Learning to learn
Guide of activities in schools

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Learning to learn is one of the key competences in today's society, which is a knowledge based society. Presently, the knowledge domain is immense, technological evolution happens very fast and societal needs are continuously changing. In order to be adapted to this kind of society people must know how to learn. The traditional model of education, based on the transmission of knowledge from the old generation to the new one is no longer adaptable, since knowledge is constantly changing, thus information is not valid for a long time. Consequently, people must endow themselves with life long learning abilities, which allows them to adapt to society's changes.

In 2006, the European Council and Parliament (Education Council, 2006) adopted a set of recommendations regarding key competences for lifelong learning. The recommendation contains a list of eight key competences, defined as:

“Competences are defined here as a combination of knowledge, skills and attitudes appropriate to the context. Key competences are those which all individuals need for personal fulfillment and development, active citizenship, social inclusion and employment.

The Reference Framework sets out eight key competences:
1) Communication in the mother tongue;  
2) Communication in foreign languages;  
3) Mathematical competence and basic competences in science and technology;  
4) Digital competence;  
5) Learning to learn;  
6) Social and civic competences;  
7) Sense of initiative and entrepreneurship; and  
8) Cultural awareness and expression.”

The document also contains definitions for the eight key competences. The definition given for learning to learn is:

“Learning to learn is the ability to pursue and persist in learning, to organize one's own learning, including through effective management of time and information, both individually and in groups. This competence includes awareness of one's learning process and needs, identifying available opportunities, and the ability to overcome obstacles in order to learn successfully. This competence means gaining, processing and assimilating new knowledge and skill as well as seeking and making use of guidance. Learning to learn engages learners to build on prior learning and life experiences in order to use and apply knowledge and skills in a variety of contexts: at home, at work, in education and training. Motivation and confidence are crucial to an individual's competence”

After the issue of these recommendations an expert group was set up to design a framework for the assessment of learning to learn (Expert Group set by the European Network of Policy Makers for the Evaluation of Education Systems, 2006). The framework is based on the assumption that “learning to learn” contains two dimensions: cognitive and affective.

In 2008 CRELL published a revised framework of measuring learning to learn, which is presently in use (The new learning to learn framework, CRELL, 2008), in which a new dimension is added, the metacognition.
The framework and the instrument that was developed for testing learning to learn was based on four existing national instruments on learning to learn: the test elaborated by the University of Helsinki (Hautamäki et al., 2002), the Effective Lifelong Learning Inventory (ELLI) developed by the University of Bristol (Deakin-Crick, Broadfoot & Claxton, 2004), the test on cross-curricular skills developed by the University of Amsterdam (Elshout-Mohr, Meijer, Oostdam & van Gelderen, 2004) and the test on metacognition developed by the University of Madrid (Moreno, 2002).

The present guide is designed with respect to relevant scientific literature in the field and to the new European measurement framework. The main structure follows the European framework: the affective dimension (motivation), the cognitive dimension (understanding, organizing, study skills) and the metacognitive dimension.

The main structure of the guide is the following:

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THE NEW LEARNING TO LEARN FRAMEWORK

**The affective dimension:**
- Learning motivation, learning strategies and orientation towards change
- Academic self-concept and self-esteem
- Learning environment

**The cognitive dimension:**
- Identifying a proposition
- Using rules
- Testing rules and propositions
- Using mental tools

**Meta-cognition:**
- The problem solving
- (metacognitive) monitoring tasks
- Metacognitive accuracy
- Metacognitive confidence
Each activity has a description for the use of the facilitator. Also, activities have handouts, that will be handed to participants as described in the activities. Some activities have a part called “Some theoretical anchors”, which provides a little inside into the theory behind the activity.

Teachers are invited to adapt the guide to the characteristics of the educational system and of each individual school. It is important to maintain the objectives of the activities, but the procedure may be changed according to teacher's experience with the students. Also, each school may create its own activities that promote the competence of learning to learn.
WHY LEARN?
WHY LEARN HOW TO LEARN?

1. Objectives:

- To raise awareness on the importance of learning;
- To identify students' motivation for learning;
- To emphasize the connection between learning in school and future adult life;
- To stress the importance of learning how to learn;
- To identify strategies for learning used by students.

2. Materials:

- Flip-chart or blackboard
- Markers or chalk
- Handouts “Education matters” and “Learning to learn” - for each participant

3. Procedure

- Begin by telling participants that today you are going to speak in an open manner about learning. Everyone's point of view is welcomed and valued, and they are free to express satisfaction and dissatisfaction with learning and education in general.
- Divide the board into three columns
- Ask participants to think why school exists in society. What is its use? Have them share their ideas and write them in the first column.
- Optional - Ask participants to imagine how a society without school/education would look like. Would it be much different? Better? Worse?
- Ask participants to think of their personal reasons for attending schools and for learning and write the ideas in the second column.
  - *It's very likely that you will find a mixture of reasons – ones coming from the others (e.g. to please my parents) and others coming from themselves (e.g. because I want to have a good life, because I like to learn). Emphasize that the reasons more likely to give you*
strength and resilience in learning are those coming from yourself.

- Give participants the handout “Education matters”. You are free to decide whether to give the handout with empty circles (Education matters 1) or the handout with text in the circles (Education matters 2).
  - **If you choose to give the handout with empty circles, ask the participants to fill in with reasons for learning, then discuss the opinions.**
  - **If you choose to give the handout with text in the circles, say these are only some good reasons to study, not all. If participants want to, allow a discussion about the handout.**
- Ask participants if they are aware of the concept “learning to learn”. Invite them to describe what this means.
  - Emphasize that learning to learn refers to two main categories: wanting to learn (being motivated) and knowing how to learn (learning strategies). Emphasize that learning can be learnt, so if you are not good in school now, you can improve by putting in more effort and using appropriate strategies.
- Invite participants to reflect on their learning strategies. In what way do they learn? Do they have favorite methods? Is their study different in respect to study matters (e.g. in English versus Maths)? Do they use learning strategies consciously or just “go with the flow”?
  - By doing this part of the activity you can get an idea of what activities to choose for the next sessions, depending on what the participants already know and what they need to know.
- Give the participants the handout “Learning to learn”. Allow time for a discussion about it. Say you will cover the content in the next sessions.
SOME THEORETICAL ANCHORS

What is motivation? What is motivation to learn?

Motivation is what drives us to do certain things. We do things for a motive. For example, I am hungry, so the need for food motivates me to eat. Or I am tired and the need for rest motivates me to go to sleep. Or I am moving to a new town and need a place to stay, so this motivates me to find a home. Also, in this new place I need to meet people, to make new friends, so I have a motivation to engage in social activities. Having all these, I feel the need to achieve something, to respect myself and to be respected for what I am doing, so I become motivated to try to succeed in my career and family life. And many people say that life wouldn't be complete if we wouldn't pursue our own dreams, by developing our talents, creativity, moral development, by trying to become better human beings - this motivates people to find various ways for developing their personality. Abraham Maslow was a scientist who studied motivation, and he developed a pyramid of human needs, that has five levels:

The needs are placed in a pyramid because Maslow considered that only when the needs from the lower level are met, those from the higher level come into focus. For example, if we don't have enough food and we don't feel secure, we will try to satisfy those needs, the other from the higher levels being less active at this time.

