Mercado de trabalho- Perspectivas teóricas e políticas. In: Sociedade e trabalho ( n<sup>o</sup>6 ) Lisboa: Ministério do Trabalho e da Solidariedade
- Figueira, E., Salvador, P., Heidegger, G., Kampmeier, A., Heikkinen, A., Huttunen, U., Evans, K., Saxby-Smith, S., Hoffmann, B., Patiniotis, N., Kaminioti, O. (2002) Género e Qualificação. A questão das competências-chave associadas ao género na escolha da carreira profissional. In: Economia e Sociologia: Évora: Estudos Superiores de Évora
- Fraser, K. M.: Same or Different: Gender Politics in the Workplace, Aldershot 1999
- Frerichs, P. (1997) Klasse und Geschlecht. Arbeit, Macht, Anerkennung, Interessen, Opladen
- Friedan, B. (1983) Naisliikkeen uusi suunta. Hämeenlinna: Karisto
- Friese, M. (1994) Frauen in „Männerberufen“ – Eine Pionierleistung der Gegenwart? Über den steinigten Weg der gewerblichen Professionalisierung von der Industriegesellschaft bis in die Gegenwart, dargestellt am Handwerk in Bremen. In: Dickmann, E./Friese, M. (ed.) (1994): Arbeiterinnengeschichte im 19. Jahrhundert. Studien zum sozio-kulturellen Wandel und zum politischen Diskurs in den Frauenbewegungen in Deutschland, England, Italien und Österreich. Vorträge eines Workshops an der Universität Bremen 1993. Münster, Hamburg, S. 310 - 332
- Gonon, P.: Schlüsselqualifikationen aus kontroverser Sicht: eine Einleitung. In: Gonon, P. (ed.): Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 9–13
- Harney, K.: Cultural Patterns of Vocational Education in Western Europe as background for a German/Finland-Comparison. The peculiarity of the German case. Paper presented at the Bergen Conference 27.-30. August 1998
- Heidegger, G. (1986) (1927) Sein und Zeit. Tübingen: Klostermann
- Heidegger, G., Adolph, G., Laske, G. (1997) Gestaltungsorientierte Innovation in der Berufsschule (Innovation of vocational schools according to the shaping approach). Bremen: Donat
- Heidegger, G.: Von Schlüsselqualifikationen zu Schlüsselkompetenzen. In: Gonon, Philipp (ed.) Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 101–106

- Heikkinen, A. (2001a) Masters and Mistresses of the Nation. In: Gonon, P. & Haefeli, K. & Heikkinen, A.
- Heikkinen, A. (2001b) The Europe of Learning Organisations. Draft for the final report of 5th framework project Forum for European Research on Vocational Education and Training. Forthcoming: ITB, University of Bremen
- Heikkinen, A. (1996) Gendered occupational ideals in Finnish vocational education. In: Heikkinen, Gendered History
- Heikkinen, A. (ed.) Gendered History of (Vocational) Education – European Comparisons, Hämeenlinna 1996
- Heikkinen, A.: Gender Bias in Nordic Vocational Education. In: Schweizerische Zeitschrift für Bildungswissenschaften, Freiburg 2000
- Heikkinen, A.: The Making of the Masters and Mistresses of the Nation? Engineers and Nurses as Occupational Ideals in Finnish VET. In: Gender Perspectives on Vocational Education, Bern 2001
- Helgesen, S. (1992<sup>3</sup>) Frauen führen anders. Vorteile eines neuen Führungsstils. Frankfurt, New York: Campus
- Hendrich, W. (2002) Implizites Wissen für erwerbsbiographische Gestaltungskompetenz (Implicit knowledge for shaping competences regarding the occupational biography). Flensburg: University of Flensburg (thesis for habilitation)
- Henriksson, L. (1998) Naisten hoivatyö ja ammatillistumisen politiikat. Helsinki: STAKES
- Henriksson, L. (1996) Occupational politics of health work – women's involvement in creating the foundations of the Finnish welfare state. In: Heikkinen, Gendered History
- Hövels, B.: Qualification and Labour Markets: Institutionalisation and Individualisation. In: Key Qualifications in Work and Education, Kluwer Academic Publishers, 1998
- Hyland, T. (1994) Competence, education and NVQs: dissenting perspectives, London: Cassell
- Institute of Employment Studies (IES) (1997): Skills, Competencies and Gender: Issues for pay and training. Report 333 by Strebler, M., Thomson, M., Heron, P.
- Irigaray, L. (1996) Sukupuolieron etiikka. Tampere: Gaudeamus
- Jacobs, J. (1995) Gender Inequality at work, Thousand Oaks: Sage
- Kaiser, A. (1992) Schlüsselqualifikationen in der Arbeitnehmerweiterbildung (Key qualifications for continuing training of employees). Neuwied: Luchterhand
- Kämäräinen, P., Attwell, G., Brown, A., (eds.) (2002) Transforming of learning in education and training. Key qualifications revisited. Luxemburg: Office for Official Publications of the European Communities.
- Kinnunen, M. (2001) Luokiteltu sukupuoli. Tampere: Vastapaino
- Kleinau, E. (ed.) (1996) Frauen in pädagogischen Berufen, Bd.1: Auf dem Weg zur Professionalisierung
- Kleinau, E., Mayer, C. (eds.) (1996) Erziehung und Bildung des weiblichen Geschlechts. Eine kommentierte Quellensammlung zur Bildungs- und Berufsbildungsgeschichte von Mädchen und Frauen, Weinheim: Deutscher Studien Verlag
- Lange, U. (1996) Zum professionellen Selbstverständnis der ersten Generation von erwerbstätigen Sozialpädagoginnen, Kleinau (ed.), 105 - 126

