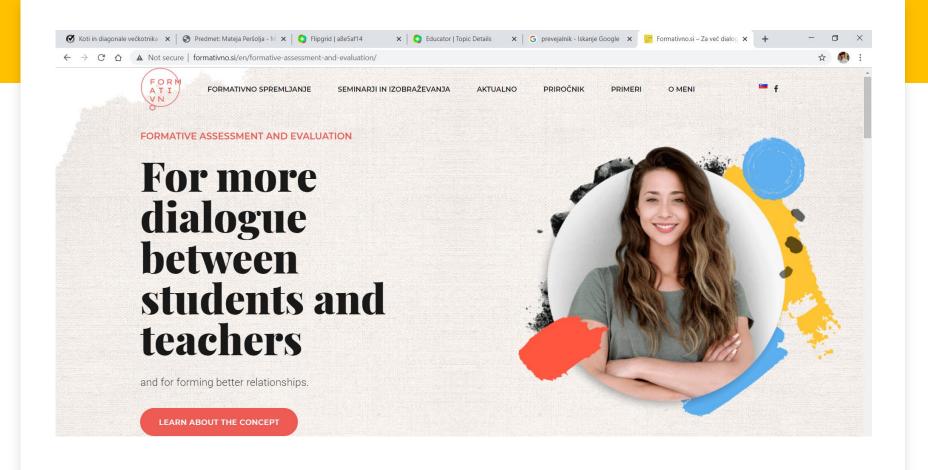
## Formative Assessmen t and Evaluation

MATEJA PERŠOLJA mateja.persolja@guest.arnes.si

**Professor of Mathematics** 

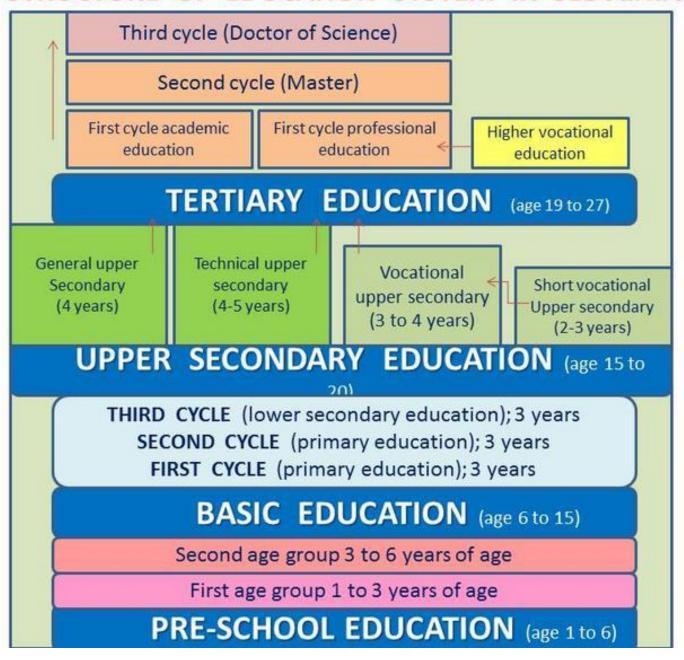
Formative Assessment Coach





http://formativno.si/en/formativeassessment-and-evaluation/

#### STRUCTURE OF EDUCATION SYSTEM IN SLOVENIA



## Learning intentions

## I'm learning about

- using Choice
   Theory for better relationships,
- formative assessment model.

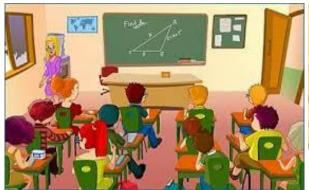




First experience as teacher



## My experience as pupil





## MY SOLUTIONS BASED ON MY EXPERIENCE, AS A PUPIL

- grades
- signs (pluses and minuses i.e., minor marks)
- informing parents
- threats

