

Education and Culture DG

Lifelong Learning Programme

Leonardo Da Vinci Transfer of Innovation Project

I TUBE

Innovation Transfer in continuous education of an integrated model

Based on personalization and digital portfolio.

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**WP 2 MODEL INTEGRATION AND ADAPTATION  
INTEGRATED DESIGN**

**Reviewed**

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 **Learning Community**

# SUMMARY

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## INTRODUCTION

The present document describes how to integrate a theoretical model of personalization, with the practical tool of digital portfolio. The two issues, the theoretical and the operative one, complete each other and realize a new integrated tool, empowered both from a methodological and a practical point of view, in a new empowered strategy aimed to support the implementation of the map of competence of trainers.

The Integrated design is a preliminary step for the implementation of the transferring process that will be based on the ex ante validation results acquired through the Focus group reports in the local contexts. Guide Lines for transferring of the ITUBE integrated model will be designed thanks to the information acquired from the local practices of personalization and use of digital portfolio and from the focus group results.

The integrated design is the result of the accurate analysis of the experiences of partners in the specific field of the ITUBE project, shared during the Alignment phase. These information are related to:

- Practices in the use of digital portfolios and personalization approaches;
- questionnaires, related to the two above cited issues, filled by partners of ITUBE project;
- first ITUBE Consortium meeting discussions and suggestions particularly related to a shared meaning of personalization and digital portfolio.

Here are outlined:

- reasons of the integrated design;
- main areas of integration.
- strategy of integration;
- strategy of adaptation of the integrated design to the specific contexts of transferring.

## WHY INTEGRATED DESIGN

Digital portfolio and personalization approach are substantially congruent and consequent. Both are indeed oriented to valorise the competences of the trainers, starting from their representative biographies. Yet digital portfolio and personalization approach take origin from different contexts. The first is oriented to a practical and tangible dimension; the second is oriented to a methodological dimension.

The integrated design analyses the complementary aspects of the building of a Digital portfolio and the methodological approach of personalization, combining them in a new empowered strategy.

Moreover I TUBE intends to implement the use of this empowered and innovative strategy within the Continuous Education of adult trainers: it requires an adaptation to this new specific context.

## MAIN AREAS OF INTEGRATION

Two main areas of integration can be pointed out:

- 1) evaluation area;
- 2) empowering area.

These two areas are here briefly introduced. A detailed description of the integration strategy is following provided.

- 1) **EVALUATION AREA** – refers to the method of identification of competences to be shown in the Digital portfolio.

The process for building a digital portfolio and the approach of personalization are both oriented to support the surfacing of awareness about the competences that adult people have. Digital portfolio allows showing the competences also acquired in non formal or informal<sup>1</sup> contexts of learning. The personalization approach explicates how

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<sup>1</sup> Official European definition of formal, not formal, informal learning is provided within the Memorandum of Lifelong Learning, European Commission, Bruxelles, 2000. According this definition: “**Formal learning** takes place in education and training institutions, leading to recognised diplomas and qualifications. **Non-formal learning** takes place alongside the mainstream systems of education and training and does not typically lead to formalised

to acquire awareness of these competences. Both the two approaches are based on self-assessment, as an active and participated process of evaluation not externally imposed.

In the I TUBE Project the building of a digital portfolio represents a strategy to motivate adult trainers to acquire awareness of their competences, through a self assessment process oriented to identify strength and weakness points and to over-cross consolidated ineffective teaching routines.

- 2) EMPOWERING AREA - refers to the strategy of empowering the competences highlighted by the previous self-evaluation, through a collective, dynamic and iterative approach. The self evaluation exercise, proposed by I TUBE, is at the same time a collaborative, collective, peer evaluation exercise based on a integrative and progressive comparison. While trainers experience this approach they are, in the same time, empowering their own teaching competences and learning a personalization strategy.

The dynamic cycle of the collective, peer, collaborative self evaluation allows trainers to acquire awareness of their competences and of areas to be empowered. The self evaluation is at the same time a learning process and the tangible result of this process will be, for trainers, the creation of the digital portfolio of their competences. The intangible result of this learning process will be, for trainers, the empowerment of the culture of personalization, the enhancement of teaching competences through the familiarization with personalization strategies, self evaluation and self orienteering approaches, collaborative learning methods.

