TEACHER'S RESOURCE PACK

3 ENTREPRENEURSHIP
EMPLOYABILITY
EDUCATION

PLAYFUL PROJECT-BASED LEARNING | TERM 3 LIFE SKILLS PROJECT

basic education
Department:
Basic Education
REPUBLIC OF SOUTH AFRICA

Read to Lead
A Reading Nation is a Leading Nation

2030 NDP

GRADE 3

These resources have been created by Thinking Schools South Africa at admin@thinkingschools.org.za

THINKING MAPS APPLICATION TIPS

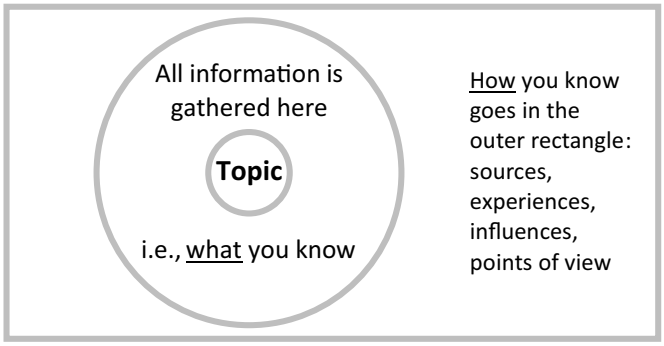
When you are **Defining…**

Key Words used	Questions asked	Applications
Tell me everything you know about this topic, List, Define, Note the key points, name all the types (of fractions, forces, habitats, plants, animals, qualities, points of interest) in this topic. Brainstorm, discuss.	What do you think this word means? What did we learn about this topic? What are the main issues raised in this video/book? What are all the points you want to make (or learn) about this topic? What are all the ways of getting to this answer/number?	Formative Assessment of what students already know about a topic. This includes misconceptions, which you can be aware of. A starting point to gather all ideas – firstly your own, and then perhaps more from peers, video or written material; or pre and post revision.

…then the Thinking Map to use is

Note: You can use the Circle Map to measure growth in your thinking, such as checking and self-correcting information that is incorrect and adding new information in a different colour.

THE CIRCLE MAP



When you are **Describing…**

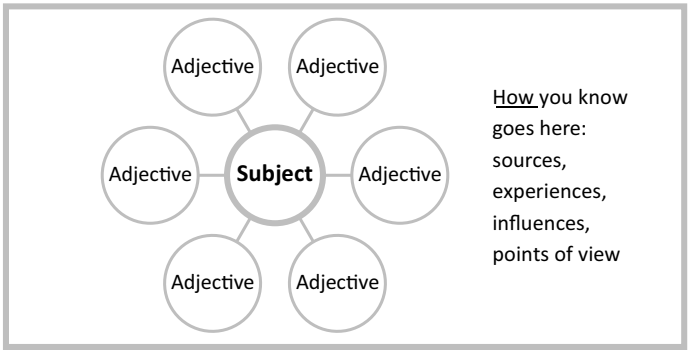
Key Words used	Questions asked	Applications
Describe feelings, attributes, characteristics, properties, adjectives, qualities. Use each of the 5 senses to explain how it feels, smells, sounds, tastes, looks.	How would you describe this in your own words? What is this really like? Which words would you use to paint a vivid picture of it in your mind?	Generate rich and original adjectives before writing – to describe a setting, a character, or situation. Consider the properties of materials or visuals in Natural Science, Design and Technology or Art.

…then the Thinking Map to use is

Note: The Bubble Map is for adjectives only.

It is not a Spider Diagram! (If you are looking for a Spider Diagram, either collect main ideas in a defining Circle Map or main headings in a classifying Tree Map, in which case you can also add sub-points under those headings).

THE BUBBLE MAP



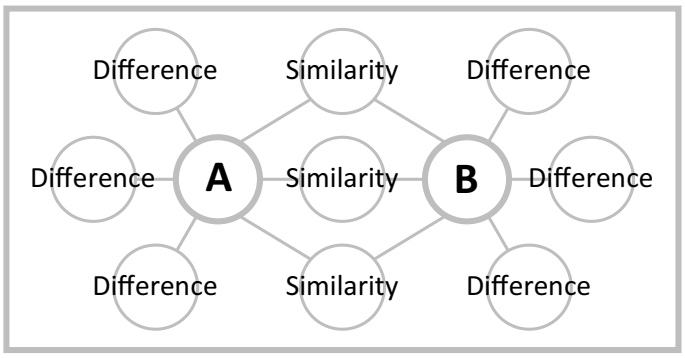
When you are **Comparing and Contrasting…**

Key Words used	Questions asked	Applications
Compare/contrast, discuss similarities/differences, distinguish between, differentiate, what things/concepts have in common or not.	What are the similarities and differences between A and B? What do they have in common? What is unique to only one of them? What distinguishing features help you identify them from each other?	Compare and contrast characters in a book/film, two shapes, methodologies, countries, time periods, formulae, technologies, types of plant or animal. Clarifying identifying properties that enhance understanding of forms, functions, applications and meanings.

