An A-Z of Teaching and learning methods for developing creative thinking in schools

To be creative, an idea must also be appropriate - useful and actionable.

Teresa Amabile in, *How to Kill Creativity* (1998)

Beginning at the end: Practising 'reverse engineering' of a story.

Brainstorming to suspend judgment: Developing tolerance for ambiguity by inviting ideas on a given topic and preventing premature closing down of lines of thought.

Bringing in an expert: Inviting people into the classroom who have experience in a particular field to show examples of their own work, or introduce a topic with real-world anecdotes.

Cards for questions: Motivating pupils to ask 'good' questions using visual tokens that help the teacher keep track of who is asking the questions.

Children create their own philosophical questions: Developing communication and critical questioning by considering a key topic-related question in more depth.

Classic paper clip game: Using divergent thinking as pupils jot down as many uses for a paperclip as they can think of.

Co-create a visual reference of helpful phrases: Generating a useful phrase bank that pupils can refer to when commenting on one-another's work.

Connections: Practising constructing connections between objects or concepts by working out which object/concept links a set of 3 others. Alternatively, finding creative ways of linking ten random objects.

Copying: Developing techniques by practising accurate copying.

Creating a rubric: Introducing some real-world standards – perhaps by asking some local experts or parents – to the assessment of a piece of 'authentic' work so that pupils know at the beginning of a topic what to aim for.

Critique work anonymously: Practising critique in a non-threatening way by using an anonymous piece of work and focusing on a narrow number of criteria.

Deliberate practice: Developing deliberate practice as you help pupils break down a task into constituent parts and think about how they might practise the parts they find most challenging.

Driving questions: Encouraging macro level thinking by posing questions that link aspects of a unit of work or topic.

Exit tickets: Developing reflection – both teacher's and pupils' – using an Exit Tickets format to elicit information about what pupils have / haven't understood, or what worked / didn't work in the classroom.

Feedforward: Encouraging articulation of an individual's own learning struggles in a way that invites suggestions from peers.

5 'Whys' technique: Uncovering root causes of a problem to stimulate thinking about imaginative solutions by probing each explanation with a further 'why?' question.

Expansive questions: Reframing any 'fixed mindset' thoughts about learners' intelligence by giving them sight of a bank of expansive questions.

Good or bad: Examining deep-rooted assumptions by exploring the impact that different forms of technology / innovations have had on our lives.

Growth mindset prompts: Developing pupils' ability to stick with difficulty as they receive feedback on a piece of work along with prompt cards that encourage them to re-frame any 'fixed mindset' thinking.

Guided critique gallery critique idea: Practising giving helpful feedback on others' work-in-progress.

I wonder questions: Encouraging students to wonder out loud by inviting them to share questions that demonstrate curiosity.

Jigsaw: Developing collaborative capabilities by using a Jigsaw format that divides pupils into teams and requires each member to become an expert in one aspect of the project for the purposes of teaching their team so that everyone can pass an end-of-topic assessment.

Learning logs: Encouraging critical reflection by providing space for learning logs that are added to briefly, at regular intervals.

List as many games as you can: Developing tolerance for uncertainty by asking pupils to make a list with minimal guidance and then reflecting on their decision making as they chose what to include and what to leave out.

Mind mapping: Developing imagination with a mind mapping technique that pupils can draw on to organise key topics, content, and ideas around a central concept.

Noticing everything: Developing pupils' ability to focus on a single thought, action, or idea, by guiding them to use their senses to observe something around them and think about what they notice.

Odd one out: Practising making connections between ideas within a topic – and expressing rationale – by focusing on which object does not belong.

Playing with Belbin: Helping children understand the importance of team roles by looking at the characteristics of team members.

Predict future challenges: Developing tolerance for ambiguity by helping pupils' predict what challenges might arise in their everyday lives and inviting suggestions for how they might act.

Question of the week: Helping everyone learn from good questions by making a note of the best questions pupils ask and encouraging class reflection on the question itself.

Re-working: Improving pupils' work by giving them the opportunity to address feedback on a piece of work, or re-attempt a difficult question from last week's lesson.

Scaffolding: Developing self-reflection as you invite pupils to compare outcomes with intended outcomes, and to think through how their learning can be applied to other situations.

Sequencing an assignment: Making connections between tasks that need doing by representing a larger task with a visual chart or other image that breaks it down.

Six Thinking Hats: Questioning from a range of perspectives; looking at the positives and the negatives, facts and feelings, creating possibilities and consolidating understanding, in order to consider all views in a given scenario.

Slow writing: Developing technique in writing by directing pupils to write sentences to meet certain criteria, then to return to each sentence and consider each choice of word to see if an improvement can be made.

Socratic seminars: Developing inquisitiveness by using a Socratic Seminar format that begins with a real-life question and values the process of checking understanding, supporting others' comments, building on others' reasoning, and making a new argument.

'Stuck' poster: Developing persistence using Building Learning Power's 'stuck poster' to help focus pupils on useful techniques to try when they don't know what to do next.

Subject related Thinking Hats: Practising using the six Thinking Hats with reference to a broad subject-related theme.

Teacher prompts: Developing self-reflection by modelling what it looks like to self-talk through a problem in front of the class.

Team building exercise: Developing relationships that will benefit collaborative work by using a fun team challenge.

Three before me: Developing resourcefulness by requiring pupils to search for answers in three places (including their peers) before asking for help from the teacher.

Visualise: Helping pupils reach a receptive state to absorb detail by visualizing a passage read aloud and thinking about what might happen next.

Waiting Time: Slowing down pupils' thinking to develop their intuition by requiring them to pause before responding to a question.

What does this remind you of? Helping pupils make connections between a piece of text and themselves/other texts/the wider world by questioning to deepen their understanding of the text.

What do you think? Developing thinking routines by returning pupils' questions back to them, reframed as another question.

What makes you say that? Encouraging pupils to see multiple perspectives by asking them to think about their perceptions about a particular artefact and to explain their interpretations.

What might you need to know? Stimulating problem-finding by asking pupils to think about what they need to find out in order to complete a piece of work.

Wicked questions: Stimulating curiosity by inviting students to explore different levels of meaning through asking questions of a philosophical or values-driven orientation to reflect on meaning and significance.