What is motivation to learn?

Motivation to learn is basically what drives us to learn.
Where would you place the motivation to learn on Maslow's pyramid of needs?

Motivation to learn can come from ourselves and then we call it intrinsic motivation, or it can come from the outside and then we call it extrinsic motivation. Intrinsic motivation represents our own goals, values, interests, beliefs, while extrinsic motivation includes the goals, values and interests of others, who influence us.

Studies have found that people when we are intrinsically motivated we put in more effort, are more persistent, try different ways to succeed and learn more deeply than when we are extrinsically motivated. But just because intrinsic motivation is proven to be more efficient, doesn't mean that extrinsic motivation is bad. Sometimes we learn things being extrinsically motivated and we do it just fine. Any kind of motivation is better than no motivation.

The motivation to learn depends on many factors: the value attached to learning in our social environment, the characteristics of the educational system, personal factors like self esteem, self efficacy, personal theories on intelligence, etc.

What is most important is that we can control our motivation, we can increase it and make it work for us.
1. Objectives:

- To emphasize the importance of self dialogue (self talk) in every day activities;
- To distinguish between helpful and unhelpful self dialogue;
- To help participants identify their self talk concerning learning;
- To promote positive self talk.

2. Materials:

- Handout “Mark and Edward are learning to drive” – for each participant

3. Procedure:

- Begin by telling that during this activity the group will analyze the stories of two friends. They are eighteen and are at their first driving lessons. They are very similar in their abilities, but the way they talk to themselves is very different. Will this difference influence their performance?
  - You can change the name of the characters, especially if someone in your group has one of these names. Or you can have the characters to be girls, not boys, depending on your group.
- Give each participant the handouts “Mark and Edward are learning to drive”. Read it together. Have two volunteers to read it, each playing one of the two friends.
- Discuss with the group the questions from the handout. Allow for participation of everyone. No answer is good or bad, there are just different opinions.
- Ask participants to think about their self talk about learning. If they want, they are welcomed to share it with the group, if not, they can keep it to themselves.
- Emphasize that the good news is that we have control over our self dialogues, we can modify them so that they become helpful to our purposes.
  - e.g. If we tell ourselves “I'm not good in school and I don't like it” and we make this self talk a habit, we discourage ourselves and decrease our motivation to learn. We will find school more boring than it actually is, and more important, we will lose the big picture, this meaning our pursue of personal dreams for the future. Instead, a self dialogue that sounds something like this: “I know I can obtain more if I work harder” or “If I do well in school I can choose whatever job I want”, can increase our motivation and to assure our energy for the study.
- Read the other two situations. Ask participants which one of them represents positive self talk. Does anyone identifies with the characters?
- End the activity by asking participants to reflect on their self talks in different situations and to make their self dialogues to work for them.
SOME THEORETICAL ANCHORS

We are all influenced by what we are told by other people, and even more influenced by what we tell ourselves. Consciously or unconsciously, every day we engage in self dialogue, telling ourselves things that help us, or have the opposite effect, of keeping us down.

Studies have found that students with positive self dialogues do better in school than those who have negative ones. More importantly, self dialogue, both positive and negative, are learnable and tend to become a habit. Children who usually have a positive self talk tend to make a habit out of it and to have more positive self dialogues as adults, compared to those who used negative self dialogues when they were children. This is especially important, since people with positive self dialogues also do better in their professional lives than those with negative self talks.
10 YEARS FROM NOW ON

1. Objectives:
   - To establish a connection between school and future adult life;
   - To practice general goals setting.

2. Materials:
   - Handout “10 years from now on” - for each participant.
   - OPTIONAL - Handout “Imagine your future” - for the facilitator of the activity.

3. Procedure:
   - Tell participants that today you are going to make an imaginary journey into the future. Ask them to imagine they are now 10 years older, meeting again in this same group and telling each other about their lives.
     - If you consider 10 years to be a too large gap, change the situation into 5 years from now on.
   - Invite them to think in silence for a few minutes about this situation.
   - Give each participant the handout “10 years from now on”. Allow them time to fill in the blanks. Encourage them to be optimistic and to write about their own dreams, interests and desires.
   - OPTIONAL If you think the group would appreciate this part, read aloud the handout “Imagine your future”. Make sure participants are relaxed and quiet. After reading it, ask participants to write on their “10 years from now on” handout ideas they had while you were reading “Imagine your future”.
   - Invite participants to share their ideas.
   - Ask participants why is school important in ensuring a good future.
   - Ask participants what do they think they can do now to make their dreams come true?
WINNING AND LOSING - WHO GETS CREDIT AND WHO IS BLAMED?

1. Objectives:

- To acknowledge the importance of the way people think about winning and losing situations;
- To distinguish between different styles of thinking about personal success and failure;
- To identify own style of thinking about success and failure.

2. Materials:

- Handouts “Guys on Rachel” and “Girls about boys” – for the four volunteers who will act in the short plays
- Papers and pens for all the participants

3. Procedure:

- Begin by telling participants that today they are going to “act” in four short plays. There will be four characters and four volunteers will be needed. They will receive the short scripts and will act on them.
- Say that today's activity deals with the way we perceive success and failure
  - for example, you may say something like this: We all experience both success and failure at different times in our lives. But not all of us perceive this things in the same way. Most people are proud of themselves when they achieve something, by believing that the success was due to their abilities, knowledge and personal effort. “I worked hard for this test, and I deserve the good grade that I got!” Some people though, can't seem to get satisfaction in their success, because they believe that the result was due to factors beyond their control, for example fate or luck. “I was lucky to receive exactly the questions that I was prepared for, that's why I got the good grade. This doesn't mean that I'm worthy of it”. The same goes for explanation of failure. We can believe that we received a bad grade because we are bad in school, or stupid or we can believe that we received a bad grade because we didn't work enough, we didn't put in enough effort.
• Ask for four volunteers and give them the scripts. There must be two girls and two boys. Boys will get the script of boys short plays - “Guys on Rachel”, and girls the script of the girls short plays - “Girls about boys”. Allow them to read the script for five minutes.

• During this time, give instructions to the other participants:
  o Ask them to pay attention to the plays
  o Tell them that in fact each pair will act two situations – winning and losing.
  o Ask them to write on their papers very short comments on the characters' style of thinking: In what way do they differ? Whose style of thinking leads more often to success and whose leads more often to failure? What does each character think about winning and losing?