…then the Thinking Map to use is

Note: Be careful to connect the lines to the rights places, based on the properties that link or differentiate A and B. Use the most striking or meaningful similarities and differences without mechanistically mirroring them (e.g. tall and short may be less distinguishing than that A is gangly and B is well-dressed). A and B can have different numbers of differences.

THE DOUBLE BUBBLE MAP



When you are **Classifying…**

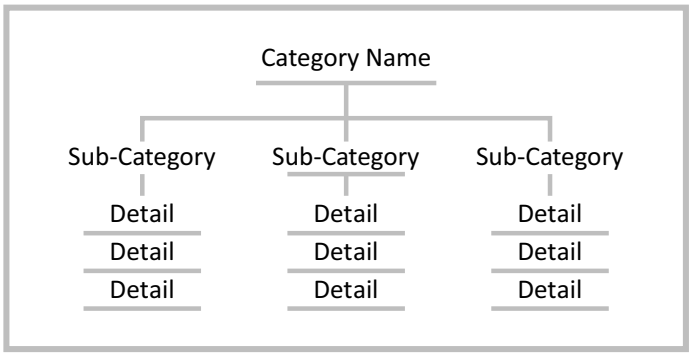
Key Words used	Questions asked	Applications
Classify, sort, group, categorise, give related detail, types of, kinds of, list and elaborate, taxonomy	How might you group the main ideas, supporting ideas and details in this topic? What are the key headings in this unit of work/project/talk/essay? Can you sort all the information you have gathered into key concepts? What important details do you want to add under each heading?	Making notes or summaries in any content area – students think about the category headings and the details of what they learn. Categorising information from a Circle Map in preparation for writing about a topic or giving an oral presentation. Collecting information under predetermined headings whilst reading a text.

…then the Thinking Map to use is

Note: Be careful to draw the Tree Map exactly as structured here.

You can use the Tree Map to give students an overview of a subject, to see what is coming up and how units of work fit in. It is also extremely useful for revision.

THE TREE MAP

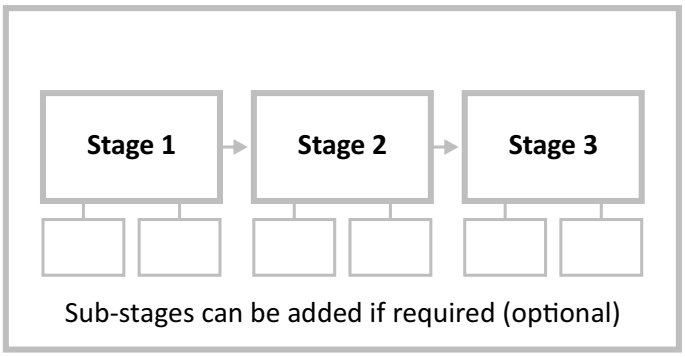


When you are **Sequencing…**

Key Words used	Questions asked	Applications
Sequence, map the steps in this project, put in order, order, recount/re-tell, what happens next, cycles, patterns, processes, change, solve multi-step problems	What is the process/project you are sequencing? What is the step-by-step sequence of events in the process/project? What are the sub-stages? Is each step in the right order?	Mapping a sequenced step-by-step project in PPBL. Life Cycles and processes in Natural Science/Social Science. Time lines in history. Planning the sequence of a story for writing/recording the sequence of a story. Recording a thought process, such as in problem solving.