- Laur-Ernst, U.: Schlüsselqualifikationen in Deutschland – ein ambivalentes Konzept zwischen Ungewissheitsbewältigung und Persönlichkeitsbildung. In: Gonon, P. (ed.): Schlüsselqualifikationen kontrovers, Aarau/CH, 1996, S. 17–23
- Lave, J. (1991) Situated learning in communities of practice. In: L. Resnick, J. Levine and D. Behrend (eds.) Perspectives on socially shared cognition, Washington DC: American Psychological Association
- Leat, D. (1993) Competence, Teaching, Thinking and Feeling. In: Oxford Review of Education, Vol. 19, No. 4
- Löfström, J. (1999) Sukupuoliero agrarikkulttuurissa. Se nyt vaan on sellainen. Helsinki: SKS
- Mansfield, B., Mathews, D. (1995) Job Competence: a description for use in vocational education and training, FESC, Blagdon.
- Marx, K. (1970/1844) Ökonomisch–philosophische Manuskripte (Economic– philosophical essays). In: Marx-Engels-Werke, Ergänzungsband 1, Berlin, p. 465-588
- Maslow, A. H. (1981/1954) Motivation und Persönlichkeit (motivation and personality). Reinbek: Rowohlt
- Mayer, C. (1992) „... und daß die staatsbürgerliche Erziehung des Mädchens mit der Erziehung zum Weibe zusammenfällt“. Kerschensteiners Konzept einer Mädchenerziehung.. In: Zeitschrift für Pädagogik 5, 771 – 791
- Mayer, C. (1996) Zur Kategorie ‚Beruf‘ in der Bildungsgeschichte von Frauen im 18. und 19. Jahrhundert. In: Kleinau (ed.), 14 - 38
- Mayer, C. (1998) Berufsbildung und Geschlechterverhältnis. Eine historische Analyse zur Entstehung des Berufsbildungssystems in Deutschland“. In: Schütte, F., Uhe, E. (eds.), Die Modernität des Unmodernen. Das ‚deutsche System‘ der Berufsausbildung zwischen Krise und Akzeptanz, Berlin
- Mayer, C.: Deficits of Professionalisation in the Field of Nursing in Germany – an Historical Analysis. In: Gender Perspectives on Vocational Education, Bern 2001
- Mayer, C.: Vocational Education and Gender: The formation of the German Vocational Education System in a gendered perspective, Paper presented at Bergen Conference „Economical, Social and Political Embeddedness of Vocational Education – Historical and Cultural Perspectives“ from 27th – 30th August 1998 at the University of Bergen
- Mertens, D. (1974) Schlüsselqualifikationen: Thesen zur Schulung einer modernen Gesellschaft (Key qualifications: themes for education and training in a modern society), Mitteilungen aus der Arbeitsmarkt- und Berufsforschung, 7, 314-325
- Narotzky, S. (1997) New Directions in Economic Anthropology. London: Pluto Press
- Niemeyer, B. (2002) Gender and Key Competences – Conditions, Risks and Challenges of Researching Two Incompatible Systems. Paper presented at the Genderqual final conference 27.2.2002, University of London.
- Niemeyer, B. (1996) Weiblichkeit und Wissenschaft. In: Kleinau (ed.), Frauen in pädagogischen Berufen, 1: Auf dem Weg zur Professionalisierung, 127 - 139
- Niemeyer, B.: Ausschluß oder Ausgrenzung? Frauen im Umkreis der Universitäten im 18. Jahrhundert. In: Kleinau/Opitz (eds.), Handbuch zur Geschichte der Mädchen- und Frauenbildung (12. – 20. Jahrhundert), Bd. I, Frankfurt/Main, Campus, 1996

