

3 education programmes

Evaluation concept

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Introduction

Evaluating training, teaching and learning has been an emerging issue in the 1980's when it was actively researched within several disciplines like education, pedagogics, psychology and organizational sciences. During the 1990's the enthusiasm flagged, but the interest woke up again in parallel with the waves of refugees and immigrants arriving to the Europe. The needs to include newcomers to the hosting society, to teach local culture, habits and language, and to train professional skills to comply with the local requirements have highlighted the importance of developing new teaching and training methods for newcomers and locals alike. These new methods and tools in teaching and training should be compatible with the requirements set by cultural diversity of both the refugees and immigrants, and the societies receiving the incomers. This trend has significantly influenced the development of both, education and evaluation methods and processes, in the past years.

Furthermore, during the past two decades the western countries have met - in addition to enormous flood of settlers - another phenomenon that challenges the education system: The post-war baby boom generation reaches age of retirement. This has two consequences, both requiring the answers from school systems. Firstly, the western countries should have a capability and capacity to educate and train more and more nursing personnel to cover both the vacuum left by those retiring, and to answer to the needs of ageing population. Secondly, these countries should be capable to renew their education systems to be able to satisfy the needs of business, to be able to train skilled labor and to be able to educate more persons that are both capable and willing to create their career as entrepreneurs and to continue the work of retiring entrepreneurs. If this fails, the consequences for European economy might be fatal or even disastrous.

This challenges not only schools and universities or teachers and trainees, but also those developing the courses and teaching and training methods used in the courses. Evaluating the learning of trainees, used methods and the impact of these methods on the learning would help teachers, designers and analysts to improve the methods.

The aims and targets of the evaluation are context dependent issues. Thus, in ideal world, the courses, the methods used in the courses and the means to evaluate the outcome of the course, the learning of trainees and the efficacy and success of the methods should be designed together so that the whole course is seen as main process inside which the training and evaluation are parallel subprocesses. This would be the best way to ensure that exactly those goals set to this unique program are measured during the evaluation. In this case "Train the Trainer" and other education programs have been planned parallel with the planning of the evaluation.

Education Programs

- A) The three further vocational training courses (WP4) on the topics of
- Recruiting and binding personnel,
 - Digitization and
 - Customers and business partners as innovation drivers

for the target groups "Entrepreneurs, managers and specialists in SMEs" to impart skills and abilities in the area of Workplace Innovations. The following should be achieved:

- a) Qualification of employees of SMEs to increase their capacities for Workplace Innovations;
 - b) Development and implementation of Workplace Innovation projects in SMEs;
 - c) More efficient use of the available human capital in SMEs have been developed to respond the challenges met by those aiming to strengthen the awareness and competences for target-oriented environmental policy and workplace innovations in SMEs via training and consulting the entrepreneurs and personnel of SMEs.
- B) Dual bachelor study course on the topic of Business Management and Workplace Innovations in SMEs combined with R&D tasks for SMEs (WP5).

The following should be achieved:

- a) High-quality qualification of young entrepreneurs and managers (EQF Level 6);
- b) Attraction of much needed junior staff for SMEs;
- c) Development of capacities to increase awareness for Workplace Innovations; d) Realization of individual Workplace Innovation projects, which the students carry out as employees of the participating SMEs with the support of professors of the respective university in connection with the dual studies in SMEs.

The target groups of the programs are 1) lecturers and consultants from (or delegated by) chambers, universities, other partners; 2) students in educational institutes, vocational schools and universities (of applied sciences); 3) SMEs, entrepreneurs, managers and specialists in SMEs. The planned duration of course varies depending to the educational level and purposes. Each lesson lasts 45 minutes. Methods used in lessons will be lectures, teaching talks, working in small groups, case studies and examples from real world. Material used during the teaching consists of e.g. information material (basics & backgrounds, thematic introductions etc.), presentations, questionnaires, question guides, checklists, analysis results, good practice examples and so on.