…then the Thinking Map to use is

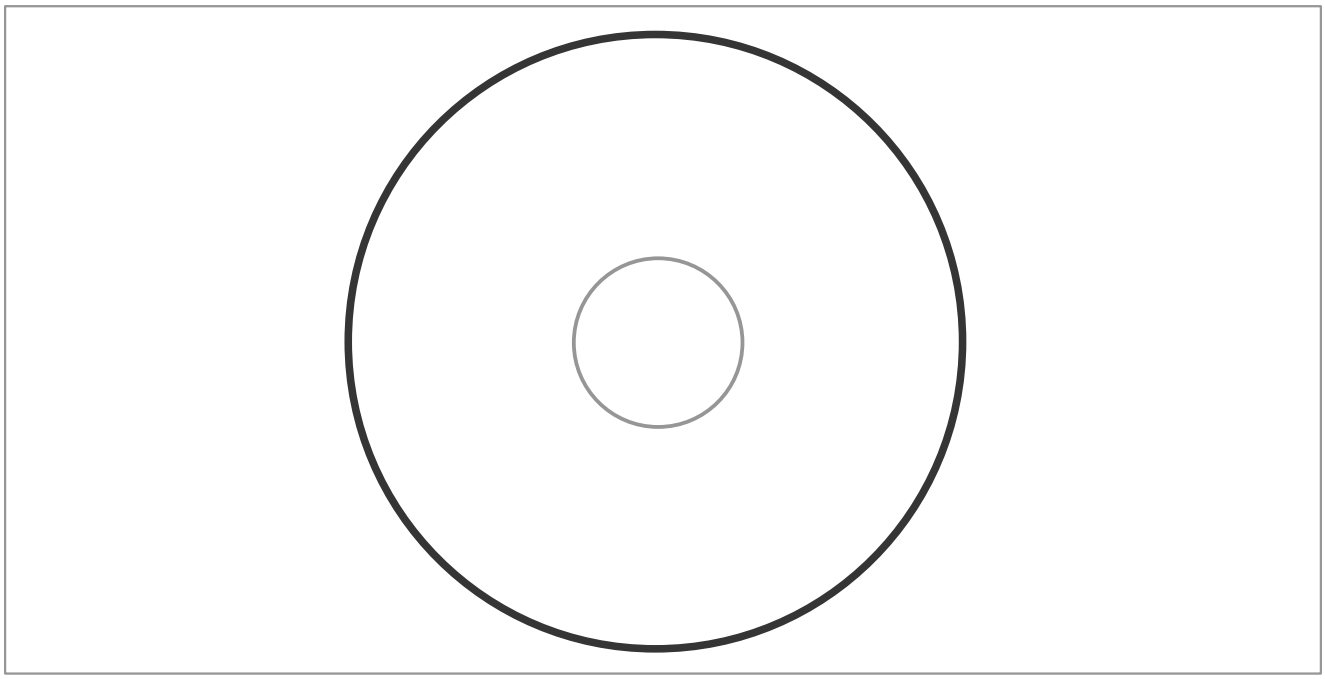
THE FLOW MAP



Note: Make sure that the Flow Map has arrows showing the order of events/stages. For life cycles it becomes a circle.

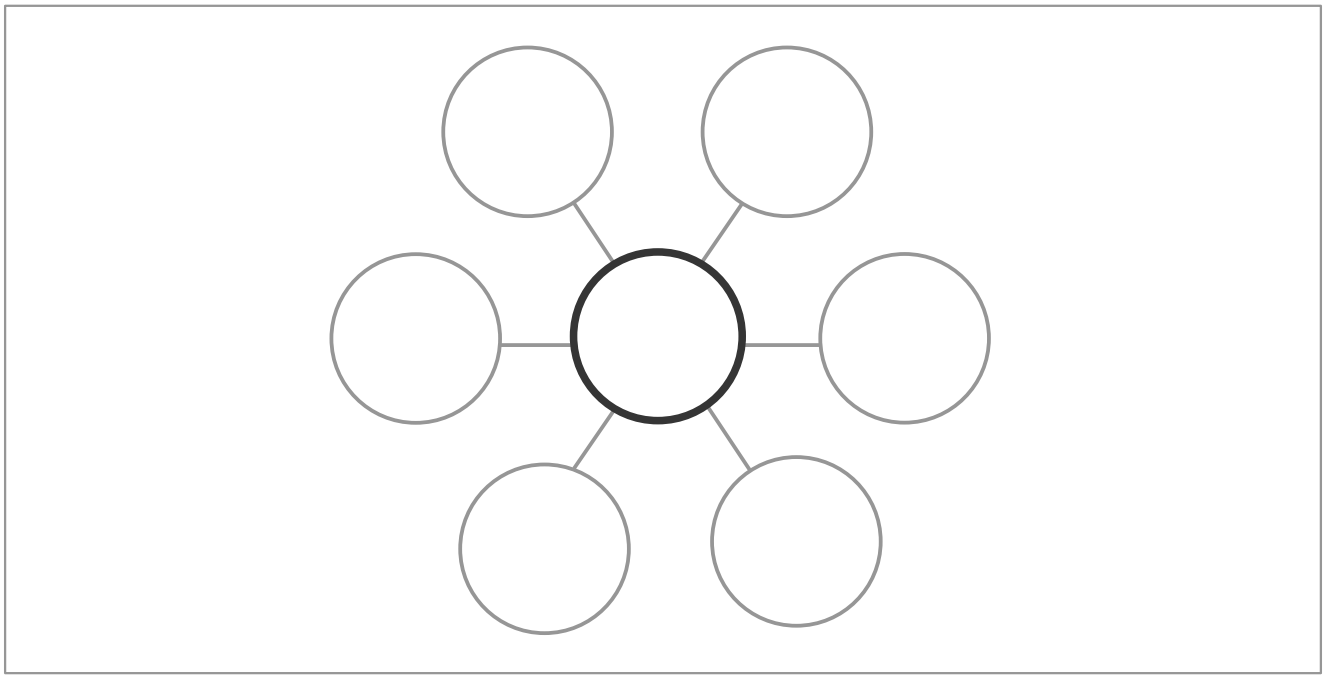
General Note: Whilst it is vital to apply the Thinking Maps with the elements of each map exactly as they were designed, please don't squeeze student thinking to the size or number of circles or blocks. Freehand maps that are corrected as they develop, capture more expansive thinking!

