

Erasmus+ IMPROPAL 2015-1-SE01-KA203-012315
Essential quotes on Project Work from literature
compiled by the Technical University of Cluj-Napoca IMPROPAL team

PROJECT WORK

What it is?

A somehow almost precise definition of the aim of Project Work thread of the IMPROPAL agenda can be found in the Roskilde model (Andersen, 2015) as *“... an approach to learning, emphasizing the transfer of knowledge and skills from education to working life, and also as a means of stimulating the motivation of learners. Generally speaking, a project represents extended work on a well-defined subject that must be completed within a given **time** frame.”*

The Project Work approach can be structured into two broader categories, synthesized according to the specificity of the educational domain where it can be applied. These are:

1. Project Work carried out as an activity in the faculty curriculum, as an institutionalized activity of the school, with didactic hours included in the curriculum and a clear and fixed structure; and
2. a second type of Project Work, more flexible, which can be applied punctually, in a more flexible system generated primarily by the educators as means of structure that can organize the disciplines in a more applicative note. This second type is harder to define and structure, being directly dependent on the educational field where it can occur. This second type can borrow a percentage of the conventional normative hours of the respective theoretical discipline in order to dynamize that discipline and bring with it easier assimilation of specific theoretical concepts which in a cumulative catalytic process can make a link more direct with the future specialized job targeted by the future graduate of the faculty.

Another possible structure of the Project Work component can be done using **the time variable**, as suggested by the definition proposed by the Roskilde model mentioned above.

Thus, there may be:

- a) short-term projects that check or teach the student a punctual aspect presented at the course or in the seminars,

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- b) medium complex projects that require the integration of several dependent elements or require more involvement and time from the student, and
- c) complex projects that can have a duration of 1 semester or 1 year with a high degree of difficulty, involves a sum of interconnected concepts and abilities, more work, staging, etc.

Theoretical highlights: a literature survey

The following table contains a comparison between different forms of active learning as described by Savin-Baden which may come in handy when choosing a specific method and describing the different roles that students and tutors have regarding different types of activity.