• After the two plays, facilitate a discussion about:
  o How does one's thinking about success/ failure influence her/ his performance?
  o How can they relate these two stories to their personal life?
  o How can they relate these stories to learning in school? What about preparation for tests?
  o What is their own style of thinking?
  o Is their thinking style helpful for them regarding school success or it stands in their way? What can they do to improve it?
SOME THEORETICAL ANCHORS

Subjective explanation of success and failure represents an important part of motivation. Some people attribute it to external factors, others to internal ones. Usually, in the western cultures, people tend to attribute success to internal factors and failure to external factors. Even if it is true that the same person can have both explanatory styles in different situations, what is important is the general style, because attribution of success and failure is learnable and can become a habit.

Psychologists call this “attributional style” and categorize it into external and internal. Both external and internal attributions can be stable or unstable. Stable factors can't be changed, while unstable are changeable and can be controlled.

Look at the table below and notice the difference between different attributional styles:

<table>
<thead>
<tr>
<th>ATTRIBUTIONAL STYLE</th>
<th>internal</th>
<th>external</th>
</tr>
</thead>
<tbody>
<tr>
<td>unstable factors</td>
<td>effort</td>
<td>fate</td>
</tr>
<tr>
<td>stable factors</td>
<td>personal abilities/ competences</td>
<td>task difficulty</td>
</tr>
</tbody>
</table>

● Personal theories on intelligence and effort

In strong connection with attributional styles are personal theories on intelligence. These are personal, but we develop them being influenced by the current thinking from our social environment. Many cultures tend to think of intelligence as being a stable and general aptitude that was born and can not be changed during our lifetime. Such a theory implies that what we achieve is due to the intelligence we were born with and our efforts can't change much of what we achieve.

Studies have found that theories like this one are not productive and tend to decrease the motivation to learn.

More than this, they are not scientifically correct, because in reality intelligence is a broad concept, and its components are changeable and can be learned. In fact, intellectual abilities can be compared to physical ones, and brain can be compared to muscles. If we have a sedentary lifestyle our muscles don't develop, but if we do recreational sports we can improve our physical fitness. If we become professional sportsmen then our muscles really become strong and our fitness is optimal. The same goes for the intellectual fitness and brain development. If we don't use it, it tends to rust, but if we use it and put it to work it becomes more and more powerful every day and we can say that our intelligence increases. And as muscles develop by movement, intelligence develops by gaining knowledge and processing it – the more knowledge we have, the more connections we can make, and the more intelligent we are.

There are also different popular theories on effort. Some tend to think that effort is used to
compensate for lack of abilities. “He's not very talented, but he works very hard” or “He's very
talented, he doesn't need to put in so much effort”. This usually goes together with the theory that
considers intelligence as being stable and unchangeable. But if we look at the lives of great people
that achieved wonderful things during their lifetime, we can see that they worked hard and put in
continuous effort, and even enjoyed it.
A more productive and in fact scientifically correct theory is one that considers effort as a mean to
improve intellectual abilities. If we work hard we can improve our knowledge, our abilities and
finally our results. It's up to us to succeed in what we want, and for achieving this we must put in a
large amount of effort and use wisely our resources.
FOCUS ON YOUR SUCCESS

*Note: This activity can be combined with activity no. 6

1. Objectives:

- To focus on participants' personal experience with success in school;
- To favor transfer of abilities used in those experiences to other experiences.

2. Materials:

- Paper and pens
- Handout “Focus on your success” - for each participant

3. Procedure:

- Begin by telling participants that even if they currently experience school difficulties, it doesn't mean that it has always been like that. Most probably, there was a time when they achieved success, but they are now so much into your current situation, that they’ve forgotten how it was. It happens to all of us to have good times and bad times, and we can shorten our bad times by doing several things, this including that we focus back on our success. Tell participants that this activity is an invitation to reflect on their past, especially on their positive experiences.
- Distribute handouts “Focus on your success” to all participants.
- Invite participants to think about the questions in the handout. If they want to, they may write their answers on their blank papers.
- Ask participants to share some of their thoughts about this topic. Encourage a discussion about it.
**MY STRONG POINTS**

*Note: This activity can be combined with activity no. 5*

1. **Objectives:**
   - To acknowledge the importance of knowing personal strong points;
   - To identify personal strong points regarding learning.

2. **Materials:**
   - Paper and pens
   - Handout “My strong points” - for each participant

3. **Procedure:**
   - Begin by telling participants that all of us have strong and weak points. The difference between those who usually have success and those who don't stands in the way they focus: some focus on their strong points and try to improve their weak ones, while others focus on their weak points, feel incapable and unworthy and thus they tend to become stuck in failure. The good thing is that is up to us to direct our focus, we are the ones who have the control!
   - Ask participants to draw on a blank paper their “lifeline”. This means a line that starts at a very young age, at which they have their first memories and ends at the present moment. The line will be curve, with ups and downs. Ups represents good moments, when they felt good, achieved something important, won something, lived a valuable experience, while downs represents moments when they encountered difficult times. The middle represent times when they consider nothing special happened. Encourage participants to focus on their good moments, especially in school, to try to remember most of them.
   - Tell participants that everyone's lifeline is private, they will share it only if they want to, no-one will ask them to.
   - Allow approximately ten minutes for the completion of the task.
   - Now tell participants to think what personal qualities helped them in the “ups” of their lifeline. They should think especially at the “ups” that have something to do with learning.
     - e.g. perseverance, effort, attention, social skills, positive attitude, good time planning, strong motivation, etc. You should not impose these examples, only offer some suggestions if the group seems to be confused.
   - Distribute “My strong points” handout.
   - Ask participants to write their strong points in their handout.
   - Finish with a discussion about the activity – e.g. Was it difficult to identify your strong point? Why? Do you use to think in this way about yourself?

*You can do this activity in another manner, by asking students to write down strong points of their colleagues and then share them.*
Objectives:

- To emphasize the importance of planning;
- To explore motives for which people fail to plan effectively;
- To identify effective ways to plan;
- To emphasize the importance of having a study routine.

Materials:

- Handout “Davie has to take a test” - for each participant
- Handout “Davie gets organized” - for each participant
- Paper and pens

Procedure:

- Tell participants that today you are going to discuss about a “crisis” situation, and they will be required to analyze it, find the causes of the situation and suggest solutions. The main topic is related to how to plan your activities to avoid crisis due to lack of time
- Distribute handouts “Davie has to take a test” to all participants
- Read the situation described in the handout aloud, or ask a volunteer to read it
- Discuss about Davie's situation following these questions:
  - Why was Davie so scared now?
  - Why did she end up in this situation?
  - What did she do wrong?
  - What would have been a better approach for her?
  - Do you think a better planning would have helped her?
- Tell the participants that now you will discuss on a handout that offers some suggestions for effective planning. It is not the only way, only suggestions. The handout is about Davie, in an alternative situation, who is having a talk with herself. She is asking herself questions and then answers them. Tell participants that people often plan in this manner, even if we are not always aware of our internal dialogue.
- Distribute handouts “Davie gets organized” to each participant. Emphasize that it is important to have a long term, general goal and then precise, small term objectives to work on.
- Encourage participants to work on their personal goals by the means of planning. They may write a plan on their papers.
Planning, besides being a cognitive and metacognitive strategy, is also very effective tool in maintaining motivation. And this is because many times we want to do a lot of great things, but we just don't know how to plan this and we end up in procrastination – the habit of postponing over and over again. Most of the times it happens because we set unrealistic and vague goals for ourselves and when we realize that we can't reach them we become discouraged, unmotivated and postpone action. We do this more than one time and then it tends to become a habit, and we learn that this is “our way”. We may even think that this is because of our personality, that is an innate trait, and that there is nothing to do about it. Incorrect! It is just another learnt way of action, because we didn't learn how to plan realistically.