DEFINING IN CONTEXT



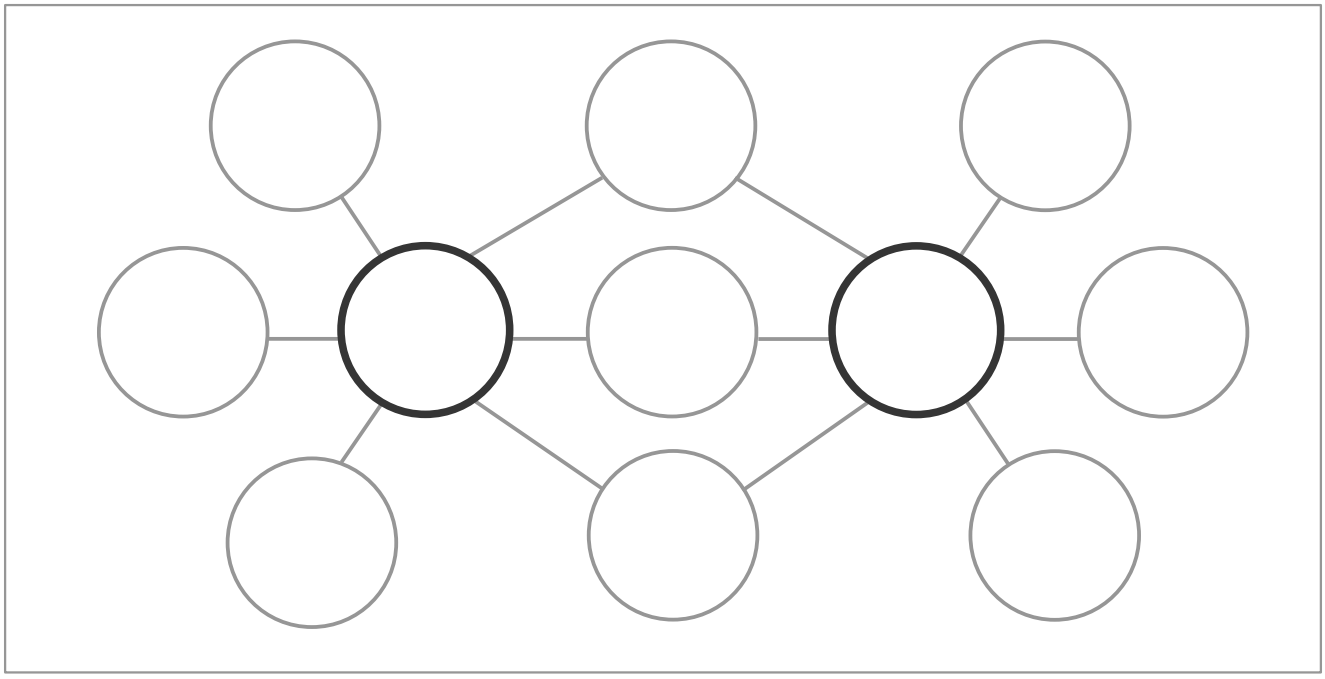
Circle Map

DESCRIBING



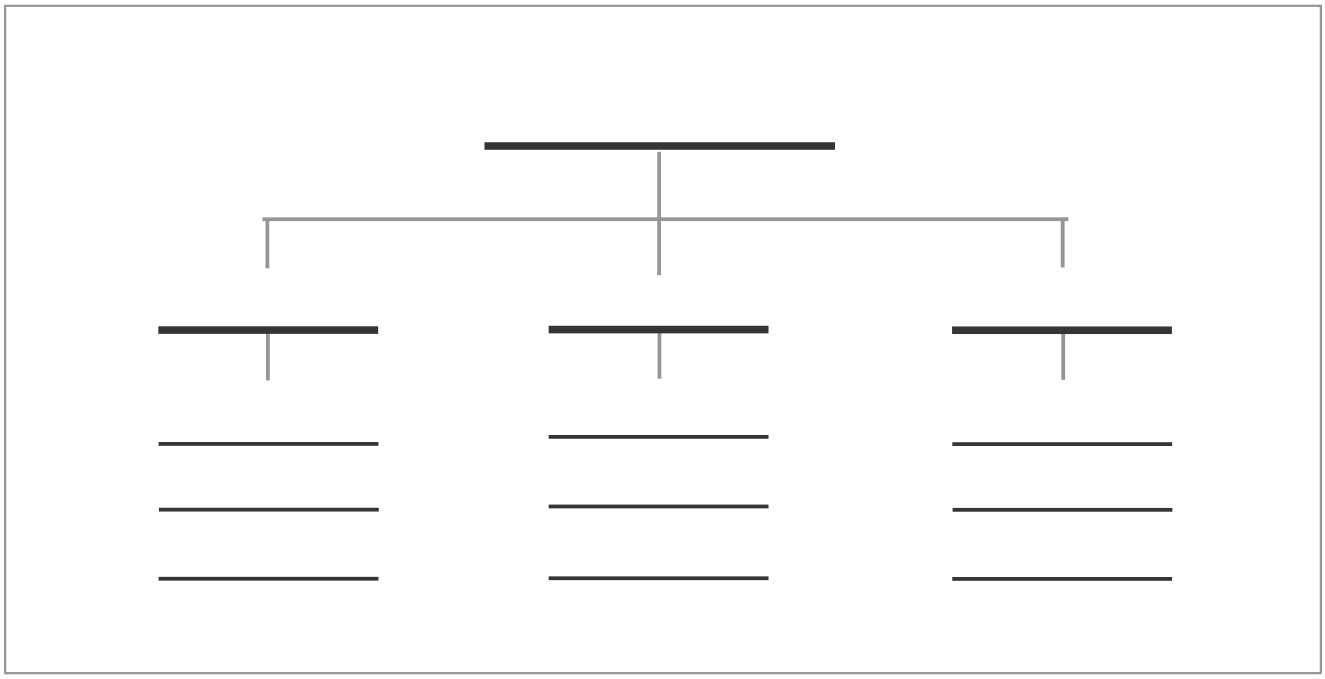
Bubble Map

COMPARING & CONTRASTING



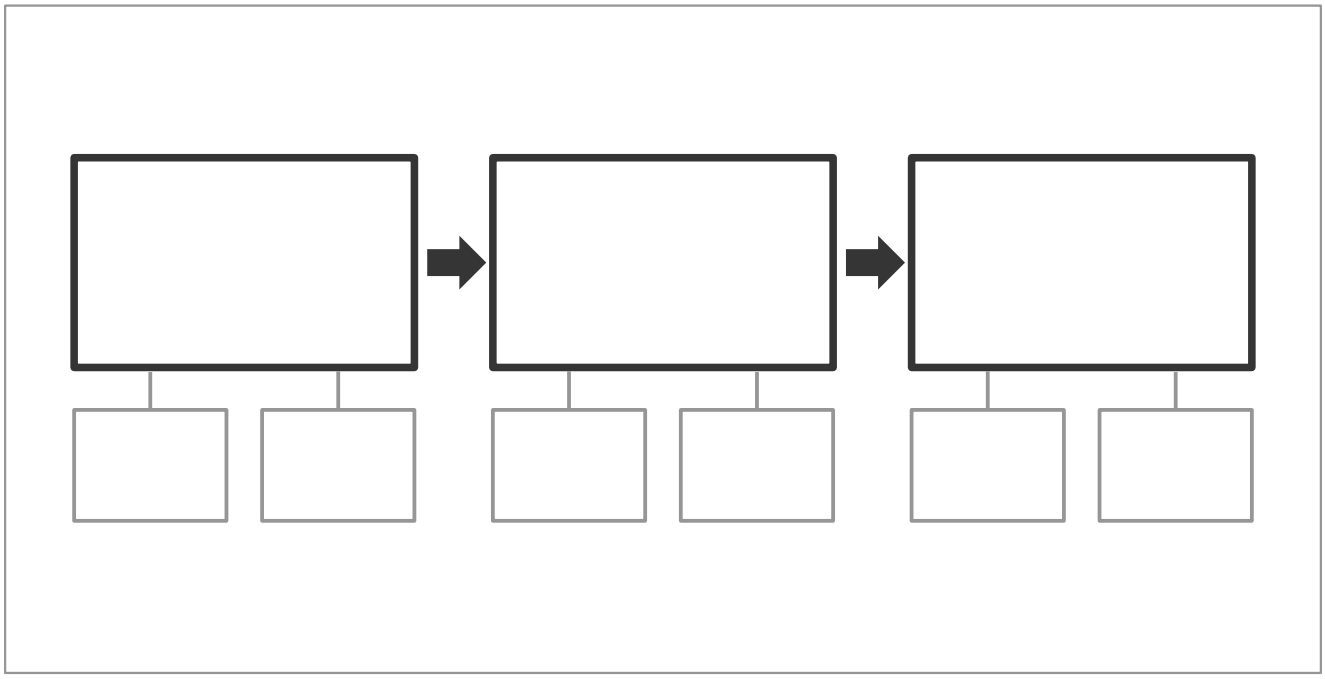
Double Bubble Map

CLASSIFYING



Tree Map

SEQUENCING



Flow Map

Measure what you treasure: Competencies for a changing world

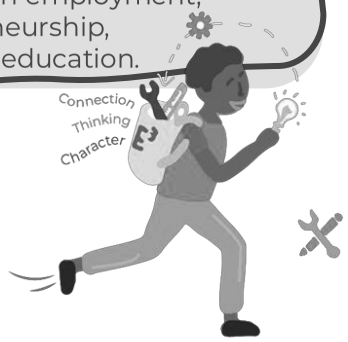
The role of a teacher in a rapidly changing world is to help learners in all phases develop the skills to help them succeed in whichever path they take after school.