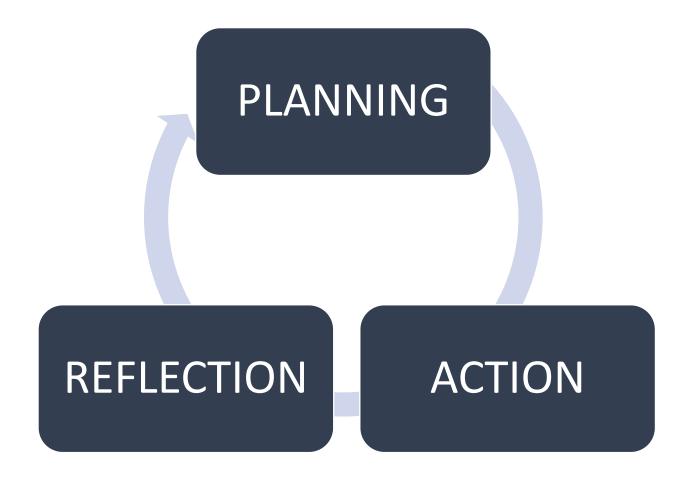
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#### INOVATIVE PROJECTS

Selfregulation (Action Research) (2004)



#### **MY SEARCH**

- new teaching methods
- different approach
- Glasser's Choice Theory

I try to change my pupils but at the end I change myself. I became a researcher of my own practice.

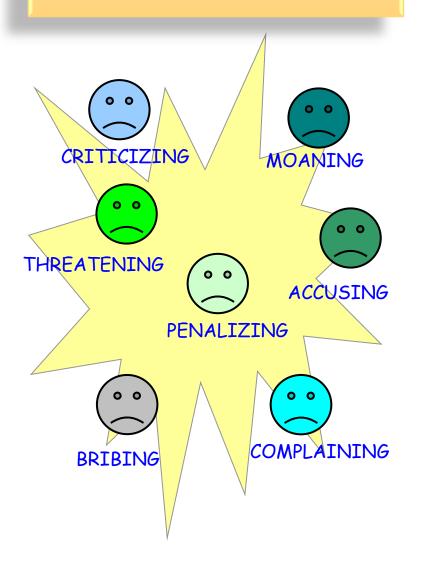
#### 10 MINDFREMES

I am an evaluator.

I am a change agent.

I develop positive relationships.

7 bad habits, that hinder good relationships



## EXTERNAL CONTROL PSYCHOLOGY

External motivation stimulus → response

I can make you do what I want, whether you want to or not.

It's my duty to make you do something you do not want.

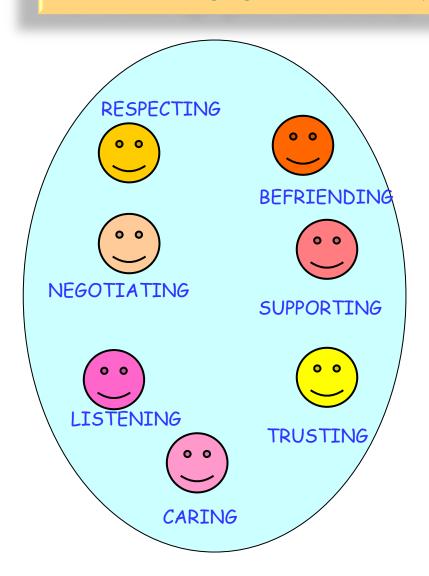
#### CHOICE THEORY

Intrinsic motivation (enjoyment)

information  $\rightarrow$  choice

We are the only person whose behaviour we can control.

7 good habits, that encourage good relationship



#### MY BELIEFS

I can't control student's behavior choices.

I can send them *useful information* and create an *environment* where they are able to learn, have new experiences and satisfy their needs (power, freedom, love, fun).

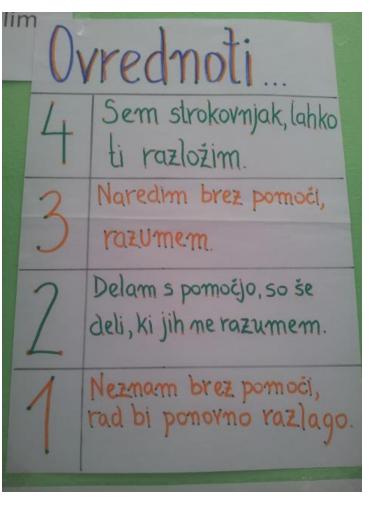
Consequently, I focus on cultivating support, trust, acceptance, and motivation with my students.