- Niemeyer, B.: Mädchen- und Frauenbildung von der Renaissance bis zur Frühaufklärung. In: Kleinau/Mayer (eds.), *Erziehung und Bildung des weiblichen Geschlechts. Eine kommentierte Quellensammlung zur Bildungs- und Berufsbildungsgeschichte von Mädchen und Frauen*, Bd. I, Weinheim 1996
- Niemeyer, B.: *The influence of history and culture on gendered features of the German system of vocational education and training* – Forschungsbericht für das europäische Forschungsprojekt „GENDERQUAL - Gender and Qualification. Transcending gendered features of key qualifications for improving options for career choice and enhancing human resource potential“, Flensburg, 2000
- Niemeyer, B.: *Geschlecht und Qualifikation: Überwindung geschlechtsspezifischer Merkmale von Schlüsselqualifikationen zur Erweiterung der Berufswahlmöglichkeiten und zur Förderung des Arbeitskräftepotentials*, Projektbeschreibung, Flensburg 2000
- Nieuwenhuis, R.H. (1991) *Practical learning situations as a preparation for lifelong job oriented learning*, Paper presented at the International Workshop on Developing Education for Lifelong Learning, Tampere, Finland.
- Nijhof, W.J., Streumer, C.: *The Demarcation Issue: Introduction*. In: *Key Qualifications in Work and Education*, Kluwer Academic Publishers, 1998
- Nijhof, W. J.: *Qualifying for the Future*. In: *Key Qualifications in Work and Education*, Kluwer Academic Publishers, 1998
- Ostendorf, H. (1996) *Überlegungen zur Geschlechterpolitik staatlicher Institutionen*, *Frauenforschung* 3, 14, 23 – 38
- Ostenk, J. (1997) *Kernproblemen, ICT en de innovatie van het beroepsonderwijs ('Core problems, ICT and innovation in vocational education and training')*, Amsterdam: SCO Kohnstamm Instituut
- Östman, A.-C. (2001) *Kvinnorna och åkerbruksarbetet. Om det gemensamma arbetets betydelse*. In: Rahikainen, M., Räisänen, T. (eds.). *Työllä ei oo kukkaan rikastunna. Naisten töitä ja toimeentulokeinoja 1800- ja 1900-luvulla*. Tampere: Tammerpaino
- Peltonen, M. (1999) *Työnjako sosiaalisena tilana - Sukupuolenmukaisesta työnjaosta maataloudessa*. In Parikka, R. (ed.). *Suomalaisen työn historiaa*. Helsinki: SKS
- Popkewitz, T. (ed.) (2000) *Educational Knowledge. Changing Relationships between the State, Civil Society, and the Educational Community*. State University of New York Press.
- Rahn, S.: *Gender, Social Background and Choice of Profession (Berufswahl) at the Beginning and at the End of the 20th Century: Historical Findings on the Plausibility of the Current Individualisation-Theses*. In: *Gender Perspectives on Vocational Education*, Bern 2001
- Reskin, B., Padavic, I. (1994) *Women and Men at work*, Thousand Oaks: Pine Forge Press
- Ronkainen, S. (1999) *Ajan ja paikan merkitsemät*. Helsinki: Gaudeamus
- Roth, H. (1971) *Pädagogische Anthropologie (Pedagogical anthropology)*. Hannover: Schroedel
- Schmidt, F. (2002) *Gestaltungsspezifische Schlüsselqualifikationen – Entwicklung eines Schlüsselqualifikationskonzepts und Auswertung von Interviews (Gender– related*