What we need to do is to have specific and very precise objectives attached to our general and long term goal.
TIME MANAGEMENT

*Note: This activity can be combined with activity no. 7

1. Objectives:

- To raise awareness on the importance of time management;
- To provide input on how time can be organized.

2. Materials:

- Flip-chart or blackboard; markers or chalk
- Paper and pens
- Handout “Time management” - for each participant

3. Procedure:

- Draw on the board a circle, that represents a clock. Note the hours of the day at their right position.
- Ask participants to draw the same thing on their papers.
- Ask participants to think about how they used their time in the previous day. Ask them to think what they did at each hour and to note these on the clock they drew before.
- Ask them if they had a plan in using their time. Do they think time was well spent?
- Facilitate a discussion about time well spent and time lost. What do these concepts mean in their opinion? How is time management related to success? What does punctuality means for them? What about deadlines?
- Ask participants how they can relate time management to learning in school.
- Ask them to write on their papers ideas for efficient time management. Allow a few minutes for this task.
- Encourage share of ideas.
- Distribute handout “Time management” to every participant.
- Allow a few minutes for reading the handout.
- Facilitate a discussion about the handout, guided by these questions, but other ideas are also welcomed:
  - Are you already using some of the suggestions offered in the handout?
  - Do you think you have an effective time management?
  - What can you do to improve it?
- Conclude by encouraging participants to make a conscious effort to improve their time management.
CONTROL YOUR ENVIRONMENT

1. Objectives:

- To emphasize the influence of physical environment on success in learning;
- To identify modalities of controlling the environment at home;
- To give suggestions on how to control classroom attention (the classroom represents a study environment).

2. Materials:

- Paper and pens
- Handouts “Be in control” and “Can you listen?” - for each participant

3. Procedure:

- This activity requires working in groups.
- Divide the group in small groups of maximum four members. Each member has a specific role: one is the writer (writes down the ideas of the group members), one is the speaker (will present to the rest the ideas the group came up with), one is the manager (makes sure that everyone in the group participates with ideas) and one is the coach (encourages group members to find more ideas and makes sure that the group is working).
- Tell participants that today's activity deals with how the environment affects the success in learning. Explain that sometimes it happens that you have a good study routine, you are efficient in managing your time, but still something goes wrong and you don't have success in learning. The reason may lay in your environment, that somehow deters you from learning – e.g. the way your organize your room, your desk, etc.
- Give instructions to the group – they have to find as many ideas as possible of how can one organize her/ his room so that it becomes learner friendly. They can think of their own life, or of somebody else, or they may just let their imagination flow. Also, they have to think about ways to control their attention in classroom. How can they make sure that their time spent in classroom in time well spent? Suggest that they focus on how to listen at classes.
- Allow 15 minutes for group work.
- Distribute handouts “Be in control” and “Can you listen?” to every participant. Say that these are some suggestions, but their own ideas are valuable as well. Ask them to compare their ideas to those in the handouts.
- Return in the big group. Ask the speakers of each small group to present their work in front of the others. Make sure that the rest of the group is paying attention.
- Conclude by congratulating everyone for their work today.
STRESS FREE

1. Objectives:

● To recognize symptoms of stress;
● To identify ways of dealing with stress;
● To encourage the seek help when needed.

2. Materials:

● Handout “Stressful times” - for each participant
● Handout “How to relieve your stress?”
● Handout “Be confident at tests”

3. Procedure:

● Begin by telling participants that today you are going to discuss about stress, especially school-related stress. Ask them to be open and to make an effort to imagine themselves in a stressful situation.
● Distribute handout “Stressful times” to every participant.
● Allow time for each participant to read the handout. You may read it aloud, but it is not obligatory.
● Ask if they have experienced such a situation. Don’t push for an answer. Say that is natural that we sometimes feel like this. This doesn't mean that something is wrong with us, or that we are “crazy”, is just a natural stress reaction to overload.
● Ask participants to think of what can be done in this situations. Encourage a discussion about this topic. Try to emphasize the importance of seeking help – to a friend, parent, teacher, counsellor, etc.
● Distribute handout “How to relieve your stress?”.
● Say that the handout contains helpful suggestions, but they may find other ideas, which would be welcomed.
● Discuss about the handout with participants. What methods have they already tried? Which ones do they think are more useful? Or more practical?
● Introduce the theme of test anxiety. It is a sub-theme of stress and is deals strictly with stress about tests.
  ○ e.g. you may say something like this: Maybe you are well motivated to learn, you're
using effective learning strategies, but something goes wrong on tests. You just can't seem to focus, and you know that the results in tests don't reflect your true level. This can of course be a factor of decreasing your motivation to learn, and then you will really don't do well in tests. Most of the time, the reason is an increased level of anxiety, that psychologists call performance anxiety or test anxiety. Tests are a mean of assessing our knowledge and abilities, so it's natural that we feel a little anxious when we are given a test. In fact, studies have found that we give our best in a testing situation if we are a bit stressed. Too much anxiety makes us lose our focus and doesn't allow us to give everything we can, but too little anxiety doesn't prepare us for the test, doesn't mobilize us for the test, and we don't use our maximum of resources. So we need to find an equilibrium that works best for us.

- Distribute handout “Be confident at tests”, that contain some useful suggestions for overcoming test anxiety.
- Discuss the handout with the participants. Encourage them to use these methods and to find other new ones.
1. Objectives:

- To introduce the concept of critical thinking;
- To emphasize the role of critical thinking in every-day life;
- To emphasize the importance of critical thinking in effective learning;
- To provide input on how to use critical thinking;
- To promote the use of critical thinking in learning activities and in every-day life.

2. Materials:

- Handout “Politicians worry the water supplies”/ Handout “Famous actor confesses to be kleptomaniac” - for each participant
- Handout “Critical thinking in learning” - for each participant

3. Procedure:

- Tell participants that today they are going to read some short news and analyze them. The news are real, they were published in various newspapers during recent years. Tell participants they will have to read carefully each news, with a “critical eye”, then answer some questions.