BOSS	LEADER	
coercive	supportive	
externally motivated	internally motivated	
boss	involves others	
http://wglasser.com/our-approach/lead-management/		
my way is the only way	input of group	
narrow, few options	broad, many options	
set rules	involves group	
evaluates others- reprisals	uses criteria, improves system	
system of punishment	develops system of self/co- verification	
criteria set by boss	criteria by leaders/workers	
sets deadlines	involvement based on strengths	
build wals	communicate	
do his work	do more than his work	
looking for the culprits	finding solutions	
judge people	accept people	
requires	ask	
intimidate	inspires	
comands	Is an example	
Approach win - lose	Approach win - win	
Say: I	Say: We	

## CLASROOM CHANGES

- Better relationships
- Pupils are more (pro)active





#### Self-evaluation

4 I'm an expert. I can teach

3

you.

I can do without help. I understand.



2

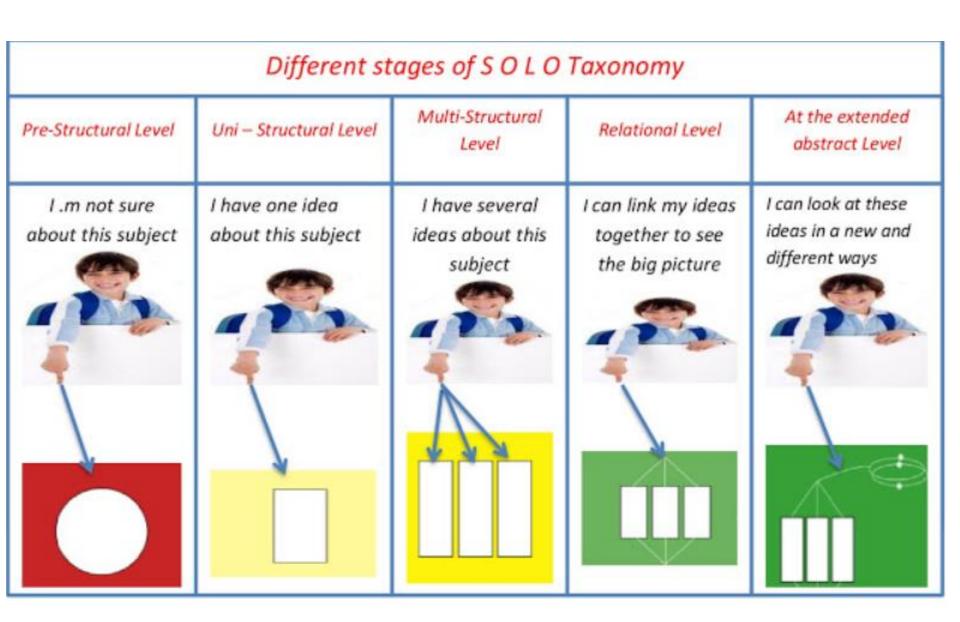
There are some parts, I don't undestand.



1

I need help.

Svoje formativno spremljanje



### Assessment in Slovenia

- Written exams
- Oral exams

At the end of the unit

Feedback is rated from 1 - 5 (1 not achiving the goals and standards).

Behavioral types of assessment.

## FORMATIVE SUMMATIVE



WHEN THE CHEF TASTES THE SOUP



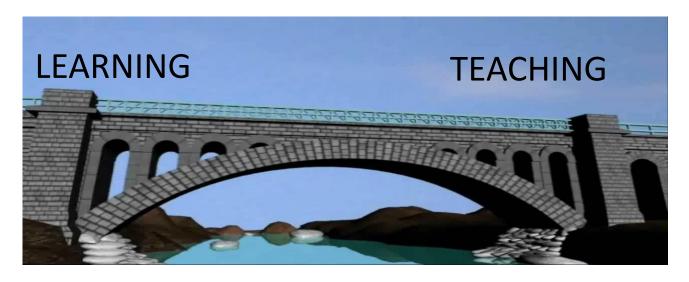
WHEN THE GUESTS
TASTE THE SOUP



FROM STEVE WHEELER'S BLOG "THE AFL TRUTH ABOUT ASSESSMENT"



## ASSESSMENT



- Pupils aren't learning what we are teaching.
- Process of learning is complex.





