



## Meeting in Ljubljana

As we announced in our previous newsletter, the groups from partnering countries have met in Ljubljana, Slovenia. The meeting took place from 11<sup>th</sup> to 17<sup>th</sup> December 2017. In this meeting all partners have discussed the effect of the test scenario on the proportionality and areas in different countries and agreed on the focus for the work to be done in the coming months.



The project team analysed the results of the questionnaires filled by the students and the teachers after the implementation of the scenario and possible improvements were suggested. *The most important observation from the scenario is that some teachers tend to teach the students during all phases of the scenario. This ruins the didactical potential of the situation and strongly distracts students.*

After a discussion about how to assess and evaluate students' work on the scenario, it was concluded to include in the module an immediate task (or more simple tasks) the students are supposed to be able to solve if they have reached the learning goal of the scenario.

## First module is published!

MERIA module is an extension of a MERIA scenario. The module consists of the *scenario, explanation of materials, variations based on didactic variables, observations from practice, evaluation tools, and rationale and RME perspectives on the scenario.*

The module gives suggestions for the teachers on how to use the test scenarios and what to use in a certain phase of the scenario. Possible changes to the scenario are outlined and the importance of what should be left unchanged is emphasized. The student strategies and possible interventions are given with data from the implementation of the scenario.



Mathematics Education -  
Relevant, Interesting and Applicable

If possible, some self-evaluation tools for the students are provided. Some potential strategies are outlined for the teacher so that (s)he might know whether some ideas were left out. The choice of the mathematical knowledge is addressed and also the relevance and applicability of the target knowledge is addressed as a part of a broader goal.

The testing of the first scenario and the provided feedback from the students and the teachers resulted in rich material that forms the first MERIA module. It is published as part of the **MERIA Template for Scenarios and Modules** booklet. *The booklet is now available on project web page. So, take a look and try the scenario yourself!*

## New scenarios

A rich open problem for a scenario should encourage the students to engage in asking questions about the given problem and think of a solution. The students should be able to experiment with different ideas they might get. A good scenario would entail different possible strategies that lead to similar (if not the same) solutions. The experimentation process gives the students an understanding of the underlying problem. **MERIA scenarios will probably cover piecewise linear functions for modelling optimal production costs, quadratic functions in the physical context of driving a car, introduction to derivatives as the slope of a function, introduction to logarithms as inverses to exponentiation, interplay between algebra and geometry in terms of conflict lines and use of statistics in evaluation job offers.**



## Further work – new scenarios and modules

In the following months new scenarios will be developed and implemented in classrooms. With the feedback provided from the implementation, the modules for these scenarios will be created by the end of the year.