- key qualifications – development of a model of key qualifications and evaluation of interviews). Flensburg: University of Flensburg (master's thesis)
- Schulte, D.: Gender-specific Choice of Career among Personal Development, Social Conditions and Educational Intervention. In: Gender Perspectives on Vocational Education, Bern 2001
- Searle, J. (1971) Sprechakte (Speech acts). Frankfurt a. Main: Suhrkamp
- Silva, M.(1983) O emprego das mulheres em Portugal: A mão invisível na discriminação sexual no emprego. In: Critica e Sociedade. Porto: Edições Afrontamento
- Silva, M.(1999) A Discriminação Sexual no Mercado de Trabalho: As questões mais polémicas. Porto: Universidade Fernando Pessoa
- Simons, R.J. (1990) Transfer-ability, Nijmegen: Quick Print
- Singh R (1998) Gender Autonomy in Western Europe: An imprecise revolution. Macmillan Press , Basingstoke
- Sipilä, P. (1998) Sukupuolitettu ihminen, kokonainen etiikka. Helsinki: Gaudeamus
- Sundin, E.: The social construction of gender and technology. In: The European Journal of Women's Studies, Vol 2, No 3, p. 335 – 353
- Toulmin, S. (1972) Human Understanding. Oxford: Clarendon Press
- Van Zolingen, S., Blockhuis, F., Streumer, C. and Nijhof, W. (1997) Towards broad initial vocational education and training : a method for the formulation of key qualifications and core problems, Paper presented at CEDEFOP conference on Core Skills, Amsterdam
- Vogel, P. (1996) Scheinprobleme in der Erziehungswissenschaft: das Verhältnis von "Erziehung" und "Sozialisation". Zeitschrift für Pädagogik. 4/1996.
- Watts, R.: Making women visible in the history of Education. In Heikkinen, Anja (ed.) (1996) Gendered History of (Vocational) Education – European Comparisons, Hämeenlinna, 9 - 28
- Webster, J. (1996) Shaping women's work. Gender, employment and information technology, London
- Wenger, E. (1998) Communities of practice. Learning, meaning, and identity. Cambridge: Cambridge University Press
- Wetterer, A. et. al (ed.) (1995) Die soziale Konstruktion von Geschlecht in Professionalisierungsprozessen, Frankfurt
- Wolf, A. (1991) Assessing core skills: wisdom or wild goose chase, Cambridge Journal of Education, 21,2, 189-201
- Young, B. (1998) Genderregime und Staat in der globalen Netzwerkökonomie. In: Prokla 111, 2, 175 – 198
- Young, M., Hayton, A. and Leney, T. (1997) Report on the ASDAN Youth Award Scheme, London: Post-16 Education centre, Institute for Education, University of London

## 7 Annexes

The following list summarises all publications, presentations and other outputs in view of the Genderqual-project which are either available at the European commission or can be sent on request.

Institution	Kind of publication/output	Title
Laboratory of Sociology and Education, University of Patras, Greece	National Report	The gendered structure of the labour market in Greece (August 2000)
Academus Lda., Evora, Portugal	First National Report	First national report
University of Jyväskylä, Finland, Department of Education	First Workshop Report	First workshop report
University of Surrey, Great Britain, School of Educational Studies	First Workpackage Report	The first workpackage report for the Genderqual project
University of Flensburg, Germany, Department of Vocational Pedagogy	First National Report	German report on workpackage I and II
University of Jyväskylä, Finland, Department of Education	Articles	1) Turha, ärsyttävä ja arka aihe. 2) Onko osaamisella sukupuoli? in Journal Aikuiskasvatus 4/2001
Laboratory of Sociology and Education, University of Patras, Greece	Second National Report	Analysis of case studies: Nursery nurses, electricians, and waiters/waitresses (May 2001)

Institution	Kind of publication/output	Title
University of Surrey, Great Britain, School of Educational Studies	Second National Report	Second workpackage report including conclusions (May 2001)
University of Jyväskylä, Finland, Department of Education	Second National Report	Second national report
Academus Lda., Evora, Portugal	Second National Report	Transcending Gendered Features of Key Qualifications for improving

		options for career choice and enhancing (Genderqual), 2001
University of Flensburg, Germany, Department of Vocational Pedagogy	Second National Report	2nd German report on workpackage IV (and V)
University of Jyväskylä, Finland, Department of Education	Poster in connection with the ECER 2001	Overview of the Genderqual project
University of Surrey, Great Britain, School of Educational Studies	Third National Report	5th workpackage Interim Report (including initial analysis of exceptional cases)
University of Jyväskylä, Finland, Department of Education	Third National Report	Reflections on exceptional cases
University of Flensburg, Germany, Department of Vocational Pedagogy	Third National report	3rd German report on workpackage 5