## and EVALUATION

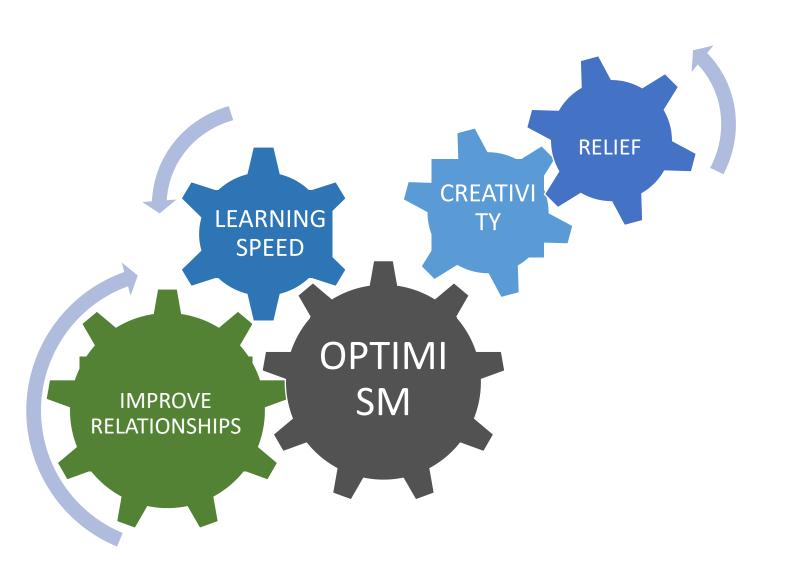
Assessment is formative, when the feedback is given as an advice for future action (feedback for feed forward) and not evaluation of mistakes made in the past (in % or marks).

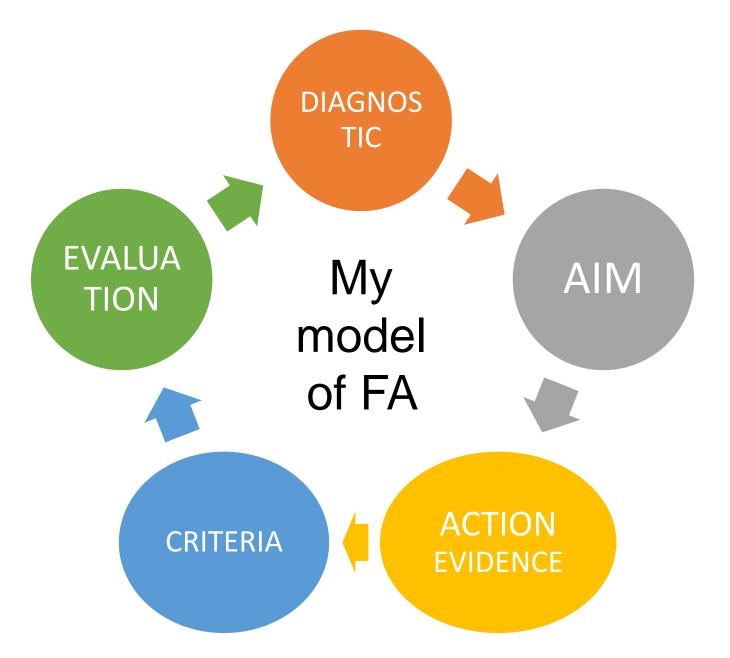
D. Wiliam, Dr. Komljanc

FORMATIVE ASSESSMENT IS A PROCESS THAT IMPROVES LEARNING



## Formative assessment helped me...





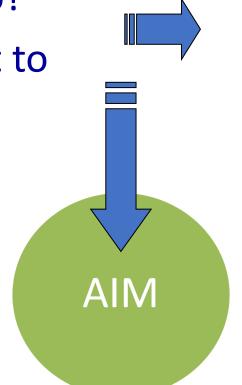


### PRIOR KNOWLEDGE

What do I know, what can I do?

