

One Group Interdisciplinarity - Keywords

We are 10 persons

7 from Germany 6 from secondary school – 1 from university 2 from Italy 1 from kindergarten 1 from secondary school and SSIS University 1 from Austria (secondary technical school)

In teaching we follow a basic curriculum of general education and that means interdisciplinary teaching is similar to the scientific approach that we usually use in every professional activity and research.

Furthermore we follow the curriculum for each singular subject and in science subjects school has the obligation to teach science literacy (e.g. OECD resolution of 1999):

- Understand the world
- Make decisions about environment
- Understand the impact of humans on nature

Problems to follow this guideline:

- At most schools only one scientific subject is taught at a given time
- Teachers are not prepared for interdisciplinary teaching (teacher education focuses on single branches of science)

However, we believe in the following aspects:

- Getting a deeper insight into one topic at one time will help you to win time, you need not teach about the same topic several times.
- Children come from primary schools understanding their environment as a whole
- They are experienced being taught interdisciplinarily at primary school
- Interdisciplinary teaching can be part of the curriculum in everyday classroom practise, e.g. interdisciplinary teaching as a teaching method, probably for an introduction of new topic.
- At upper secondary school (in Germany) science teaching is carried out interdisciplinarily working in projects, these can be adapted suiting all levels of age and ability (starting at kindergarten)

Therefore we propose the following steps:

- The curriculum must provide the space to enter interdiscilinary teaching into common classroom practise, i.e. all scientific subjects must be taught in the same grade.
- During teacher training interdisciplinary teaching must be a teaching objective
- At every school teachers should have the possibility to meet at a round table to develop interdisciplinary curricula. These curricula could start at science teaching and then develop into curricula across all subjects.
- Theory and hands-on activities should be a combination in everyday classroom practise.

Classroom practise shows that interdisciplinary teaching is possible if the time and the space are provided, examples at *Science on Stage* prove this!!!