

## Decoding the Disciplines in European Institutions of Higher Education Intercultural and Interdisciplinary Approach to Teaching and Learning

# MULTIPLIER EVENT AND DECODING THE DISCIPLINES WORKSHOP LEARNING AND APPLYING THE METHODOLOGY

Discipline: Laboratory of General Pedagogy. The first year of Annual course. Pre-primary and Primary School Teacher in University Education and Training. Università degli Studi Roma Tre, Italy- By Sandra Chistolini

MULTIPLIER EVENT – ERASMUS PLUS  
UNIVERSITÀ DEGLI STUDI ROMA TRE – ITALY  
STUDENT CONFERENCE

Workshop of the students 12<sup>th</sup> March 2018

### Focus group tasks

- ✓ Introduction of the bottleneck (University student)
- ✓ Definition of the bottleneck (Child)
- ✓ How to solve the bottleneck (Teacher)
- ✓ How the Head teacher can help (Head teacher)
- ✓ The expert gives the evaluation (Expert)

### OPEN A BOTTLE FULL OF THOUGHTS

**WHO WE ARE?**  
- FIVE HEADS FOR A BEGIE:  
Erica Pichini (university student), Amanda Piersanti (child), Irene Pizzoli (teacher), Valentina Pontoni (the principal), Marianna Rosa (the expert).

**IN CHE PROGETTO SIAMO COINVOLTE?**  
Decoding the disciplines in European institutions of higher education: intercultural and interdisciplinary approach to teaching and learning → Progetto UE Erasmus +

**WHY THIS TITLE?**  
"Open a bottle full of thoughts"  
This is the purpose of the full formed teacher through the Decoding methodology. In fact the first of its 7 parts aims to identify the bottleneck that prevents the student from progressing in the construction of his knowledge. The knowledge should be decided to make it accessible to the student.

Erica Pichini

### Child: bottleneck's hypothesis in primary school

We have imagined our child having some problems in writing, in particular with the letter H, especially between the verb "to have" and prepositions and conjunctions.

In Italian the verb "to have" has some forms with silent H (such as: "ho", "hai", "ha", "hanno") which are easily confused with the conjunction "o" (that means "or"), the prepositions "a" and "da" (which means "to") and the noun "anno" (which means "year").

The child was also not opened to ask questions to the teacher because of fear, shame and sense of inferiority. So there was also a block for a **constructive relation between her and the teacher.**

Our child had two bottlenecks:  
• One **grammatical.**  
• The other one **psychological.**

Marianna Piersanti

### THE TEACHER FACES BOTTLENECKS

#### THE TWO BOTTLENECKS

The teacher is dictating a text to the class (third year). At the time of the correction she notices that a child doesn't use the letter H in the right way. She can't distinguish «H» from «O». She even realizes that the little girl never asked for more explanations about this topic because a significant relationship has never been established between each other.

#### HOW DO TEACHER FACE THE BOTTLENECKS?

- «HO» o «O»?
- H is used for: possess something (ho una bambola = I have a doll); express feeling (ho paura = I am afraid); to do actions (ho saltato la corda = I jumped the skipping rope).
  - H isn't used for: answering the questions where? (vado a casa = I go at home); how? (a piedino foot); what? (a Luca = to Luca).
- Doggerell: ARE, ERE, IRE**  
Tacca va a dormire.
- RELATIONSHIP BETWEEN TEACHER AND CHILD**  
The teacher tries to share child's hobbies by including them during teaching activity in order to establish a significant relationship with the child. Since the child loves singing, the teacher decides to dictate the text of cartoon «Frozen» to the class. This text will be included in the finally school play at the end of the year.