<b>Institution</b>	<b>Kind of publication/output</b>	<b>Title</b>
Academus Lda., Evora, Portugal	Third National Report	Analysis of Exceptional Cases 10/2001
Laboratory of Sociology and Education, University of Patras, Greece	Third National Report	Analysis of exceptional case studies: male nursery nurses and female electricians
University of Jyväskylä, Finland, Department of Education	Fourth National Report	Fourth National Report
Academus Lda., Evora, Portugal	Fourth National Report	Analysis of Occupational Changers
Laboratory of Sociology and Education, University of Patras, Greece	Fourth National Report	Fourth National Report
University of Flensburg, Germany, Department of Vocational Pedagogy	Fourth National Report	4th German report on workpackage 5. D 6: Career changes and gender
Laboratory of Sociology and Education, University of Patras, Greece	Fourth National Report	Fourth National Report
University of Flensburg, Germany, Department of Vocational Pedagogy	Common Report	1st Common Report. D 5: Results of D 3 and D 4

University of Flensburg, Germany, Department of Vocational Pedagogy	Common Report	2nd Common Report. D7: Results of D6. Career Changes and Gender
Academus Lda., Evora, Portugal	Fifth national report	Final considerations and recommendations for transcending gender barriers in the VET system and in the employment (May 2002)
<b>Institution</b>	<b>Kind of publication/output</b>	<b>Title</b>
University of Flensburg, Germany, Department of Vocational Pedagogy	Fifth national report	National recommendations
Laboratory of Sociology and Education, University of Patras, Greece	Fifth national report	National recommendations for transcending gender barriers in the vet system
University of Jyväskylä, Finland, Department of Education	Fifth national report	National recommendations
University of Surrey, Great Britain, School of Educational Studies	Fifth national report	Recommendations drawn from the analysis – A reflection on the state of art
University of Flensburg, Germany, Department of Vocational Pedagogy	Common Report	3rd Common Report
University of Jyväskylä, Finland, Department of Education	Publication	Gender and the transforming adult education theory and practice. In: Dybbroe, B., Ollagnier, E. (eds.) (2002), Gender and adult education. University of Roskilde
Academus Lda., Evora, Portugal	Publication	“Género e Qualificação. A questão das competências-chave associadas ao género na escolha da carreira profissional.” in Economia e Sociologia: Évora: Estudos Superiores de Évora, 2002

<b>Institution</b>	<b>Kind of publication/output</b>	<b>Title</b>
University of Surrey, Great Britain, School of Educational Studies	Publication	Evans, K., Hodkinson, P., Unwin, L. (Eds.) (2002) Learning and the Workplace, London: Kogan

University of Jyväskylä, Finland, Department of Education	Publication (forthcoming)	Heikkinen, A. et al., Ammattikasvatuksen femininiteetit ja maskuliniteetit muutoksessa.
Laboratory of Sociology and Education, University of Patras, Greece	Working paper	The social and structural dependency of gender segregation (under preparation, in Greek)
Laboratory of Sociology and Education, University of Patras, Greece	Working paper	Skills and competences for male and female occupations in Greece: the case of electricians, nursery nurses and waiters/waiters (under preparation, in Greek)



European Commission

**EUR 21103** - EU RESEARCH ON SOCIAL SCIENCES AND HUMANITIES - Gender and qualification

Luxembourg: Office for Official Publications of the European Communities

2004 — 113 pp. — 21.0 x 29.7 cm

ISBN 92-894-7558-7

## SALES AND SUBSCRIPTIONS

Publications for sale produced by the Office for Official Publications of the European Communities are available from our sales agents throughout the world.

How do I set about obtaining a publication?

Once you have obtained the list of sales agents, contact the sales agent of your choice and place your order.

How do I obtain the list of sales agents?

- Go to the Publications Office website <http://publications.eu.int/>
- Or apply for a paper copy by fax (352) 2929 42758



Publications Office  
*Publications.eu.int*

ISBN 92-894-7558-7



9 789289 475587 >