<table>
<thead>
<tr>
<th>1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Distribute handouts “Politicians worry about the water supplies” to every participant.</td>
</tr>
<tr>
<td>Read the news aloud or ask a volunteer to read it aloud.</td>
</tr>
<tr>
<td>Facilitate a discussion guided by these questions: (you may also think of other questions)</td>
</tr>
<tr>
<td>○ What was the common mistake made by all the politicians? (they didn't realize that it is nothing wrong with water having two molecules of hydrogen - the chemical formula of water is H₂O, which means two molecules of hydrogen and one molecule of oxygen)</td>
</tr>
<tr>
<td>○ Why do you think they answered in this manner?</td>
</tr>
<tr>
<td>○ Was the question asked by the reporter manipulative in some way? How?</td>
</tr>
<tr>
<td>○ Do people often assert things even if they are not sure on the facts?</td>
</tr>
</tbody>
</table>
Introduce the concept “Critical thinking”.

Tell participants that by analyzing the news they have used a precious human ability – thinking, more exactly critical thinking.

Explain that to think in a critical way means to question, interpret, evaluate. When we think in a critical manner we don't just take the information as it is provided; instead we analyze it, reflect over it, assess it; we are open-minded. Not thinking in a critical manner means accepting or rejecting an idea without analyzing it, just as it is. If we are just receivers of information we can't really take control over our own lives: we accept or reject ideas mostly based on prejudice and common mentality and we become vulnerable to different influences because we haven't developed our own system of beliefs, but just “imported” one from the others around us.

Ask participants what do they think is the connection between critical thinking and learning.

Distribute handout “Critical thinking in learning”

Facilitate a discussion about the handout

**Ideas for discussion:**

Do you know people that use frequently critical thinking? In what way do they differ from those that are thinking in a more passive way?

Do you usually use critical thinking in your studying?

Are there any subjects in school in which you think critically more than in others? If yes, why do you think this happens?

What can you do improve your use of critical thinking?

Distribute handouts “Famous actor confesses to be kleptomaniac” to every participant.

Read the news aloud or ask a volunteer to read it aloud.

Facilitate a discussion guided by these questions: (you may also think of other questions)

- What is wrong with this news? *(you may suggest if the group doesn't know what to answer - it gives a true information, that leads to a sensational, but false conclusion, because soaps from the hotel rooms are there for the use of guests, if a guest takes the soaps it doesn't mean he stole them, they were already paid by paying the room. In fact the actor probably just made a joke by using the word “kleptomaniac”)*

- What are the main mistakes? *(e.g. the news provides only bits of information and extracts a general conclusion)*

- How can you realize that the news is not correct *(you must have knowledge, you have to know about hotels). Here you have the opportunity to discuss about importance of knowledge for personal life – one can be easily fooled or manipulated if doesn't know things.)*

- Can you think of similar examples from your life?

- How can you relate this to your studying?

2
SOME THEORETICAL ANCHORS

As we advance in school the volume and complexity of information increases and the connections we need to make are more and more advanced. We pass on from concrete to abstract thinking and we realize that we need to use more diverse and sophisticated methods of study. In order to study efficiently we really have to understand what we are learning and to achieve this we need to treat information in an active manner. Many times we do this implicitly, without any conscious effort, but this doesn't happen all the time. In fact, we often develop unproductive learning strategies and we maintain them during our school years, and by this we don't obtain the results we strive for. This in turn leads to decreased motivation and in some cases even school failure and school drop-out.

An essential step in learning a material is understanding it. Some things are easier to understand and others are more difficult; it depends on our previous knowledge in that particular field, on our study skills and on the characteristics of the material to be learnt.

Critical thinking over a material means interacting with it, questioning, interpreting, evaluating. We can either do this alone or in group, orally or in writing.

Of course we can study in a superficial manner, for example by simply reading and memorizing a text, and we may even get a good grade for doing this. But certainly the information we have acquired in this manner won't stay with us for long and will help us very little in our personal development. Instead, by using critical thinking we gradually build on our knowledge system and also on our self confidence as rational learners.

In studying it is also important to observe the natural learning sequence:

Learning naturally goes from global to specific, from the big picture to specific details. For example, in biology we first learn that the human body is composed of main parts: head, torso, hands, legs. Then we learn more and more about each of the main parts, till we reach little details, that are not even visible by human eye, like neurons for examples. Those who choose to study biology at advanced level get to learn tones of information about very specific things like neurotransmitters, enzymes and so on. Or in literature we begin by reading small books with many pictures and as we grow older we read stories, essays, novels. Also, due to our increases knowledge we organize our reading, we learn to prefer some genre or some writers, or even try to write by ourselves. Students in literature go into many details in studying about certain writers or literary genre. Those are only two simple examples, but if you think about it, most of our knowledge is developed like this.

So why not use the same sequence consciously? In reading a text it's easier to understand if you first grasp the big pictures, and then fill in the details. Solving a Maths problem requires you first to read it in a global manner and then to pay attention to details.

You will find learning more easier if you apply this strategy while studying at different subjects.

The same goes for writing (e.g. an essay); you must begin by making a general plan and then work in depth on different parts.
STUDY TECHNIQUE – ANALOGY

1. Objectives:

- To discuss the use of analogy as a study skill;
- To practice the use of analogy as a study technique

2. Materials:

- Paper and pens
- Handout “Some analogies” - for each participant
- A lesson that you need to learn in school

3. Procedure:

- For this activity you will have to choose a lesson from school that you need to learn. It's preferable that all participants need to learn this lesson.
- Begin by telling the group that the purpose of this activity is to practice one study technique that has proven to be very effective for the understanding of information: analogy.
- Tell that they are going to practice this on a lesson they have to learn for school. In this way, they will not only learn about analogies, but also prepare for the lesson.
- Divide the group in small groups of maximum four members. Each member has a specific role: one is the writer (writes down the ideas of the group members), one is the speaker (will present to the rest the ideas the group came up with), one is the manager (makes sure that everyone in the group participates with ideas) and one is the coach (encourages group members to find more ideas and makes sure that the group is working).
- Explain that to make an analogy means to compare the new idea, concept, fact that you are studying to one that you already know and to whom is somehow similar. (e.g. mind is like a muscle, if you train it it will develop and be strong)
- Distribute handout “Some analogies”. Say that these are only some examples, that can give participants an idea on how to make an analogy.
- Give instructions to the group:
  - They will have to find the new concepts introduced by the lesson and find appropriate analogies.
  - Tell them to be as creative as possible, to let their imagination flow.
- Allow 15 – 20 minutes for completion of task.
- Return in the big group. Ask the speakers of each small group to present their work in front of the others. Make sure that the rest of the group is paying attention.
- End the activity by a discussion: Do you use analogy while learning? Do you find this technique useful? Can you think of useful analogies in your studying?
1. Objectives:

- To discuss the use of mind-maps as a study skill;
- To practice the use of mind-mapping

2. Materials:

- Paper and pens
- Handout “Mind-map of learning to learn” - for each participant
- Handout “Mind-mapping” - for each participant