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certificates. Non-formal learning may be provided in the workplace and through the activities of civil society organisations and groups (such as in youth organisations, trades unions and political parties). It can also be provided through organisations or services that have been set up to complement formal systems (such as arts, music and sports classes or private tutoring to prepare for examinations). **Informal learning** is a natural accompaniment to everyday life. Unlike formal and non-formal learning, informal learning is not necessarily intentional learning and so may well not be recognised even by individuals themselves as contributing to their knowledge and skills.”

## STRATEGY OF INTEGRATION

The integration strategy is based on the analysis of complementary aspects among personalization approach and the building of a digital portfolio.

The first complementary aspect refers to the focus on competencies and representative biographies:

- Digital portfolio allows people to show the competencies acquired in non formal, informal and formal learning experiences, through the creation, storing, updating and publishing meaningful and representative documents, electronic files, images, multimedia, blog entries, hyperlinks, etc. ;
- approach of personalization guides to identify, through a collective self assessment process, which competences it is better to select and to show with reference to a specific personal aim or a Market request. It can empower the building of the Digital portfolio, transforming this activity in a process of self-reflection and learning experience aimed to increase the self-awareness of adult learner.

For example, digital Portfolio allows to:

- Manage a summary of experiences of studying, working, living and playing, available everywhere and at all times, constantly updated online;
- Store examples of productions, in the form of text, images, graphics, audio and video recordings;
- Create groups of visitors to share some data with the vision of educators, teachers, assessors, employers, colleagues or even friends and family;
- be available always and everywhere a showcase of own qualities and talents, providing also trace the development over time and progress throughout life.

The digital tool supports the practical building of the portfolio. Some pre-designed grids suggest the selection of information: Notes - please provide here your general profile, stressing the information and aspects you consider meaningful (education, training, hobbies, married/not married, etc.). Keywords - indicate the words more suitable to describe your education/training/professional or not professional profile.

Some fields of a Curriculum format are provided:

- *“Work experience”*
- *“Competence acquired”*
- *“My interests”*
- *“My future goals”*
- *“Additional notes”*

having in addition the opportunity to upload video, pictures, etc.. useful in order to document the listed competences. The correct process to upload them is fine described in [www.tipeil.eu](http://www.tipeil.eu) (Operators log-in: slc1; password: dp2233).

DIGITAL PORTFOLIOS PLATFORM	
 <b>Enter Personal data</b>	
select a country	<input type="text" value="Select one"/>
name	<input type="text"/>
Family name	<input type="text"/>
date of birth	<input type="text" value="(dd/mm/yyyy)"/>
Place of birth (city)	<input type="text"/>
Nationality	<input type="text"/>
country of residence	<input type="text"/>
e-mail (optional)	<input type="text"/>
Key words	<input type="text"/>
Notes	<input type="text"/>
 upload personal photo	<input type="button" value="Scegli Documento"/> nessun docume...o selezionato
 need help?	
<b>My Short profile</b>	
Work experiences (the most important for me):	<input type="text"/>
Competences acquired:	<input type="text"/>
My interests:	<input type="text"/>
My future goals (sectors where I wish to work):	<input type="text"/>
Additional notes:	<input type="text"/>

LLP-LDV/TOI/2007/IT/019

# TIPEIL

Picture  
 Name  
 Surname

**Personal data**

**Formal Learning**

compulsory education

secondary school/  
vocational training

higher school

master/post-graduate c

other licences/certificate

**Informal Learning**

**Non formal Learning**

How to identify, select and describe competences, notes, experiences and future goals?

How to identify, select and describe the meaningful competences acquired in informal or not formal contexts?

The approach of personalization methodologically supports this critical task through the steps of the self evaluation approach proposed by ITUBE.

The implementation of the proposed self evaluation process allows to transform the selection and description of competences, notes, experiences and future goals in a meaningful learning process, able to empower the self awareness of adult trainers about their strengths and weakness, referring them both to personal aims and Market requests.

This first described complementary aspect realizes the first EVALUATION AREA of integration.

A second complementary aspect guides to the second integration area of EMPOWERING.

The building of the Digital portfolio is originally an individual exercise guided by a coach. It is personalized in a one to one relation of counselling.