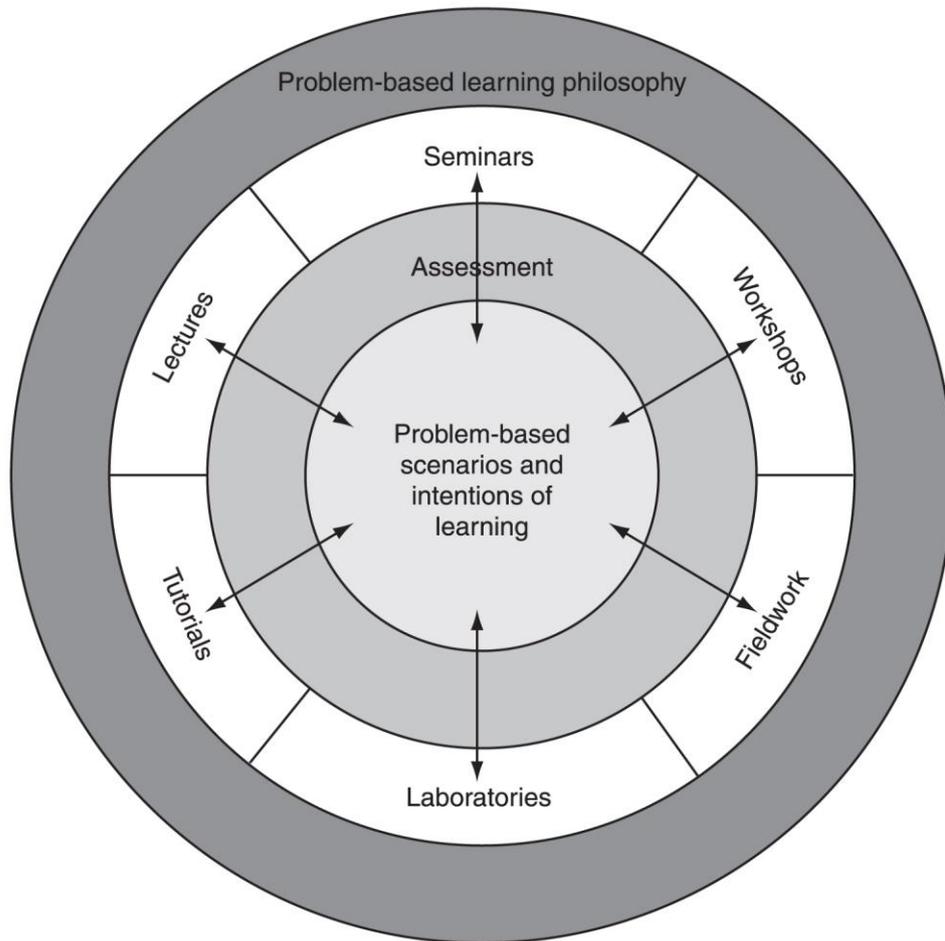
Comparison of forms of active learning

<i>Method</i>	<i>Organization of knowledge</i>	<i>Forms of knowledge</i>	<i>Role of student</i>	<i>Role of tutor</i>	<i>Type of activity</i>
Problem-based learning	Open-ended situations and problems	Contingent and constructed	Active participants and independent critical inquirers who own their own learning experiences	Enabler of opportunities for learning	Development of strategies to facilitate team and individual learning
Project-based learning	Tutor-set, structured tasks	Performative and practical	Completer of project or member of project team who develops a solution or strategy	Task setter and project supervisor	Problem solving and problem management
Problem-solving learning	Step-by-step logical problem-solving through knowledge supplied by lecturer	Largely propositional but may also be practical	Problem solver who acquires knowledge through bounded problem solving	A guide to the right knowledge and solution	Finding solutions to given problems
Action learning	Group-led discussion and reflection on action	Personal and performative	Self-adviser who seeks to achieve own goals and help others achieve their's through reflection and action	A facilitator of reflection and action	Achievement of individual goals

(Savin-Baden, 2003), p. 7

The next sketch describes the problem-based learning philosophy and its complexity in relation to the curricula.

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A model of problem-based learning curriculum design.

(Savin-Baden, 2003), p. 120

The following categories and structures are compiled from *Reinventing Project-based learning* by Suzie Boss and Jane Krauss which we consider to be relevant as basis for further discussions when dealing with the Project Work approach.

So, the authors define the hallmarks of a reinvigorated approach to projects as:

- *Projects form the centerpiece of the curriculum-they are not an add-on or extra at the end of a "real" unit.*

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- *Students engage in real-world activities and practice the strategies of authentic disciplines.*
- *Students work collaboratively to solve problems that matter to them.*
- *Technology is integrated as a tool for discovery, collaboration, and communication, taking learners places they couldn't otherwise go and helping teachers achieve essential learning goals in new ways.*
- *Increasingly, teachers collaborate to design and implement projects that cross geographic boundaries or even jump time zones. (Boss, 2007).*

Using the project approach will prompt you to reconsider:

- *your learning goals. Be ready to rethink your expectations for what students will know and do.*
- *the way you talk and engage with students. Be ready to step off the stage and interact with your students differently.*
- *your classroom management style. Be ready to help students become better at managing their own progress.*
- *the physical arrangement of your class. Be ready to reconfigure the hardware – desks, computers, and other furnishings - to facilitate teamwork and collaboration.*
- *how you think about assessment. Be ready to reevaluate what you need to pay attention to throughout the learning process.*
- *what you collect. Be ready to reconsider which artifacts of learning are worth keeping.*
- *how you communicate with parents and colleagues. Be ready to explain your reasoning for taking the 21st-century project approach. (Boss, 2007).*

Members of your community for addressing digital-age projects should share these research-based components:

- *have a clear sense of mission*
- *share a vision of the conditions they must create to achieve the mission*
- *work together in collaborative teams to determine the best practice to achieve the mission*
- *organize into groups headed by teacher-leaders*
- *focus on student learning*
- *arc goal- and results-oriented*
- *collaborate with each other*
- *hold shared values and beliefs*
- *commit themselves to continuous improvement*

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- *see themselves as life-long learners (Boss, 2007. p.35).*

Imagine how your project plan can evolve using the following higher-order thinking skills and the actions associated with them:

- *Analyze - examine, explain, investigate, characterize, classify, compare, deduce, differentiate, discriminate, illustrate, prioritize*
- *Evaluate - judge, select, decide, justify, verify, improve, defend, debate, convince, recommend, assess*
- *Create - adapt, anticipate, combine, compose, invent, design, imagine, propose, theorize, formulate (Boss, 2007. p.47)*

Overcoming pitfalls has a great importance in dealing with the Project Work approach as it may or may not lead to a successful finalization.

- *Potential pitfall: Long on activity, short on learning outcomes.*
- *Potential pitfall: Technology layered over traditional practice.*
- *Potential pitfall: Trivial thematic units.*
- *Potential pitfall: Overly scripted with many, many steps. (Boss, 2007. p.60-62)*

The best projects share the following qualities. They:

- *are loosely designed with the possibility of different learning paths*
- *are generative. causing students to construct meaning*
- *center on a driving question or are otherwise structured for inquiry*
- *capture student interest through complex and compelling real-life or simulated experiences*
- *are realistic, and therefore cross multiple disciplines*
- *reach beyond school to involve others*
- *tap rich data or primary sources*
- *are structured so students learn with and from each other*
- *have students working as inquiring experts might*
- *get at 21st-century skills and literacies, including communication, project management, and technology use*
- *get at important learning dispositions, including persistence, risk-taking, confidence, resilience, self-reflection, and cooperation*
- *have students learn by doing (Boss, 2007. p.65)*

The projects' ideas come from many sources which at the core have to be meaningful and have a certain degree of relevance to the field studied. Where projects idea come from:

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- *a tried-and-true project with potential for more meaningful, expressive learning
(including opportunities for students to teach others what they have learned)*
- *project plans developed by and for other teachers*
- *news stories*
- *cotemporary issues*
- *student questions or interests*
- *a classroom irritant put to educational use*
- *a "mashup" of a great idea and a new tool (Boss, 2007. p.65-66)*

As for designing a project the following steps may be of use:

1. *Revisit the framework.*
 - a. *Make a final list of learning objectives for core subjects and allied disciplines.*
 - b. *Decide on the specific 21st-century skills you want to address.*
 - c. *Identify learning dispositions you want to foster, such as persistence and reflection.*
2. *Establish evidence of understanding. Imagine what students would know or be able to do once they have learned. Imagine how they would be different as learners and as people.*
3. *Plan the "vehicle" (the project theme or challenge), Think: What would students inquire about, do, create? Strive for "optimal ambiguity"-that is, both enough structure and enough flexibility to serve the needs of the project.*
4. *Plan entree into the project experience. What are the first things you might say to get students' attention and build excitement for the learning ahead? What will captivate your students? (Boss, 2007. p.67-68)*

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REFERENCES

Andersen, A. S. and Heilsen S. B. Editors. (2015). *The Roskilde Model: Problem-Oriented Learning and Project Work*. Switzerland: Springer.

Boss, S. and Krauss, J. (2007). *Reinventing Project-Based Learning*. USA: iste

Delisle, R. (1997). *How to use Problem-based learning in the classroom*. USA: ASCD

The Centre for Outcomes-Based Education (COBE). Work-based learning: models and approaches. www.open.ac.uk/cobe

Savin-Baden, M. and Howell Major, C. (2004). *Foundations of Problem-based Learning*. England: Open University Press.

Savin-Baden, M. (2003). *Facilitating Problem-based Learning*. England: Open University Press

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