We treasure learners who are **equipped with a toolbox of skills (sometimes called competencies)** that will help them navigate and be successful in the changing complex world. The purpose of schooling is to **create learning environments, learning content, and teaching approaches** that create opportunities for learners to develop these toolboxes full of useful survival tools, such as competencies, skills and mindsets.

In South Africa, with youth unemployment at over 70% - at this time – the need for engaged, productive, motivated, entrepreneurial, solution-seeking learners equipped with sharpened tools in their toolbox is more critical than ever and the earlier we start equipping learners the better.

If you believe that the purpose of your role as a teacher is to be a facilitator who is preparing young people to thrive, then the way you look at assessment needs to change too. Assessment measures what we treasure. We treasure prepared learners with 21st Century skills. The implication is that every lesson design should be constructed to have this goal in mind: to have learners leave school skilled in the competencies that are critical to survive and thrive in life after school.

Having an **Entrepreneurial Mindset** empowers learners to take ownership of their learning, becoming purpose-driven opportunity-finders and problem-solvers able to succeed in employment, entrepreneurship, and further education.



Creating the environment to develop an Entrepreneurial Mindset

As teacher superheroes, your role in the classroom is to prepare young people for success in life after school. That is not an easy task because the young people of today face many challenges; the world is uncertain, with pandemics, food insecurity, drought and so on. As teachers you can create an environment in your classrooms for young people to develop the skills, mindsets and competencies they need to navigate this changing world. We call these skills the Entrepreneurial Mindset.

One way to create an environment for young people to develop their Entrepreneurial Mindset is **through Playful Project-based Learning**. Learners work on identifying and solving real-world, relevant problems through a project designed to activate an Entrepreneurial Mindset. This type of teaching is relevant to all subjects and all learners. Remember, this is not about setting up a business, it is about developing the skills and competencies to succeed in education, employment, and entrepreneurship. The Entrepreneurial Mindset is universal, and everyone needs this to succeed in this changing, challenging and complex world we live in!

Assessing the Entrepreneurial Mindset

There is so much evidence to show that an **Entrepreneurial Mindset can be learnt**! And if it can be learnt, then we can assess it. One important thing to re-emphasise here is that it CANNOT be measured with an exam – it can only be measured through observation and self-assessment and reflection.

You have to be able to **notice when a skill is forming and know how to help to make it sharper and stronger**. This means you must know what these skills (or competencies) are. You should be able to start to see the progression of the development of the acorn and know how to nurture it into a mighty oak by ensuring that the nutrients and environment are present and correct to help it to thrive.

Getting started

An **Entrepreneurial Mindset is made up of many different skills, competencies, and mindsets**. However, since you might be starting your journey in developing young people's entrepreneurial mindsets, we recommend that you start by measuring just a small number of skills. The first part of your assessment journey starts with:

- ✓ **Understanding** what these skills are
- ✓ **Looking** for these skills in your lessons
- ✓ **Thinking** about how your teaching environments enable the development of these skills. What might you do differently to provide more opportunities for learners to develop these skills?

We really like the rubric developed by the **Centre for Curriculum Redesign (CCR)** and we have simplified their rubric to make it easier to use in the classroom.

Let's start with just these skills:

- Communication
- Critical Thinking
- Collaboration
- Creativity

How to use this guide

As we mentioned this guide is a simplified version of the Centre for Curriculum Redesigns more lengthy and thorough assessment rubric. The first step in being able to assess competencies is to be able to SEE them in your lessons. This guide has broken down the four skills mentioned in the circle, into 3 short statements of things you can 'SEE' in your learners. Simply read these statements and think, do you see this never, sometimes, often or always. When you have completed the assessment process please reflect on your experience and answer the questions on page 7. Enjoy your assessment journey!

Elements of Creativity

Creativity is all about using your imagination to see things differently. Creative people come up with different ideas and find realistic solutions to problems they face.

The CCR outline several different elements or sub-competencies that make up a definition of Creativity, which include:

- Analysing information
- Transferring knowledge and experience to solve a problem
- Taking risks
- Listening
- **Solution seeking and idea-generating**
- **Reflecting**

Here we will focus on generating ideas and solution seeking and reflection. Taken from the Centre for Curriculum Redesign 2018.

Solution seeking and idea-generating

Creative people develop new ideas. They are also good at turning these ideas into realistic solutions, especially within situations where there are limitations. Creative people see limitations as opportunities to be innovative by reflecting and improving on their ideas.

Reflecting

Part of the process of creativity is reflecting on the process itself and making small changes when appropriate to improve the process.

DURING THE PROJECT OR ACTIVITY:

How often did the learner show this behaviour?

Tick your answer in the blocks

		Never (1)	Sometimes (5)	Often (10)	Always (15)
1.	**Generating ideas**: Did the learner generate ideas?	☐	☐	☐	☐
2.	**Solution seeking:** Did the learner actively look to find relevant and realistic solutions to problems identified?	☐	☐	☐	☐
3.	**Reflecting:** Did the learner reflect on the activities and the outcome?	☐	☐	☐	☐

4. In relation to the explanation of creativity did the learner demonstrate an understanding of what creativity is?

Circle your answer below on the scale from 1 to 5.