-kako ga
narišemo
-kako ga izmerimo
-s čim merimo
kote

-kakozapišemo Velikost kota



Prior knowledge

First feedback

Better lesson planning

Persolja

Activating students as learning resources for one another.

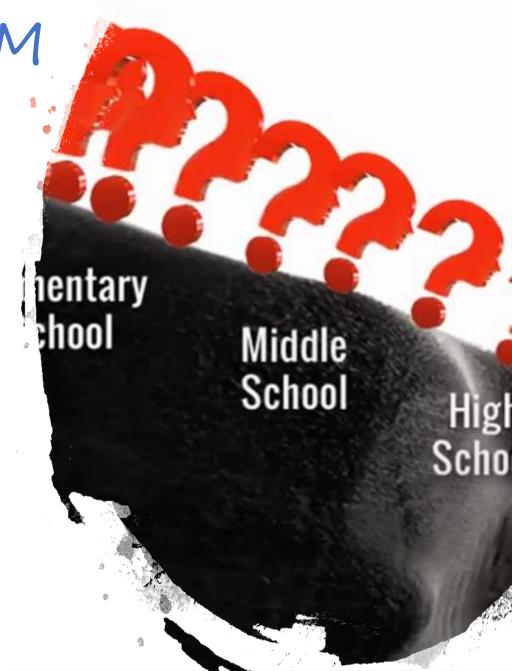
D. Wiliam



ROMANTICISM

What question do you have?

2 – 5 year old 40 000 question 14 – year old 3000 question/day



### See – Think - Wonder

See What do I see? What is my evidence?	Think What do I think about what I see? What are my examples?	Wonder What do I wonder about what I see? What are my questions?

Developing assessment capable Visible learninrs

## EXECUTION PLANNING

How to get to the desired knowledge/objective?

How to learn the easiest/quickest?

How do I want to learn?

Pupil interests and wishes come to the foreground More dynamic and creative

lessons



# Activating students as owners of their own learning.

D. Wiliam



#### **ACTION**

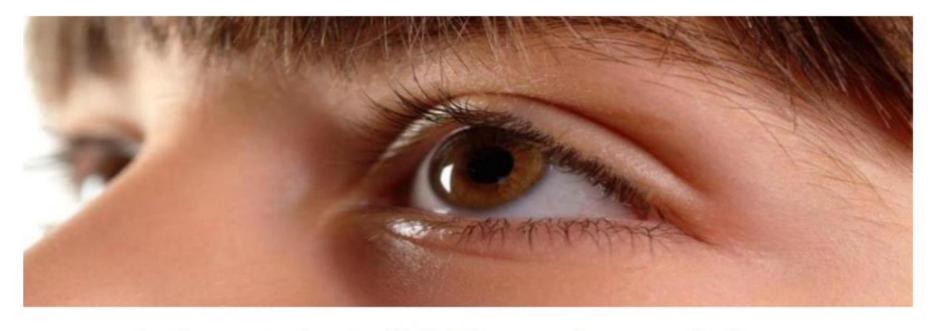


How do I teach, to get as much information as possible from pupils about their knowledge and understanding?

Don't think about content, but about process and action. Not what, but how to teach.

## Visible Teaching – Visible Learning

When teachers SEE learning through the eyes of the student



and when students **SEE** themselves as their own teachers

#### **EXAMPLE**

## LEARNING INTENTION: KNOW/RECOGNIZE THE STORY, KNOW/USE MAIN INGREDIENTS OF THE STORY

#### "HOW WE CAN FIND OUT WHAT IS A STORY? ANY IDEAS?"

- MY GRANDMOTHER CAN TEL US A STORY
- LETS ASK STORY WRITER?

• ....