Approach of personalization transforms this exercise in a collective personalized process. The added value is that while trainers experience this approach they are, in the same time, empowering their own teaching competences and learning a personalization strategy. This

exercise guides trainers through the collective, collaborative self evaluation cycle that is a personalized pathway for empowering teaching competences of trainers. The proposed self evaluation process implements, in other terms, a collective and collaborative self learning process oriented to:

- valorise highlighted strength points and to empower weakness points of trainers' competences;
- enhance culture of learning personalization;
- empower teaching competences;
- familiarize with personalization strategies, self evaluation and self orienteering approaches and collaborative learning methods.

This second complementary aspect realizes the second EMPOWERING AREA of integration.

Here is briefly described and summarized the proposed collaborative, iterative, integrative, self evaluation process based on collective and peer comparison.

Strategy of adaptation and practical instructions for the implementation of the proposed ITUBE Model will be presented in the Guidelines for transferring.

### **“@” model**

The “@” model for learning self-assessment is an attempt to use organizational learning in the assessment field.

The idea came from the use of the Audit methodology in organizational learning to try to re-elaborate and re-use models that already have been experimented and have proven effective.

The “@” symbol, that corresponds to the sign used by that already have been experimented and have proven effective. The spiral form of the @ has been chosen for the similarity with the recursiveness and cyclicity of the described process.

A new awareness and organization gradually come forth from the facilities and systems to which the model is applied. The self-assessment “@” is the symbol of the path that leads and directs towards consecutive surfacing levels of internal and external aspects of knowledge and competences, in a steady, recursive and progressive spiral growth.

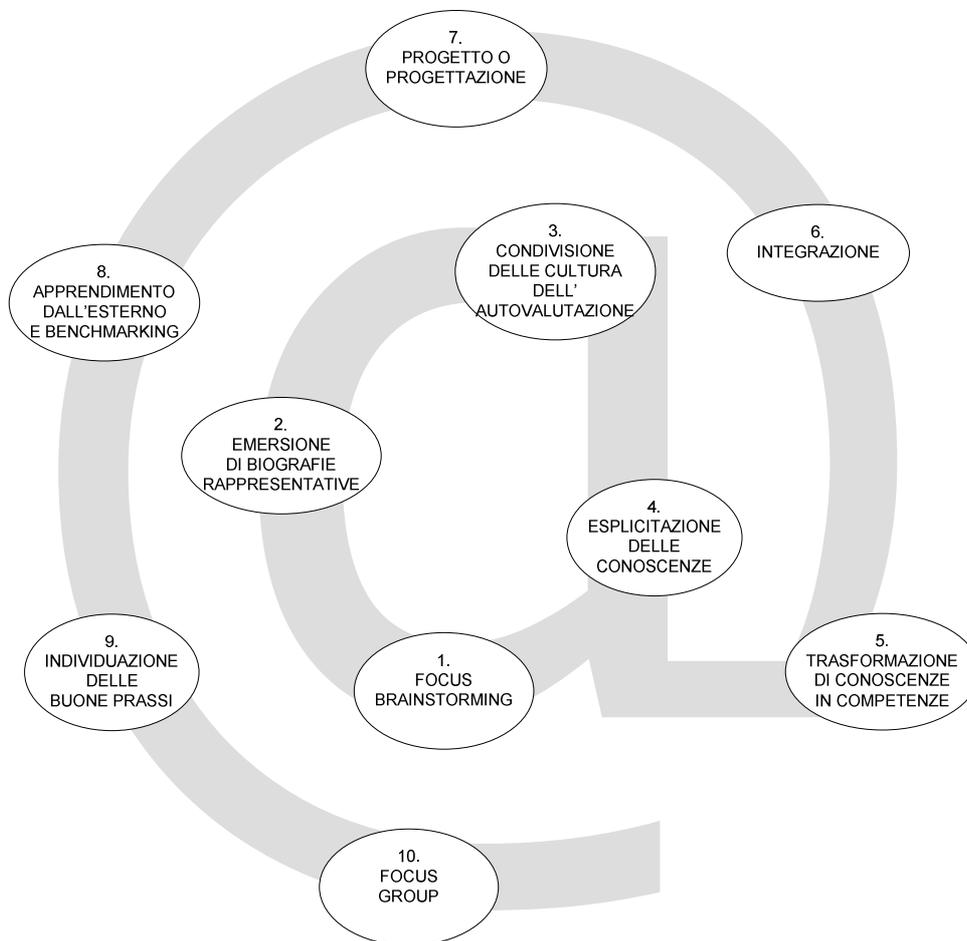
This may also be an individual passage. Self-assessment brings into play the meta-cognitive and critical reflection skills that allow verifying the efficiency of one's own learning strategies and, if necessary, changing them. The main self-assessment tool is the person himself/herself, and he/she has an active and self-responsible role.