Did not understand creativity **1** **2** **3** **4** **5** *Completely understood creativity*

Elements of Critical Thinking

Critical thinking is all about asking questions to understand the world around you, it is also about trying to make sense of the information you find, evaluating it and connecting it to other pieces of information.

The CCR outline several different elements or sub-competencies that make up a definition of Critical Thinking, which include:

Reasoning | Critical Reflecting | **Analysing** | **Considering alternatives**

Critical thinking is about developing higher levels of understanding, ultimately transferring these critical thinking skills outside the context in which they were learnt (CCR, 2015). This tool will focus on analysing and considering alternatives. Taken from the Centre for Curriculum Redesign 2018.

Analysing

Analysing is all about breaking down a complex topic or piece of information into smaller parts that are easier to understand. You can use tools, such as thinking maps to help you to do this. It is also about asking questions to help you understand something.

Considering alternatives

To expand initial idea(s) by considering different and/or opposing views.

DURING THE ACTIVITY:

How often did the learner show this behaviour?

Tick your answer in the blocks

		Never (1)	Sometimes (5)	Often (10)	Always (15)
1.	**Analysing:** Did the learner ask questions which demonstrated their ability to analyse the information about the topic and activity they were learning?	☐	☐	☐	☐
2.	**Analysing:** Did the learner use tools to help them to organise the information they gained about the topic/activity? (e.g. Thinking maps is one tool).	☐	☐	☐	☐
3.	**Considering alternatives:** Did the learner consider opinions or views that were different from their own viewpoint?	☐	☐	☐	☐

4. In relation to the explanation of critical thinking did the learner demonstrate an understanding of what critical thinking is?

Circle your answer below on the scale from 1 to 5.

Did not understand critical thinking **1** **2** **3** **4** **5** *Completely understood critical thinking*

Elements of Communication

Communication is the process of transferring information from one person or group of people to another. You can communicate in different ways, through speaking, writing, without words and use different tools. Good communicators try and understand other people (have empathy).

The CCR outline several different elements or sub-competencies that make up Communication, which include:

Questioning

Multiple-means communicating

Inter-person communicating

Empathising

Articulating

Non-verbal communication

Here we will focus on empathising, articulating and non-verbal communication..
Taken from the Centre for Curriculum Redesign 2018.

Empathising — Good communicators try to understand how other people feel and take their experiences into consideration.

Articulating *(expressing in your own way)* — To excel in communication, it is important to consider the audience and present information using tools and methods that are appropriate for that audience.

Non-verbal communication *(facial expressions and hand gestures)* — Communication is not just about words. Non-verbal cues and tones that people use can be extremely important for conveying emotions and messages. It is important to know how the WAY that you say something impacts others as much as, or more than, WHAT you say.

DURING THE ACTIVITY:

How often did the learner show this behaviour?

Tick your answer in the blocks

		Never (1)	Sometimes (5)	Often (10)	Always (15)
1.	**Empathising**: Did the learner "put themselves in others' shoes" to try to understand how they feel?	☐	☐	☐	☐
2.	**Articulating:** Did the learner consider their audience and tailor their responses appropriately, using the most appropriate tools?	☐	☐	☐	☐
3.	**Non-verbal communication:** Did the learner demonstrate an understanding of non-verbal means of communicating?	☐	☐	☐	☐

4. In relation to the explanation of communication did the learner demonstrate an understanding of what communication is?

Circle your answer below on the scale from 1 to 5.

Did not understand communication **1** **2** **3** **4** **5** *Completely understood communication*

Elements of Collaboration

Collaboration is when people work with each other to complete a task. It involves co-operation and teamwork and the sharing of ideas, knowledge, and skills to reach the same goal.

The CCR outline several different elements or sub-competencies that make up Collaboration, which include:

Leveraging others' strengths | Considering | **Conflict resolution** | **Compromising** | **Feeding back**

Here we will focus on compromising, conflict resolution and feeding back. Taken from the Centre for Curriculum Redesign 2018.

Compromising People who are good collaborations take responsibility for their own behaviour and tasks. They also know that they cannot get their own way all the time and work with the team to find the best solutions.

Conflict resolution People who are good at collaboration are good at solving conflict or disagreements in their groups. They actively listen and try to understand a problem from different peoples' perspectives.

Feeding back The best collaborators give constructive feedback. They also openly receive feedback to help them grow and develop their skills.

Name: _____

DURING THE ACTIVITY:

How often did the learner show this behaviour?