#### "HOW WILL WE ORGANIZE? WHERE WILL WE START?"

WE CAN ASK IF SOMEONE KNOWS ANY STORY
 WRITER AND WRITE HIM A LETTER

They ask in each class in the school find 2 writers, interview them, one writer write them a letter about how to write a story. Read a few stories.

Write sories in groups for first experience, for learning proces and as an example of making success criteria.

PUPIL MAKE THEIR OWN STORY



### COLLECTION OF EVIDENCE

How can you show me your knowledge?

What kind of evidence do you have?

How do you asess the progress of learning?

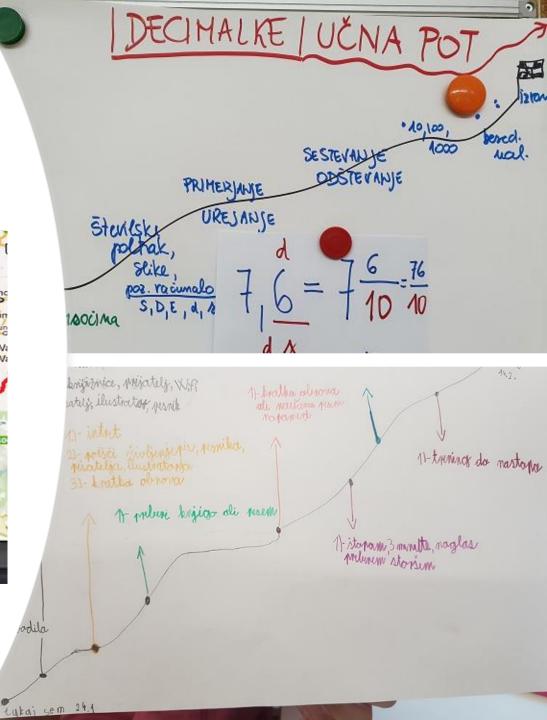
#### **PORTFOLIO**

Buterfly

- Work sheets
- Products
- Project work
- Test

#### **LEARNING JOURNEY**





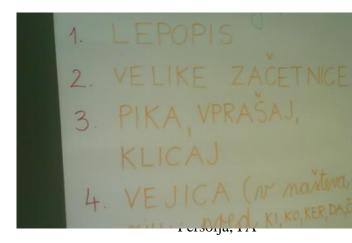


## CRITERIA DEFINITION

1. STEP: Collect examples of work (project work, writings, presentations...).



- **2. STEP:** Analyse them by searching good parts or what we can learn from them.
- 3. STEP: Writing the criteria with pupils (with their own words).





## Success criteria

Enable pupils to have control of their own learning and become owners of the process of learning.

They don't ask anymore:

"Wich grade/mark did I recieve?"

# EVALU ATION

What can I do?

What do I know?

What do I want to learn?

Until when?

Am I going to meet my learning goals?

If not, am I ready to change anything?

What do I need to change?



Effort to improve knowledge

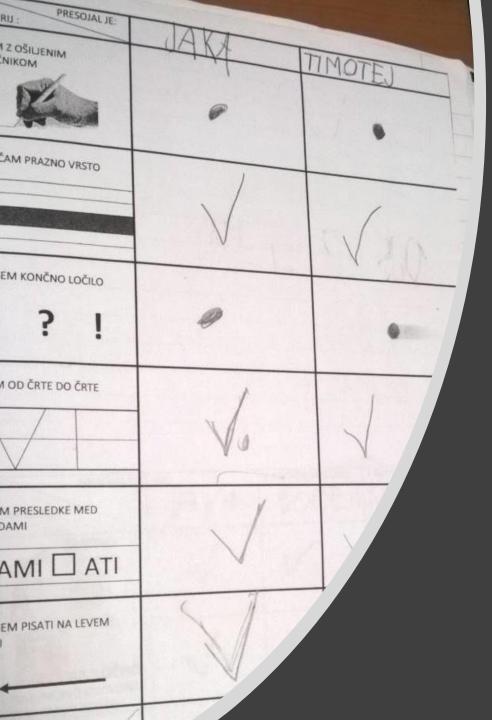
No/less failure

Choice

**Progress** 

Learning success





# Check list



## **The final grade** consist of:

- the **student reflection** of the proces
- aims achieved at the end of learnig process,
- student selfevaluation using succ. criteria,
- student-teacher discussions and observation about student work,
- teacher evaluation.