3. Procedure:

- For this activity you will have to choose a concept that you need to learn in school.
- Begin by telling the group that the purpose of this activity is to practice a creative study technique that is called mind-mapping.
- Tell that they are going to practice this on a concept they have to learn for school. In this way, they will not only learn about mind-mapping, but also prepare for school.
- Explain that today they will work in small groups. Divide the group in small groups of maximum four members. Each member has a specific role: one is the writer (writes down the ideas of the group members), one is the speaker (will present to the rest the ideas the group came up with), one is the manager (makes sure that everyone in the group participates with ideas) and one is the coach (encourages group members to find more ideas and makes sure that the group is working).
- Explain that mind-maps represent a different and creative way of looking at concepts. They have proven to be very effective, since they give you a comprehensive picture of the concept, link it with relevant knowledge and help to organize your mind.
- Distribute handout “Mind-mapping”. Allow two minutes for participants to take a short look at it. Tell them that they are going to work in groups using this handout.
- Distribute handout “Mind-map of learning to learn”. Say that it is only an example, “learning to learn” may be mapped in different ways also, and what they are seeing in this handout is only the result of a process of mind-mapping.
- Give instructions to the group:
  - They will have to mind-map in small groups the concept presented at the beginning of
the activity (the one that you have agreed on).
    ○ Tell them to be as creative as possible, to let their imagination flow.
    ○ Encourage them to use the help given in the handout “Mind-mapping”

● Allow 20 minutes for completion of task.
● Reunite the big group. Ask the speakers of each small group to present their work in front of the others. Make sure that the rest of the group is paying attention.
● End the activity by a discussion: Did creating a mind-map help you to understand better the concept? In what subjects do you think is this technique most useful?
TAKE A SURVEY

1. Objectives:

- To understand the benefits of using graphs and tables in organizing the learning material;
- To practice the elaboration of graphs and tables.

2. Materials:

- Paper and pens
- Handout “On graphs and tables” - to each participant

3. Procedure:

- Tell participants that today they are going to act as sociologists and make a study on their colleagues' interests
- Say that the main purpose of the activity is to work with graphs and tables, which are very good tools for effective learning
- Divide the group into small groups of five members.
- Give instructions to the groups:
  - They will act as sociologists and elaborate a survey to question their colleagues interests. A survey is a list of questions put to find out the answer to something you want to know. By analyzing the answers you can find the answers you were looking for. In this case you want to find out what are your colleagues interested in. What are their interests? What do they like to do most now? What would they like to do in the future?
  - Each group will have to think of a list of five questions they want to ask their colleagues. Each question must have three options of response
    - e.g. What do you like the most to do in the summer holidays?
    - a) go to the mountains
    - b) go to the seaside
    - c) hang out with my friends in the city
- Tell participants that they have fifteen minutes to write their questions. The questions must be simple and addressed in direct manner. All members of a group have to contribute with a question.
- After finishing writing the questions, they have to answer the questions themselves and to put the questions to the other participants also. Tell them to mark the answers on a sheet of paper.
• Allow ten minutes for participants to obtain the answers.
• Now ask the groups to organize the answers to three questions in a graph and the answers to two questions in a table (or two in a graph and three in a table, as they prefer). Give them an example of graph and one of a table. You may use the examples from below, or think of other examples.

  e.g. **Graph:**

  ![Graph Example](image)

  *this graph shows that nine prefer to go to the mountains, twelve prefer to go to the seaside and three prefer to hang out in the city*

  e.g. **Table:**

<table>
<thead>
<tr>
<th>preferences</th>
<th>mountain</th>
<th>seaside</th>
<th>hang in the city</th>
</tr>
</thead>
<tbody>
<tr>
<td>gender</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>girls</td>
<td>4</td>
<td>7</td>
<td>1</td>
</tr>
<tr>
<td>boys</td>
<td>5</td>
<td>5</td>
<td>2</td>
</tr>
</tbody>
</table>

• Discuss the results with the participants:
  o Did they have a clearer picture of the results after making the graphs/tables?
  o How can you use graphs and tables in different subjects in school?
  o What are the important issues to think about when you make a graph/table or when you read one?

• Distribute handouts “On graphs and tables” to all participants. Tell them that the handout contains some advice regarding the reading of a graph/table.

• Allow some time for participants to read the handout and then conclude the activity by a discussion on today's activity. You may also ask participants if they know other methods that are somehow similar to graphs, for example diagrams.
1. Objectives:
   - To discuss the use of outlines and summaries as study skills;
   - To practice the making of outline and summary.

2. Materials:
   - Paper and pens
   - Handout “Making a summary” – for each participant
   - A lesson that you need to learn in school

3. Procedure:
   - For this activity you will have to choose a lesson that you need to learn in school.
   - Tell the participants that the purpose of this activity is to practice two study skills, that have proven to be very effective – making an outline and making a summary. You are going to discuss about them together because they are closely connected.
   - Say that they are going to practice these skills on a lesson they have to learn for school. In this way, they will not only learn about outlining and summarizing, but also prepare for school.
   - Divide the group into small groups of four members.
   - Explain that an outline contains the main topics from a text. An outline is organized in a hierarchical way, with main topics and subtopics. The table of contents from a book is an example of outline.
   - Explain that a summary is an extended version of the outline. It is a very effective technique for organizing, as well as revising the material.
   - Give instructions to the groups:
     - They will have to draw an outline for the lesson you have agreed on.
     - Tell them to stick to main topics and few subtopics.
   - Allow 15 minutes for completion of task.
   - Discuss about the outlines the groups came out with.
   - Distribute handout “Making a summary to every participant”
Tell them that the handout contains useful ideas on how to make a summary, but they may have other good ideas.

Give instructions to the groups:
  o They will have to make a draft of the summary of that lesson.

Reunite the big group and discuss about the use of outlining and summarizing in learning. Emphasize that outlining and summarizing are very effective methods of organizing the material to be learnt and also, are easy to use.

**ALTERNATIVE ACTIVITY**

If you think the members of your group already know very well how to make an outline and summary from a text you can suggest to them to create their own outline:

*Imagine you want to write a paper. How would the outline of your essay/ paper/ short story etc. look like?* Emphasize that making an outline before starting to write a text is a great tool for organizing your thoughts, getting a clearer picture of what you want to do, “seeing” the good ideas and those who can be left behind.

After they do their own outline they can make a draft of the paper they want to write.

You can suggest this activity to be done individually or in small groups. If it is on small groups you should decide on a topic (e.g. write a paper for the local newspaper about the life in our school).
1. Objectives:
   - To discuss about different ways of taking notes;
   - To emphasize the importance of effective notes taking;
   - To practice on a model of effective way of taking notes.