The model focuses however on the results reached by the group before those reached by a single individual. The group assesses objective attainment and the processes implemented to achieve them, through a qualitative and holistic meta-reflection on the strategies adopted to attain skills and competences. Self-assessment is a group of reflection in which everyone is asked to describe his or her own behaviour and attitude (how did I work, how did I interact and communicate with others, what other criticalities have surfaced, etc.). Thus self-assessment plays a central role, it deals with the communicative, emotional and social areas as well as its contents. The goal is therefore to assess, more precisely self-assess, the work group's efforts. As said before, the analysis of the procedural course considers both the operational and thematic passages and the perceptual aspect alike and is tied to individual internal checking.

Two aspects are analyzed:

- contents: regarding the mandate and the specifically operative part of the group;
- emotional aspect: regarding a set of tried out and experimented emotions.

Regarding the “@”procedure, the items of the outline are all included below in order from 1 to 10.

**SELF-ASSESSMENT @: PATH REPRESENTATION**

1. *Focus brainstorming;*
2. Introduction of representative biographies;
3. Sharing the self-assessment philosophy;
4. Skill manifestation;
5. Transforming skills into competences;
6. Integration;
7. Project or design;
8. Outside learning or *benchmarking*;
9. Good practice identification;
10. Focus group.

<b>@ of the self assessment: the path levels</b>		
Level	Definition	Description
1	Focus brainstorming (focusing on the topic skills)	<b>Contents:</b> general presentation of the laboratory and of the manner in which the shared and group activities are carried out; illustrating topics discussed during the meetings; an agreement whose final aim is to have the animators/facilitators and participants come to an understanding about their reciprocal commitments.
2	Introduction of representative biographies	<b>Contents:</b> establishing the work groups; first meeting with the internal <i>tutor</i> , who has the goal and the task of guiding the group during the fine-tuning of the first mandate; members socialization, information exchange and sharing of personal aspects.
3	Sharing the self-assessment philosophy	<b>Contents:</b> initial moment to create an environment that fosters sharing a series of choices that involve self-assessment. Presenting the first product and comparing: <ul style="list-style-type: none"> <li>• Within the group, to see if the product is considered satisfying by the components;</li> <li>• Outside the group, therefore comparing with other groups, to see if the product achieves a satisfactory acknowledgement with reference to the mandate and if it falls under the minimum general conditions of the other products.</li> </ul>
4	Skill amplification	<b>Contents:</b> designing. To complete the mandate one must necessarily refer to even if only instinctive designing skills. The tutor's involvement may be instrumental: he/she must guide the search for areas to create the project, divulging his/her skills and encouraging the creation of a "learning community"
5	Transforming skills into competences	<b>Contents:</b> actually creating the piece. Specifically, a series of skills must be at first shared, then transforming them, putting them into action, into specific competences for the mandate.
6	Integration	<b>Contents:</b> union of the various group pieces to assemble one document. This stage, is carried out only by the tutors in two steps: <ul style="list-style-type: none"> <li>➤ First comparing various projects</li> <li>➤ Integrating them to create only one document that is shared by the group.</li> </ul>
7	Project or design	<b>Contents:</b> completing the collective piece and presenting it to the plenary session of the groups, above all to those who did not participate in the previous stage. Reuniting all macro-group level forces, a core of competences within the project, spawning an "enlarged learning community."
8	Outside learning or <i>benchmarking</i>	<b>Contents:</b> fundamental support is collected from the indications given by the animators/facilitators and the material drawn from a certain number of documental sources (with intensive ICT use, that is Information and Communication Technologies) about <b>organizing</b> the <b>layout</b> of the piece to improve the collective document.

9	Good practice identification	The document is compared to the other already specifically organized documents to gauge the content and stylistic differences and to develop their potential integration.
10	Cognitive agglutination Focus group	The final focus group represents a cognitive agglutination stage in which it is possible to identify the passage from the learning community to the practices community and that is from a coherent learning group to a complex group-system. The various subjects begin to reveal different aspects compared to the beginning learning stage because their cognitive perception and self-awareness start to come forth and become part of their shared experiences knowledge.