### Homework

- it's a pupils plan, based on his/her learning goals and school work,
- it needs feedback.

#### 30.3. 2020 CILJ: Izračunam diagonalo kocke (20 min)

V zvezek si napiši naslov **Diagonala kocke** in si ob ogledu posnetka na desni (PI v kocki) izpiši formule za diagonalo kocke in rešen primer.

Po izbiri reši še eno nalogo tukaj <a href="https://eucbeniki.sio.si/mat8/851/index7.html">https://eucbeniki.sio.si/mat8/851/index7.html</a> 6. (M), 7. (T)

Kdor bi želel **znanje** na **T** in **Z** ravni, si izpiše tudi **diagonalni presek kocke**. 4. in 5. naloga v posnetku in si ogleda spodnji posnetek

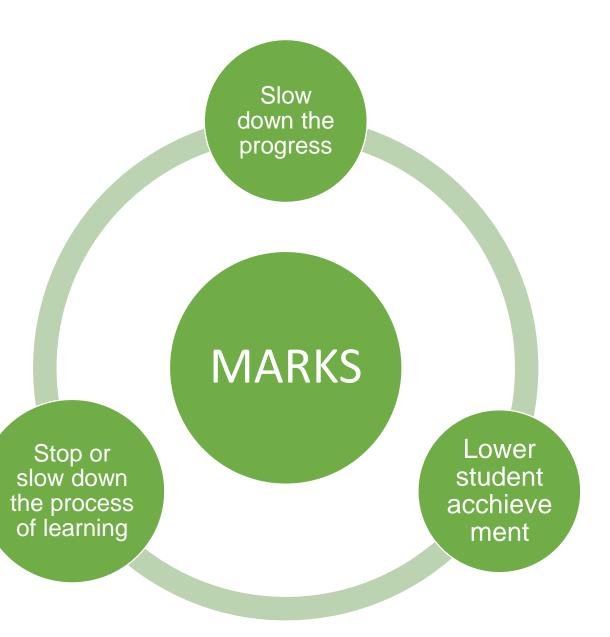




Oglaj aj apadpij paspatak je raži ža apa palaga tukci

NEVER GRADE THE **PUPILS** WHEN THEY ARE STILL LEARNING!

Alfie Kohn, 1996



## Which is the most effective feedback?

A Grades

Butler, 1987

**B** Comments

C Grades + comments

# FEEDBACK

- Show, underlaine, praise what is good (against succ. criteria).
- Show where to improve. Give suggestions.
- Take time for improvement during the lessons!!!.

Advice or recipe for future action (rather than review of past failures)

Should be given in such way that pupils can't compare.

# EXCELENCE EXPERIENCE

#### **Consultation hours for pupils:**

- pupils come prepared, with a question or goal
- after or before school
- clasmates or teacher are available for help

#### **Eleder teach younger:**

- during the math lesson (at least 2 a year)
- responsable, motivaded, very well prepared
- intensive and focused learning



# BENEFITS

- Pupils become owners of their learning process and more responsable
- Good relationships (partners in the process)
- Better knowledge (increase difficulty)
- Faster learning process
- Less failure
- Creativity
- Learning speed

# IMPLEMENTATION MODEL

We need to create time and space for teachers to reflect on their practice in a structured way, and to learn from mistakes.

Presentation of FA model

Active research in teachers practice

Learning comunitys

Teachers spend years to make pupils obedient but in the end we expect them to be independent.

P. Sims

Nothing takes so much courage as finding that after serious study, the test is asking you for only the information you missed.

In real life, you always know on what topic a test will be. Winners in real life are those who are trying and not those who are dependent on speculation.

W. Glasser

**EVERY STUDENT CAN SUCCEED** 

# "EVERY STUDENT DESERVES A GREAT TEACHER, OT BY CHANCE, BUT BY DESIGN"

(Fisher, Frey, & Hattie, 2016)