Evaluation of courses including gained results and found problems is essential to be able to develop further the existing training and education programs as well as to consider the experiences gathered from these programs when building new curricula. The evaluation process of each course has been designed hand in hand with the course itself. This concept presents an overview of evaluation process and questionnaire.

When evaluating courses the goals and real results should be compared. This is not always possible or fair and just. The evaluation should be targeted only to such measurable issues on which the designer, teacher, facilitator or student himself has an impact. Evaluating the impacts of training programs against the presented main goals would require large societal researches including the recording of the initial situation before starting the programs and the long-term follow-up research in which the conducted interventions and actions (In this case new forms of training and education) and their impacts on change of variables is followed (Figure 1). The final conclusions can be drawn just after some years or after decades. In this project this is not possible and the whole evaluation process must be rethought and simplified.

The most important variables, on point of view of achieving the goals set, are the motivation of student, the support he gets, the relevance of issues in curricula, the quality material and training and the ability of facilities to support training and learning. Although most of the variables presented above are so called soft variables, which can't be measured directly by targeting the measurement tool to some point or phase in the process, they can be assessed indirectly by assessing the feelings and comments of participants and other stakeholders.

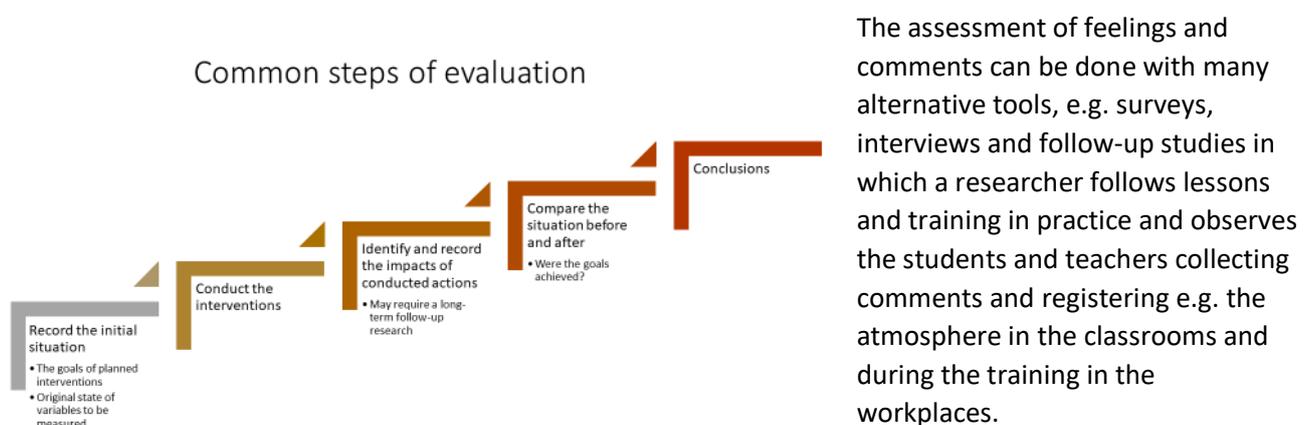


Figure 1: Evaluation process

The assessment of feelings and comments can be done with many alternative tools, e.g. surveys, interviews and follow-up studies in which a researcher follows lessons and training in practice and observes the students and teachers collecting comments and registering e.g. the atmosphere in the classrooms and during the training in the workplaces.

In this case the experiences and comments of participants will be surveyed by simple questionnaire

with questions approaching the common impressions, the applicability of facilities, the relevancy and importance of each issue and the experienced quality of each lesson and material used.

Evaluation concept

The objective of the evaluation is to determine whether the goals of the program will be achieved in the implementations evaluated, and how the program has impact on student's career and opportunities.