2. Materials:
   - Paper and pens
   - Handout “A model of taking notes” – for each participant

3. Procedure:
   - Tell participants that today you are going to discuss about different ways of taking notes. Emphasize that the way in which notes are taken has an important effect on effective learning.
   - Facilitate a discussion about this topic:
     - Why do you think the way in which notes are taken is important?
     - How do you usually take your notes? Do you have your own method or more often the teacher organizes the way in which you take your notes?
   - Distribute handouts “A model of taking notes” to all participants.
   - Allow five minutes for participants to read the handout.
   - Discuss the handout by explaining each of the three sections and clarifying what is not well understood.
   - Ask participants to fill in the section 2 and 3, on the basis of what you have discussed earlier. Basically, they will have to take notes about notes taking! They will not fill in section 1, because they didn’t have the handout while listening. Explain that at class, first they will fill in section 1.
     *You can do this part of activity individually or in small groups.*
   - Conclude the activity with a discussion about today’s work: Do they think is a useful method? Do they intend to use it? In which subjects do they think is most appropriate?
UNDERLINING – WHAT AND HOW?

1. Objectives:
   - To discuss about underlining as a study skill for organizing the material to be learnt;
   - To discuss on different models of underlining;
   - To determine the effective ways of underlining.

2. Materials:
   - Paper and pens
   - Handout “Underlines” – for each participant
   - Handout “Underlines” – for the facilitator of the activity

3. Procedure:
   - Begin by telling participants that today they are going to analyze three versions of the same document. The content of the document is the same, but the way in which is underlined is different. Say that the purpose of the activity is to determine effective ways of underlining a text.
   - Distribute handouts “Underlines” to every participant.
   - Read aloud the handout or ask a volunteer to read it. If you choose a volunteer make sure to give her/him the handout for the facilitator, which is not underlined.
   - Allow some time for participants to look at the different three styles of underlining.
   - Ask them which of the three seems to be more effective? Why? Do any of the three versions make it easier/harder for them to understand the text and to organize it? Why?
   - Conclude the activity by a short discussion about today’s topic.
REVIEWING

1. Objectives:
   ● To discuss about reviewing as a study skill for remembering a material;
   ● To identify common mistakes in reviewing;
   ● To give suggestions for effective reviewing;
   ● To give short input on other methods for facilitating the good acquisition of a material: Self testing and Being tested by others.

2. Materials:
   ● Paper and pens
   ● Handout “Andy is angry about the test” – for each participant
   ● Handout “How to review effectively” – for each participant
   ● Handout “Test yourself” – for each participant
   ● Handout “Work with a partner” – for each participant

3. Procedure:
   ● Begin by telling participants that today they are going to discuss about the case of Andy, who is now very angry because he did poorly on a test. In his opinion, he prepared himself for the test, by reviewing a day before, but still, he couldn’t respond to some of the questions and on some others he was not sure on the answer. Now he is angry and can't understand what he did wrong.
   ● Distribute handouts “Andy is angry about the test” to every participant.
   ● Facilitate a discussion guided by these questions: (you may think of other questions as well)
     ○ What did Andy do wrong?
     ○ How should he have reviewed in order to get a good performance on the test?
   ● Distribute handout “How to review effectively” to every participant.
   ● Allow a few minutes for participants to read the handout.
   ● Discuss about the handout. How do the participants usually review? Do they already use these methods in reviewing? What other suggestions do they have? Do they review the same in different subjects (e.g. History and Maths) or differently?
   ● Tell participants that there are also other useful techniques to facilitate remembering of
something you are studying. For example, you can test yourself or have one of your friends or family to test you.

- Distribute handouts “Test yourself” and “Work with a partner” for every participant.
- Discuss about the handouts. Do they use these techniques? Do they find them effective for study?
- Tell that these are not the only methods, only some. These methods have proven to be very effective, but there are also other effective methods.
- Ask participants to think of other methods used for the same purpose.
MEMORY TRICKS

1. Objectives:
   - To discuss about memorization techniques;
   - To practice memorization techniques.

2. Materials:
   - Paper and pens
   - Handout “Memory tricks”

3. Procedure:
   - Tell participants that today you are going to play some memory games. There are different methods that help you to memorize stuff, and today you are going to try some of them.
   - Distribute handouts “Memory tricks” to all participants.
   - Read aloud the techniques described.
   - Divide the group into small groups of maximum four members. Each member has a specific role: one is the writer (writes down the ideas of the group members), one is the speaker (will present to the rest the ideas the group came up with), one is the manager (makes sure that everyone in the group participates with ideas) and one is the coach (encourages group members to find more ideas and makes sure that the group is working).
   - Give instructions to the groups:
     - They have to choose two techniques presented in the handout and to use it for something they need to learn in school. For example, they may invent acronyms, or acrostics, or chains, or whatever techniques they want.
     - All members of the groups have to help by coming up with ideas.
   - Allow twenty minutes for the groups to finish their work.
   - Ask the speaker of each group to present the group’s ideas to the other participants.
   - Conclude the activity with a discussion about memorization techniques: Are they familiar with other techniques used for the same purpose? In which subjects do they think this technique is most useful?
MOBILE PHONE FILM FESTIVAL

1. Objectives:

- To raise awareness on the importance of organizing and controlling one’s learning;
- To discuss about the three main components of control over learning: planning, monitoring, evaluation.

2. Materials:

- Paper and pens;
- Handout “Mobile Phone Film Festival”

3. Procedure:

- Tell participants that today they will work in groups and pretend to be the organizing committee of an event that will be held in their school.
- Divide the group in small groups.
- Distribute handout “Mobile Phone Film Festival” to every group.
- Read aloud the handout. Say again that they have to think of major steps to be taken before, during and after the event.
- Allow fifteen minutes for the groups to complete the task.
- Ask the groups to present their ideas.
- Try to draw a general conclusion and then tell that by summarizing, the three main steps needed to be taken would be:
  - Planning
  - Monitoring the progress
  - Evaluating the results
- Discuss briefly what do these mean and emphasize that these are steps we take in every elaborated action of ours. Ask participants how they can relate these (planning, monitoring and evaluating) to their own life.
- Tell participants that in their real life now, they are “organizers of their own learning”. They are the managers of their learning and, just like in the case of organizing an event, learning can be planned, monitored and evaluated.
- Facilitate a discussion about these concepts: What does it mean to plan, monitor and evaluate when it comes to learning? How exactly you do that? What is the use?
- Say that you will go through some details of planning, evaluating and monitoring in the next activity.
SOME THEORETICAL ANCHORS
METACOGNITIVE STRATEGIES

Studies have found that learning efficiently means more than just using strategies that rely on our cognitive abilities. There is a higher level of cognition, named metacognition that is highly involved in learning. Metacognition refers to the knowledge we have about our own learning abilities and cognitive functioning, as well as to the regulation and monitoring of our cognitive functioning. This means what we know about the way our mind works, how we evaluate ourselves, how aware are we about the learning strategies that we use and in what way we select them, how we monitor our progress.