### POSSIBLE SOLUTIONS TO THE BOTTLENECKS: PRIMARY SCHOOL

Following the issue we found in a primary school class (a child who had a problematic relation with her teacher and she doesn't understand the use of the letter «h»), the school master intervened in order to help the teacher. The child managed to understand the topic thanks to some tests that she did at school. In order to study the notions she learned and to avoid forgetting them, the head teacher agreed to introduce a project that was suggested by the teacher: «the correspondence among various schools (B. Ciari «Le nuove tecniche didattiche; Edizione dell'asino 2012). They had to organize the classes in different turns. This correspondence consists of letters and beloved objects that were exchanged among the students of different schools. During the writing of these letters, the teacher pushes the children to create phrases that require the use of the «h». The project aims at stimulating and increasing the kids' interest towards creative writing, in order to obtain a general improvement of the whole school group. Furthermore, for what concerns the relational issue, the head master suggest the teacher to tighten her relations with her students, to get to know their interests and to make the educational dialogue more lively. That's why the teacher decided to employ the girl's favorite movie's soundtrack (Frozen) for the school play.

Valentina Pontoni

### WHAT WAS OBSERVED?

At the beginning it was difficult to let our student-role out and to transform ourselves into the teacher, the principal and the child. After a lot of realistic problem's hypothesis we founded our child's problem: she couldn't understand the difference between «ha» (verb) and «a» (preposition) and between «ho» (verb) and «o» (conjunction). Despite the teacher's explanation, this grammar difficulty hid child's incapability to ask new explanations to the teacher (double bottleneck). The teacher, realized child's grammatical problem, after having corrected a specific dictation about the use of letter H, had explained this grammatical construction to the child and she has prepared some specific homeworks to help the child with this grammatical rule, sentences, dictation, etc... To consolidate the new notion the principal and the teacher have activated a correspondence between different schools to increase child's interest and competences in writing. To pass the relational difficulty between child and teacher, the teacher has decided to include child's personal interests into the didactics, using her attention in singing and including her favourite song into the ending year school play.

Marianna Rosa

### Emotions in the circle of 7

Focus group 12: the worker bees

Chiara Alessandri -> undergraduate  
Maria Grazia Assenza -> child (3rd grade of primary school)  
Ilaria Biondini -> teacher  
Alessandra Caciolo -> head teacher  
Arianna Capati -> expert observer

### Undergraduate "explanation of the methodology"

The decoding the disciplines is a pedagogical methodology, whose purpose is to effectively teach a given discipline. During the teaching-learning process, difficulties may emerge, which are also attributable to "obstacles", which are called bottlenecks (literally bottleneck, which prevents the content from going out all at once). For a primary school teacher, decoding becomes a discipline that allows:

- communicate with the child, bringing out the bottlenecks;
- to ask and reflect on the method used and on what the child has to say, contextualizing the difficulty presented;
- decoding the problem, through interaction / reflection / comparison with other teachers and with the head teacher;
- identify, implement and verify strategies.

Alessandri Chiara

### THE CHILD

Bottleneck: table of seven.

At the time of mathematics during the course of an exercise, the teacher realizes that Maria Grazia is left behind.

Question: "Teacher I can not learn the table of 7?"

Assenza Maria Grazia

### The teacher

The teacher realizes that a child has some difficulties after the course of an exercise related to the carrying out of 7 table. She interacts with the student to understand the bottleneck and then she asks herself about the motivation of the obstacle. She tries a first energy to explain a second time the subject to the student but the problem persists. The teacher develops a procedural, epistemic predicament and emotional analysis. She faces with the head teacher and she thinks about some strategies suggested by the head teacher. She applies the strategies and then she verifies the application of these, she proposes for a second time the same exercise. The teacher has a feedback with the student and her family.

### The executive

«Interaction between body and managers»

Suggest strategies to the teacher:

- conversation with the child regarding the emotional experience of the moment;
- convocation and interview with parents;
- comparison with a colleague of the same discipline;
- use of educational tools;
- mathematics laboratories in the computer lab.

Caciolo Alessandra

### ...NOW EXPERT OBSERVER SPEAKS



### PROJECT DECODING THE DISCIPLINES

GROUP 14: L.C.C.D.L

PROJECT: Sampey lies and bottleneck

Fares Lella: Student  
Fierro Luca: Child  
Gabrielli Corinne: Teacher  
Mairi Daniela: Dirigent  
Mozzi Chiara: Expert

### Bottlenecks

These are the so-called "bottlenecks" that are encountered in the teaching / learning process. They can cover both the teacher and the student and meet in any discipline.