Tick your answer in the blocks

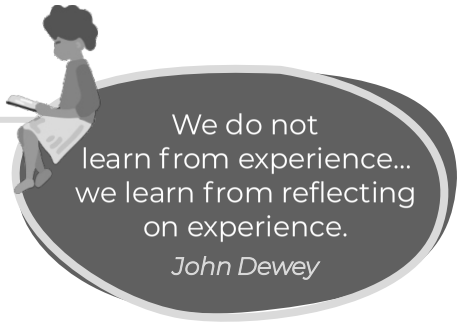
		Never (1)	Sometimes (5)	Often (10)	Always (15)
1.	**Compromising**: Did the learner make compromises so that the team could get the best results?	☐	☐	☐	☐
2.	**Conflict resolution:** Did the learner demonstrate the ability to resolve disagreements or conflict in the team?	☐	☐	☐	☐
3.	**Feedback:** Did the learner give useful feedback to the team and was willing to receive, and act on, feedback?	☐	☐	☐	☐

4. In relation to the explanation of collaboration did the learner demonstrate an understanding of what collaboration is?

Circle your answer below on the scale from 1 to 5.

Did not understand collaboration **1** **2** **3** **4** **5** *Completely understood collaboration*

My Reflections



This is the start of a journey to **prepare young people with the skills, competencies, and mindsets** they need to succeed in a complex, ambiguous and challenging world. Measuring these things is not an easy task, and certainly not one we would expect teachers to gain mastery in in the first year. Assessment this year is all about understanding what these skills and competencies are and starting to see them in your lessons and with your learners.

We have created this assessment tool, to help you to reflect on your experiences of seeing and understanding these skills in your classes. There are no right or wrong answers here - please answer honestly as this is a tool for you.

- Do you feel that **you have better understanding** of what the skills of Collaboration, Critical Thinking, Communication and Creativity are? Please explain your answer?

- Were you able to **'see' Collaboration, Critical Thinking, Communication and Creativity in your lessons**? How easy were they to see, now that you know what they are?

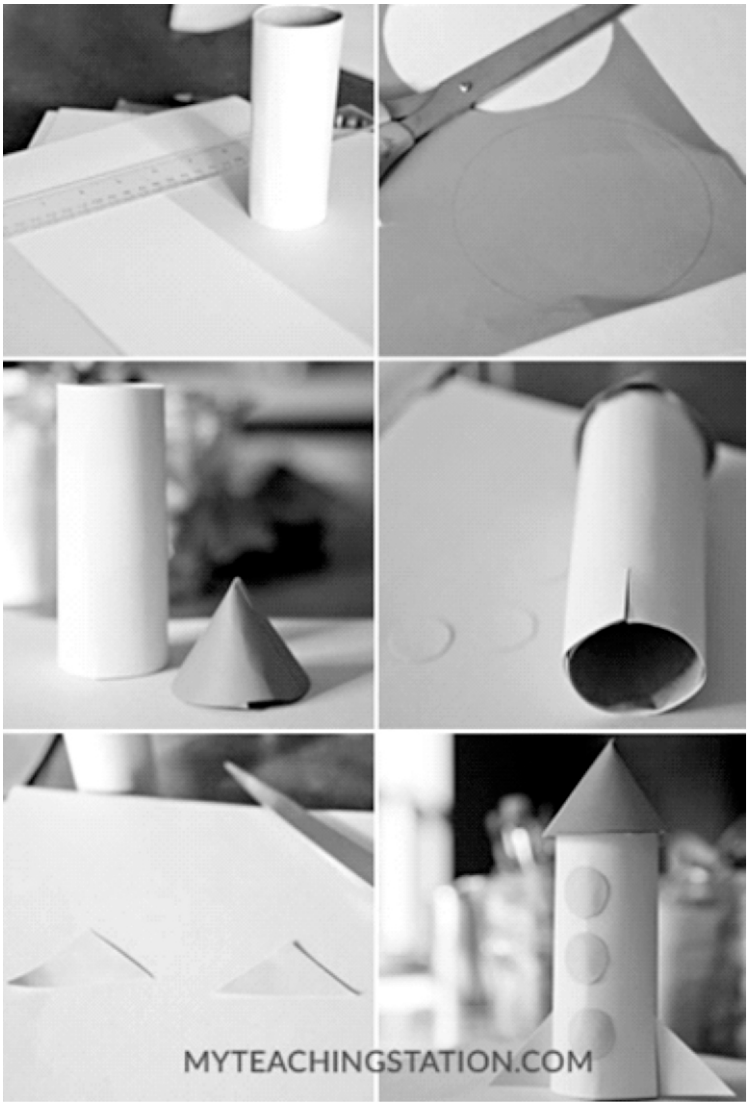
- How does knowing about what these skills are **affect your thinking about the lessons you design**?

- What will you **do differently to create more opportunities** for your learners to practice these skills in your lessons?

What ideas do you have to **measure these skills** in your lessons?

Building your rockets

These are a few online resources

- https://www.kids-world-travel-guide.com/solar-system.html
- https://www.youtube.com/watch?v=Qd6nLM2QlWw
  (Exploring Our Solar System: Planets and Space for Kids 11mins 54)
- https://www.nasa.gov/kidsclub/index.html
  (National Aeronautics and Space Administration – excellent resource for all things space)
- https://activity-mom.com/2020/01/solar-system-book-for-kids/
  (Free printable book)

Design idea for building a rocket