### Description of the @ of self evaluation/self learning process implementation

Here it is presented a description of one of the personalizing experience managed using the @ model of self evaluation, focusing on:

- Task;
- Process development;
- Duration;
- Organization;
- Approach.

#### The task

The assigned task is intentionally simple. It must not require previous technical competences. The first time that the group carry out the @ process it is important that the attention is focused on the process itself more than on the content. During the first experience of the @ process it is not important the content but the way in which whatever content can be afforded. The acquisition of consciousness about the development of the process is the previous result of the training path. Going through the stages of the process the group progressively and spontaneously acquire consciousness of the process itself. Only at the end of the training path, the professor shows the steps of the @ process, guiding the group to recognize the phases of the concluded experience. The symbol of the @ represents just an iterative cycle of progressive improvement of the person that reaches, at each turn of the cycle, a new level of ability, of consciousness, knowledge, competence.

Once the process has been experienced, and the rules are interiorized, it can be applied to every content or problem to be solved.

The 160 participants are invited to create sixteen groups of ten components each one. Each group is invited to choose a name, to identify an observer, taking note of the behavior of the components of the group and of the whole group, who will report the results of the group during the plenary sessions.

It is requested to the participants to simulate to be a group working together for the first time for the realization of a project. The assignment is to design a grid for the presentation of the group. To be effective the grid must contain the essential information useful in order to decide what each component is more apt to do within the simulated project to be actuated.

The assigned task is intentionally ambiguous and less structured. No examples nor models are offered, in order to encourage processes of problem finding and of problem setting, the production more than the re-production of knowledge, the use of self evaluation and self guidance competences. These conditions allow participants to really express their potentialities, using all their cognitive resources, experiences, competences.

### **The @ process**

#### *Focus brain storming*

The previous reaction by the participants is to ask for more information about the content and the structure the grid must have. They ask for examples or for more specific instructions. They are encouraged by the Professor to self coordinate the development of the work and to choose the solutions they consider more effective, to be compared and tested later on. It is the phase of *focus brainstorming*.

During this phase each group design its draft of the presentation grid negotiating the contents and a first structure.

The acceptance of this strange and not so clear task, by the groups, generates a sort of internal formative pact in the shape of a collaboration agreement among the members of the group.

#### *Representative biography standing out*

To test the effectiveness of the presentation grid, within each group, each component present itself to the others components following the fields of the grid. This exercise is a pretext that allows participants to stand out their representative biographies, to socialize, to exchange information, to better know each other and acquire more confidence.

#### *Sharing self evaluation culture*

As result of the first test of the grid, through the presentation of representative biographies participants identify new information they haven't considered, perfect the structure of the grid in categories and sub categories, delete superfluous information. This is a first step of an internal self evaluation process within each group.

The results of this first internal self evaluation step are shared among the 16 groups during a first plenary session. Each group presents its own work and can compare its results with the grids realized by the other groups, evaluating the aim achieved and deciding to perfect its own grid on the base of the examples offered by the other groups.

Criteria for the evaluation are explicitly formulated and highlighted during the comparison of the grids.

#### *Knowledge explication*

Through the first self evaluation session different questions made at the beginning of the process will have found an answer, a new level of consciousness has been reached by single and by groups about the nature of the work to be carried out. A first conscious process of planning take place on the base of the knowledge shared during the self evaluation stage and on the base of the planning competences of each component of the group.

#### *Transformation of knowledge in competences*

A new perfected grid is designed by each group.

#### *Integration*

Each group describes the beta version of the grid in a plenary session. All the participants together identify the best elements of each grid and define a sort of "ideal type" a format of a presentation grid.

Criteria for the evaluation and the choice of the best elements are explicitly formulated and highlighted during the comparison of the grids.

#### *Planning*

Once shared the choice about the best elements, the whole group designs a unique common grid.

The professor assigns homework to be carried out by each participant: to search for other examples of similar grids realized by other authors. Participants are requested to exercise their research competences, self-guidance competences, to explore within their personal experience and context, in order to find sources.