The type of the evaluation follows standard course evaluation methods, i.e. formative, process and outcome evaluation, the latter only partial:

- The formative evaluation will provide feedback to the curriculum designers, developers and implementers to ensure that designed and implemented courses really meets the needs of the intended audience, i.e. assure or improve the quality of program. Formative evaluation and analyses will answer to the following questions:
 - Were the goals and objectives suitable for the audience?
 - Were the training methods and course materials appropriate for the audience?
 - Should the program or some part of it be developed further and if, how?
 - Furthermore, formative evaluation also provides information that benefits the development of the program, facilities and timing.
- The process evaluation will provide information concerning the training and lectures, like asked questions and verbal feedbacks.
 - Process evaluation answers the question "What did you do?"
 - It focuses on procedures and actions used to produce results.
 - Process evaluation takes place during the training delivery and at the end of the training.
 - The co-organizer (Responsible for the course)
 - monitors the training,
 - describes the training process as a whole, and
 - records the findings into the written report.
- The outcome evaluation tries to find out how the knowledge, attitudes, and behaviors of the audience developed. It takes a long time to find out the outcomes of the education and training, so in this stage only the main topics participants are able to do at the end of training, will be assessed.

The evaluation process will be as follows:

1. Semi-structured questionnaires will be created for the participants (Appendix A): If needed, the topics (topic 1, topic 2...) are **renamed to match to the parts of the course**. It is also recommended that co-organizer (Responsible for the course) writes the name of the evaluated course in the beginning of the questionnaire before printing it to make sure that the name is correct.
2. Time for the survey (approx. 15 minutes) will be allocated in the end of the course
3. In the beginning of the course the co-organizer (Responsible for the course) will inform participants about the evaluation and its importance for further development actions
4. The co-organizer (Responsible for the course) distributes the questionnaires to the participants to be filled in before leaving the course. The purposes of the questionnaire and how the data will be used should be explained clearly to the participants. This will help to improve the response rate and encourage them to make comments that can be useful to improve future programs.
5. The participants complete the questionnaires and return them to the co-organizer.
6. The co-organizer collects the questionnaires and deliver them to the evaluator.
7. The evaluator compiles all feedbacks and summarizes written analysis on the evaluations.

The evaluation approach will be based on a combination of qualitative and quantitative methods. The Microsoft Excel package will be used to transcribe the feedbacks and interviews. Open questions will be categorized and qualitative analysis of the groups will be done.

The final evaluation report will discuss the following issues:

- Did the curriculum reach the targets?
- How well was the knowledge creation and sharing realized?
- Did the participants assimilate knowledge and tools?
- Was the venue and equipment appropriate for the training course?
- What kind of further development will be needed, if any?

Schedule of the evaluations

The schedule of the evaluation should be matched to the phases of the curriculum. There is no sense to evaluate the course before the students have a true and fair view of the course, its phases and contents. Thus, the survey will be conducted in the end of the course. A closer schedule of each evaluation will be agreed later.

Please circle the scale that applies to your opinion on the following aspects of the training or education you participated.

Scale: 1= Strongly disagree, 2=Disagree, 3=Neither disagree or agree, 4=Agree, 5=Strongly agree

In common						
The facilitation (location, room etc.) was suitable for training		1	2	3	4	5
The topics and issues were relevant and responded to the goals of training		1	2	3	4	5
The lecturers explained topics of the lessons, additional questions, experiences, and topical issues arisen during the course well		1	2	3	4	5
There were enough time scheduled for each issue.		1	2	3	4	5
I got valuable knowledge from lessons and examples presented by lecturers.		1	2	3	4	5
I believe that can utilize the knowledge gained from lessons in my future career.		1	2	3	4	5
I can utilize the skills trained and knowledge gained in my future career, e.g. when consulting my clients.		1	2	3	4	5
Comments concerning the common issues						
Lessons and Topics						
Topic 1	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 2	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 3	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 4	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5

Topic 5	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 6	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 7	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 8	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Topic 9	The presentation was clear and understandable	1	2	3	4	5
	The issues were relevant and topical	1	2	3	4	5
	The information presented were up-to-date	1	2	3	4	5
Free speech						
What was good?						
What could have been done better? (E.g. was some topic missing or unnecessary)						
Would you recommend the course to someone you know? If not, why not?						
Was anything missing that you might need in your future profession / occupation / job?						
Was the proportion of topics and issues inside each topic suitable or should something be increased / decreased?						
Other comments						

Thank you for your answer