It affects the specific discipline without overlapping or confusing one with the other. It is about what students have to do and not know, doing and not knowing, because concepts come from mental operations. The steps necessary for understanding the task must be made visible.

It is a decoding process composed of seven stages:

- 1) identification of bottlenecks
- 2) definition of mental operations
- 3) modeling of steps
- 4) actions and feedback
- 5) motivation and affectivity
- 6) analysis of mastery and evaluation
- 7) sharing

### The child and the bottleneck

The Sampey child attends class III of primary school

On Monday morning he tells the teacher he hasn't done his homework.

A part of the conversation reported here:

Teacher: "I haven't done my homework."  
Teacher: "All?"  
Teacher: "Those on the adjective."  
Teacher: "Why didn't you make them?"  
Sampey: "I didn't have time and I needed a lot for those"

From the teacher's questions emerges the child's difficulty in recognizing and using the adjective.

During the conversation in class on the adjectives the child properly uses the adjective but when he must conceptually discriminate what an adjective is and writing it down or doing the homework emerges the difficulty.

### The Teacher

The teacher reassures the child and tells him that just in the morning they would reface the discourse on adjectives

Through a group discussion, she asks the children individually to describe their favorite character by following the instructions given with the example herself described on the giraffe with the help of the LIM and reminding that the adjective answers the question "How is it?"

Then he asks to write the adjectives used and put them in the cover of adjectives

The teacher adopts the strategy of constant and repeated exercise at home and in the classroom in the form of a game to check if the problem is actually only that of not being able to transfer the concept in practice for lack of mastery of the same

The teacher applies the "Decoding" strategy to tackle the problem

### The Head Teacher

**The role of Head Teacher in Italy**  
The figure of the Manager is of primary importance within a school structure. The essential task that it carries out is that of control (school and financial security) e responsibility. In this sense, everything that happens inside of the structure is more or less connected directly to the figure of the Headmaster. Each school has a degree of autonomy respect the standard school laws and it is a task of the principal outline and change, according to the needs, these laws adapting them to the school. It is also responsible for managing resources (financial, instrumental and service results. It must also organize all the school activity according to criteria of efficiency, effectiveness and safety. He also assumes the role of owner in relationships external trade unions.

**The Head Teacher in our laboratory**  
In our project, the teacher is in difficulty respect to a situation purely scholastic in which a student had difficulties of understanding about a lesson in the classroom. The teacher's task, in a deontological sense, is to respond as far as possible to the problematic emerged directly with the subject: the student. In the event that the cause of the problem is revealed external to the class or in case it should request careful analysis, the teacher can contact to the Scholastic Director. The latter must provide all the tools a provision of the school to find a solution to the problem according to the spirit of effectiveness, research and school efficiency. The Manager must therefore provide practical means (Whiteboards more extensive, LIM, Computer, laboratories, promote the organization of external visits and also external professional figures such as psychologists). In this case the teacher, however, was competent and after an interview with the headmaster he decided to adopt a different teaching technique, solving the problem with relative facility.

### The expert

The expert, after careful listening and observation of his group and their speeches aimed at the resolution of the bottleneck taken in consideration, reports everything on paper by reworking the entire work done together.

**Considerations:**

The university student (Lella) was able to fully explain the concept of bottleneck to all the participants.

The child (Luca), totally playing himself in the role assigned to him, proposes a situation in which he will present his problem to the teacher through an exhibition carried out directly in the first person.

The teacher (Corinne), to solve the difficulty encountered by her student Sampey proposes ideas that will eventually have effectiveness, such as the use of the LIM, the cards and colored tables to better memorize the concept.

The dirigent (Daniela), also playing in his role, after listening to the teacher's thesis, agrees with her on the methods used.