### *Benchmarking*

Participants show the results of their research. The group discuss about the differences and common elements of the findings, comparing them with the grid realized together, and decide what implement and how to perfect the work done. The benchmarking is another step of the @ of self evaluation and another phase of acquiring a new level of consciousness: from the initial internal self evaluation the group has compared its knowledge first with the whole group of 160 participants and now with a wider, potentially worldwide, external group of experts.

### *Good practice*

Once several examples have been identified it is necessary to select what better fit with the operative context where the grid could be used and the groups operate. That requires the definition of shared evaluation criteria. It is an important exercise: the choice of good practices is strictly connected to operative contexts; this directly involves again the experience, the biography, competences, sensibilities and attitudes of each participant. Once each group has found its criteria, the professor again assigns homework to be carried out by each participant: to find official sources (for example normative references, scientific criteria, technical criteria) where objective criteria for identification of good practice are described.

Then groups are invited to compare their criteria with official documents (for example normative references, scientific criteria, technical criteria). Each group identifies the criteria for the selection of best practices that can be applied to their operative context. During this phase the group better acquires consciousness also about the typology of project that could require the use of the presentation grid, and try to out line the frames of a really feasible project.

The selection of criteria for the identification of good practices is another step of the self-evaluation process: the group search for objective criteria, using official sources, and integrate these criteria adapting them to specific contexts of action.

### *Focus group of cognitive agglutination*

The professor shows to the group the steps of the @ process, guiding the group to recognize the phases of the concluded experience. The process is described as a sort of knowledge route, made by progressive stages of improved, collective and individual, consciousness based on continuous, internal and external, individual and collective, self-evaluation activities. The group acquires the consciousness to be a community that can afford, through this approach, every kind of problem, or can achieve every kind of aim.

**Duration**

6 meetings of 4 hours each one

**Organization****First meeting**

Half hour introduction and presentation of the task

1 hour Focus brainstorming

1 hour Representative biographies standing out (roughly ten minutes for each component of the group)

Half hour break

1 hour first internal self evaluation session

**Second meeting**

1 hour presentation and discussion of the grids by 5 groups– second step of the sharing of the self evaluation culture enlarged to the whole group of all participants

half hour break

1 hour presentation and discussion of the grids by last 5 groups

1 hour and half group work for the re-designing of the grid – knowledge explication and transformation of knowledge in competences

**Third meeting**

1 hour presentation and discussion of the beta version of the grids of the ten groups in a plenary session

1 hour discussion about the best elements of each grid

Half hour break

1 hour and half collective choice of the best elements to be integrated in an “ideal type” grid. Design of the final unique common grid of the group.

Professor assigns homework to participants: to find examples of similar grid realized by other experts or people.

**Fourth meeting**

1 hour and half presentation and discussion of the findings of the benchmarking made by each participant as homework.

Half hour of break

1 hour of groups work in order to analyze the features of the specific context where the grid could be used and choice the criteria to select good practices, within the findings of the benchmark, that can improve the grid for its use in the specific operative context of participants.

Choice and implementation of the elements to be integrated in the realized grid.

1 hour plenary session and presentation of the improved grids

Professor again assigns homework to participants: to find official documents (for example normative references, scientific criteria, technical criteria) for the selection of good practices.

### **Fifth meeting**

1 hour and half presentation and discussion of the findings of each participant about the criteria for the selection of good practices.

Half hour of break

1 hour of groups work in order to perfect the selection of the evaluation criteria for the choice of good practice using the official criteria, choice and implementation of the new elements to be integrated in the realized grid.

1 hour plenary session and presentation of the improved grids

### **Sixth meeting**

2 hours presentation of the @model, discussion of the realized process and of the main stages crossed.

Half hour of break

1 hour and half individuation and discussion about the aims and the problems that can be afforded by the group through this approach.

### **Approach**

The @ of self evaluation is based on an inductive approach, not didactic, nor directive. The role of the professor is to scaffold and offer peer tutoring.

During the whole life cycle of the @ process professor with his/hers assistants (one or two) go through the groups, gives suggestions, answers the questions, encourages participants who are less involved, makes questions, etc.

The @ process development is mainly based on a collaborative learning (rather than cooperative) approach. It is not referable to a unique specific pedagogic theory. It rather

includes and matches several theoretical elements of cognitivism, constructivism, constructionism, connectivism, interactionism.