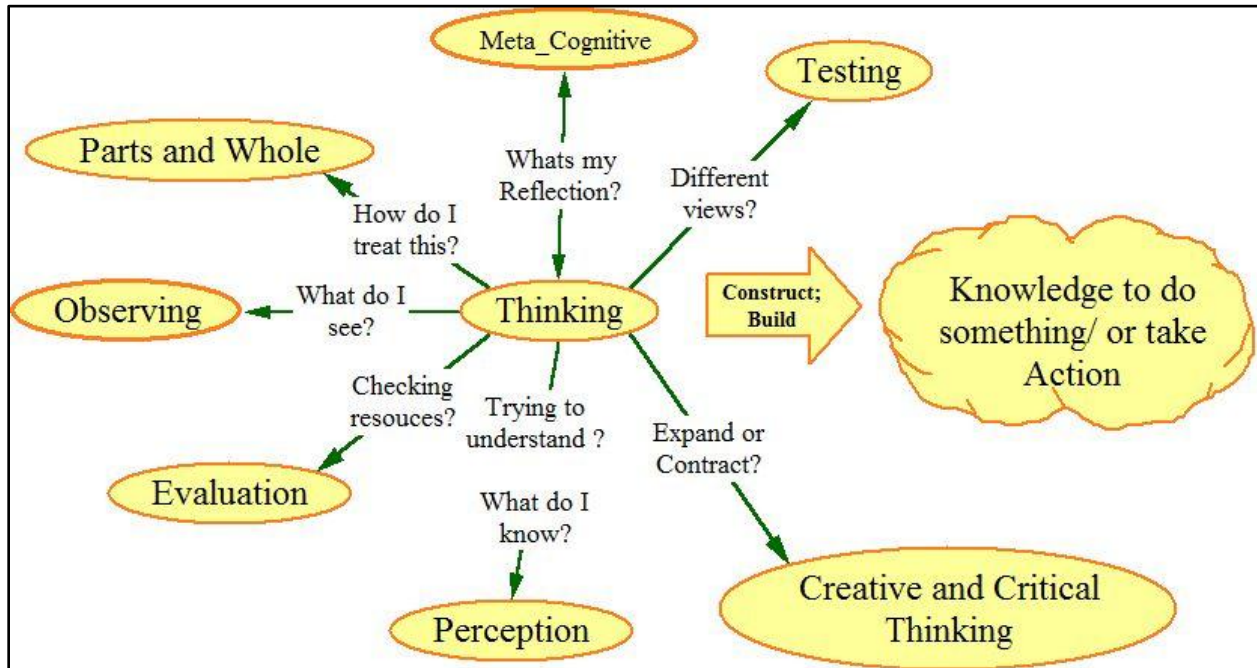


Thinking Skills improvement exercise for a class.

Grade level 3+

**Objective:** Have students self-learn in groups about different thinking concepts:

Learning is about searching out meaning and imposing structure



*What would you change in this mind map?*

Knowledge has three lines of access

1. Perceptual ... looks for connection
2. Action ... What we have done before
3. Conceptual ... an idea, words, Manipulative

Instead of explaining to the students, then, **I ask them to explain what they think and why.**

- Much of the learning is in the explaining
- The students themselves determine what it is they want to understand
- people come to depend on themselves: they are the judge of what they know and believe
- Students recognize the powerful experience of having their ideas taken seriously
- Students learn an enormous amount from each other

Thinking Skills improvement exercise for a class.

... *Eleanor Duckworth.*

Have students work in teams/or pair-share to learn, evaluate and report on the following concepts. They should first make an outline of what they will do and report:

Listed below are some concepts that students can learn about:

Sequencing and sorting	Classifying
Comparing	Making predictions
Relating cause and effect	Drawing conclusions
Generating new ideas	Problem solving
Testing solutions	Making decisions
Student thinking styles	System thinking
Questions	

An example outline or process might be:

Overview task	
What concepts do I bring?	
Definition	
Mind map of where it fits	
Research finding	
People or organizations connected	
What tools can we create to make this known to the whole class?	
What did we do right, could improve?	
	<p>Example:</p> <p><i>of a mind map for Sequencing and Sorting. The mind map helps the student understand what the concepts are and makes them visible to the learner.</i></p>

Thinking Skills improvement exercise for a class.

**Results:**

**Successful applications** of these skills result in **explanations, decisions, performances, and products** that are valid within the context of available knowledge and experience, and promote continued growth in higher order thinking, as well as other intellectual skills.

*Use of the mind to form thoughts, to reason, to reflect:*

<b>Knowledge to do something can:</b>	
<b>straighten out entanglements</b>	<b>clear obscurities</b>
<b>resolve confusion</b>	<b>unify disparities</b>
<b>answer questions</b>	<b>define problems</b>
<b>solve problems</b>	<b>reach goals</b>
<b>guide inferences</b>	<b>shape predictions</b>
<b>form judgments</b>	<b>support decisions</b>
<b>end controversies</b>	