So metacognition can be seen as a “controlling body” for cognition, which is permanently receiving information from cognition, evaluates the information and then sends feedback on what should be done. For example, I am beginning to read a new scientific article, which is complex and contains new information, so my metacognition “tells” me to look at the keywords, stop for a minute and try to think about what I already know about this topic. This will help me to understand and integrate easily the new information. I will now use my cognitive abilities to do this and my metacognition will monitor how well am I doing it, and it will give me more input if necessary. Of course, cognition and metacognition don't have different locations in our brains or in our cognitive system; they are just used for different purposes; in the case of learning cognition deals with learning itself and metacognition with regulating learning. The two processes work together and cannot be separated. Still, studies has found that many times students who are low achievers have almost the same cognitive abilities as their mates who are doing well in school, but are low in metacognitive abilities.

The good news is that, as in the case of motivation and learning strategies, metacognitive strategies can be learnt, and so metacognitive abilities can be developed and improved. In order to do this, you have to develop what you know about your metacognition and to improve the use of metacognitive skills.

1. WHAT IS METACOGNITION?
It may sound like a sophisticated concept, but if you think about it, you've been using metacognition for years. Perhaps you called it “reflective thinking” or “reflective intelligence” and these terms are pretty close to that of metacognition. What we know about metacognition falls into three categories: knowledge about self in the area of metacognition, knowledge about the task and what resources we need to active to meet the demands; and knowledge about our strategies and the way in which we use them.
1.1. Metacognitive knowledge about self

This basically means what we know about our intellectual abilities in particular and about human cognitive functioning in general. For example, you may know about yourself that you study better in the afternoon comparing to the evening; or you know approximately how much material you can memorize in a study session; or you may know that you work better in a quiet place instead of a noisy room; or you are aware of the fact that having previous knowledge about a particular topic helps you in understanding a text, etc.

1.2. Metacognitive knowledge about task

This kind of knowledge includes what we know about the nature of different intellectual tasks, but also what kind of intellectual activity we must develop to meet the task requirements. For example, you know that solving a problem in Chemistry requires different processes than writing an essay; that reading and comprehending a Science text is different than reading and comprehending a comic book; that reading the text of a drama for school demands different resources and processes than acting in that drama, etc.

1.3. Metacognitive knowledge about strategies

This includes all knowledge that we have regarding our both cognitive and metacognitive strategies. Basically it refers to all the strategies discussed in the first two sections, to what we know about those strategies and the way we use them. For example, summarizing is a cognitive strategy, because it facilitates understanding, but when we use summarizing to check on our learning, the strategy becomes metacognitive. Repeating aloud is a cognitive strategy because it facilitates the integration of the new information, but also metacognitive, because we use it also to regulate the knowledge we have acquired and establish what we need to do next. The main difference between cognitive and metacognitive strategies lays in their function: cognitive strategies are used for understanding and learning, metacognitive strategies are used for regulating on our knowledge. They are not different strategies in themselves, only the purpose of their use is different.

2. HOW TO USE METACOGNITION?

As we have discussed earlier, metacognitive strategies are no different than cognitive strategies, it is only their functionality that differs: cognitive are used for understanding, while metacognitive are used for regulating knowledge. Metacognitive strategies come into action at three different stages of performing a task: before the task, by establishing a plan of action; during the task, by monitoring the progress and after completion of the task, by evaluating the results.
2.1. Planning

This is a strategy to be used before starting the task. Broadly, it involves managing resources, setting the goal and objectives, selecting appropriate strategies.

2.2. Monitoring

Now you have a plan of action and are ready to put it into practice. At this phase you put your metacognition at work through monitoring the progress towards the goal you have established for yourself. This happens because it is not enough just to have a goal, to manage resources and select appropriate strategies, we also have to control their use. The task may prove to be more difficult or easier than anticipated, the external conditions may change, so we permanently have to check on our progress and adjust our strategies to the challenges we encounter.

2.2. Evaluation

Planning your study and monitoring the progress is great, but you also need to evaluate the results, or the outcomes of your learning. By doing this you can correct things that went wrong, but more importantly, you will improve your performance in the future.

So, after you have finished your study session, spend some time evaluating your work. Just like in the case of monitoring, you will find this as being time well spent and a proof that you are becoming an expert learner.
You can integrate all these strategies under the broad concept of **reflection**. By consciously reflecting over your work your chances of success raise considerably. The use of reflection is one of the main differences between expert learners and novice learners. Usually, novice learners go ahead with learning without stopping to ask themselves what they have understood. For example, they may read an entire page from a textbook and go on to the next, even if they haven’t properly comprehended the first page. Of course, in the end, the results won’t be satisfactory. Instead, expert learners take time to examine a material in depth, ask themselves questions on the text, make connections to prior knowledge and to their personal lives, check for errors and change learning strategies if they prove to be inefficient. In the end, their results are superior because they fully understood and integrated the new knowledge.

The good news is that you don’t have to spend years waiting to become an expert learner, you can learn and apply the strategies used by experts to become yourself an expert in learning.

Also, by mastering those strategies, you become more and more independent in your learning, more confident in your own abilities and therefore can manage your learning with great freedom. Today’s world is full of information, and being equipped with metacognitive strategies allows you to take full advantage of this enormous amount of information.
BE AN EXPERT LEARNER

1. Objectives:
   - To discuss about planning, monitoring and evaluating as strategies to control learning;
   - To describe each of the three above.

2. Materials:
   - Paper and pens
   - Handout “Be an expert learner”

3. Procedure:
   - Begin by briefly reminding participants about the previous activity. Remind them that you have discussed about planning, monitoring and evaluating as strategies to control learning.
   - Explain that planning means basically to put questions regarding what you have to do and regarding your own resources to complete the task. You may give one or two examples: “What do I already know about this topic?” or “How much time will it take me to finish?”
   - Ask participants what they understand by planning their own learning. What other questions are coming to their mind?
   - Explain that monitoring means to follow the progress of your work. This is sometimes done by the means of reflection, which means examining a material in depth, making connections to prior knowledge and to personal life, checking for errors and changing strategies if they prove to be inefficient, looking for a meaning in what you’re learning.
   - Ask participants what questions they put to themselves while monitoring what they are doing. You may give an example or two: “How am I doing so far?” or “Am I on the right track?”
   - Explain that evaluating means to assess the results you have achieved.
   - Ask participants to give examples of questions they may put to themselves to evaluate the work they have done. For example: “How well did I do?” or “What could I have done better?”
   - Distribute handout “Be an expert learner” to all participants.
   - Discuss about the handouts. Tell participants that these are not the only possible questions, just a sample of them. Each of the participants can think of other questions, what is important is that the questions serve the purpose of planning, monitoring and evaluating.
Conclude by stating that these strategies are defining for an expert learner, and the use of them gives you opportunity for succeeding.

SUPPLEMENTARY ACTIVITIES:

Think about making a school based project on learning how to learn. You can:

- organize events
- invite speakers
- have an “expert corner”
- promote the use of reflection as a valuable learning tool
- cooperate with other schools, share the experience
REFERENCES:


