# Questioning

## What are the different styles of questions, and why might we use them?

When Teaching for Creativity, questioning is a core tool in our arsenal. There are many reasons to ask pupils questions: to check or retrieve prior knowledge, to promote deeper thinking, and to develop enthusiasm and inquisitiveness.

So called 'Wicked Questions' are challenging, often deliberately provocative questions designed to initiate hard thinking and promote engagement. Commonly used in the humanities are driving questions, which provide an overall thrust to a unit of work, as different aspects of the question are considered in turn: 'What is responsible for the outbreak of WWI?' is a classic example.

Through the use of well-chosen and structured closed questions, we can check that pupils have the fundamental knowledge they need to think critically and creatively. Hinge questions can be used at key points in a learning sequence, to identify whether pupils understand an idea that is essential to further study. For example, before teaching electrolysis, a chemistry teacher may need to diagnose pupil understanding of ionic bonding. When well-designed, multiple-choice questions can be used to diagnose common misconceptions, allowing the teacher to dispel these with greater precision.

Finally, we can use Socratic questioning to encourage pupils to interrogate their own thinking processes, remember forgotten facts, and identify flaws in their reasoning.

## Where can it go wrong?

Questioning can go wrong when questions are unclear, too easy or too difficult, or are not provoking thinking that is relevant to the subject matter being taught. It matters who the questions are asked to and how they are asked – how many pupils are thinking about the question you have asked? Try to keep questions short, well-structured, and logically sequenced, and think about how you can ensure that as many pupils as possible are thinking about your question.

Consider the types of thinking that your question may elicit and whether pupils are prepared for it, e.g. is your question moving learning forward, stimulating new ideas, and generating new understanding, or will they be stuck trying to guess what is in your head?

## How can it be done well?

There are many effective ways to question pupils. Mini whiteboards are a versatile tool for rendering pupils' ideas visible and ensuring no pupils are left behind. All-hands-up or cold-calling are effective techniques for helping to build engagement and establish a culture of high expectations. Collaborative strategies, such as think-pair-share, can be very effective.

It is essential to consider how you will gather responses from pupils, how you will ensure the maximum number are actively engaging in thinking, and how pupils will be held accountable for thinking when given time to do so. Invest in good routines for asking and answering questions, and the rewards will be rich.

# Wicked questions

Preplanned questions to get pupils thinking about wider ideas in texts.

## What you could do:

- Add starter slide that links to wider ideas presented in the extract. Each starter is a different open-ended question asking for pupils' opinion. Examples of these questions are: What creates fear? What makes some things scary?
- These questions are given before pupils are given a main lesson objective – for example, 'Is scientific progress always positive?' was the question given before pupils were then introduced to Frankenstein.
- Reiterate expectations regarding independent pupil work first and collaboration after. The aim is for pupils to not parrot the teacher's answers during analytical writing.

## What pupils need to do:

- Settle into the lesson by writing their ideas down on a mini whiteboard (MWB).
- Discuss the information with their partner, when instructed by the teacher.

## When to try it:

- At the start of a lesson as a settler task.
- When introducing a new topic to the class.

## What to avoid:

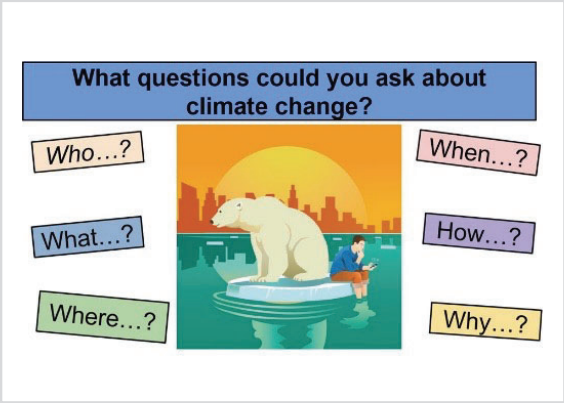
- Pupils starting to discuss ideas together before thinking for themselves.
- Pupils trying to guess what the teacher is asking them to think about.
- Pupils trying to mimic the teacher.
- Questions that are either not broad or not provocative enough for pupils to develop their thinking.

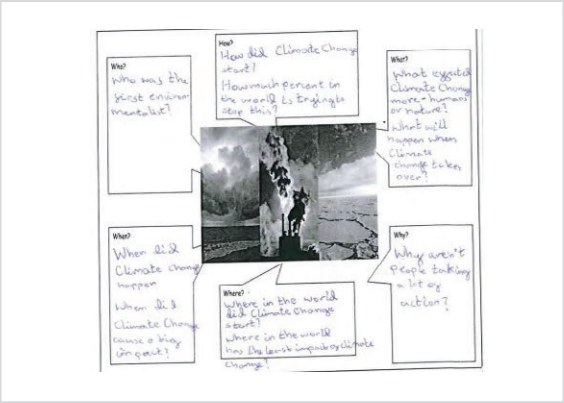
## How do I know that it has worked?

- All pupils will have their own opinion, e.g. written down on their mini white board.
- All pupils will use their answers, from the start questions, in their own analysis.

## Exploratory questioning

Driving exploratory questions are used at the start of a new topic to encourage more curiosity and inquisitiveness within pupils, linking to wider knowledge of topics.



### What you could do:

- Prepopulate a sheet with open ended questions. This sheet could include an image of the topic being studied with questions around it, such as an image of a polar bear standing on melting ice. The questions can be as simple as 'what does this make you think? How does it make you feel? What is happening here? Why might this be happening? What topic could this link to? What questions do you have about this image/topic?'
- Adapt the scheme of work accordingly to the questions that pupils created regarding that topic. All these questions were then revisited at the end of the topic. This can be done through a driving learning journey. A learning journey is a planned and structured pathway pupils follow as they progress through the topic of learning. It can outline key knowledge and skills that pupils are expected to acquire over the term which links with the curriculum and school ethos.
- Model good questions. Provide examples, stems and structures to help pupils to devise their own. It may be helpful to provide pupils a curated list of questions, which they can choose, improve or add to.

### What pupils need to do:

- Write down questions regarding a topic, on the sheet.
- Create questions for each subheading.

## When to try it:

- At the start of a lesson, when introducing a new concept or topic.
- Use the questions produced as the scheme of work progresses.

## What to avoid:

- When pupils have no knowledge regarding a subject. For example, pupils need to understand what climate change is to be able to formulate questions regarding it.

## How do I know that it has worked?

- Pupils can successfully generate pertinent, informed questions regarding a topic.
- Pupils can answer their own questions, as the scheme of work progresses.

# Recall questions

Eliciting answers from pupils. At the start of lessons, pupils are presented with a series of questions which build on prior learning and help them activate the subject-specific knowledge they will need for that lesson.

## Silent Starter – example Y7 French

**1. Warm-up:**
*Translate into English*

A) sept
B) quinze
c) dix

*1 point*

**2. Parallel text recall:**
*Translate into French*

I have a brother, but I don't have a sister

There are six people in my family

*2 points*

**3. Revision:**
*Translate into French*

A) I have
B) You have
C) He has
D) She has
E) We have

*3 points*

**4. Thinking hard:**
*Answer this question for you in French*

Est-ce que tu as des frères et soeurs?

*4 points*

## What you could do:

- The Frayer model - a visual organiser used to help pupils understand the meaning of vocabulary - is adaptable for individual subject settings but is most successful when each section presents pupils with an incremental challenge. The starter slide has four different sections which pupils use as a settler at the start of the lesson. The structure of this includes one question which asks pupils to show their understanding of the previous work they have completed – teachers can use this as an assessment for learning tool and respond to the needs of the class as a result. The next sections include: a link to homework; a skill that will be used in that lesson; a challenge/thinking hard question to stretch higher attaining pupils.
- Sections should be used to recall prior learning and to slowly introduce skills, knowledge or concepts required for the lesson.
- Including a Thinking Hard question in the final section can be useful for stimulating wider discussion or springboarding into deeper themes from that lesson or unit content.
- Assess the pupils' learning while they are completing the starter and feed back. Teachers will need to adapt the lesson, if needed, according to the understanding presented by the pupils.

## What pupils need to do:

- Pupils settle into the lesson and complete this on mini-whiteboards or in their class book. They will feed their answers back either as a whole class or to their partner.

### When to try it:

- At the start of any lesson for recall and connection to new learning. This could also be used in the middle of the lesson, as a form of assessment for learning.

### What to avoid:

- Pupils having no prior knowledge of the previous learning.
- Pupils trying to copy work from others.
- Pupils not being given clear instructions to complete the work in silence.
- Teachers not responding to the needs of pupils, who are unable to complete at least some of the questions set.
- Some pupils being able to answer all the questions quickly while other pupils have not started the work. Teachers need to be aware of setting appropriately challenging questions for all pupils.

### How do I know that it has worked?

- Pupils can answer or try to engage with the questions set.
- When pupils can feedback effectively.
- When pupils then use this learning to help with the rest of the lesson.

## Hinge questions

Use hinge questions to assess the learning and progress of the pupils. This allows for teachers to change the course of learning, if need be.

**Mini whiteboard (MWB):**
**What will happen when lithium reacts with fluoride?**

Explain on your boards in as much detail as possible.

This example is from science.

### What you could do:

- Ask pupils to answer the question, on mini whiteboards, in silence.
- Teacher circulates the room and assists individual pupils, if lacking in understanding.

## What you could do (continued):

- Using all this information, teachers can use responsive teaching and re-teach important aspects of the topic (ionic bonding) as needed.
- If all pupils have a good understanding of the topic, the teacher can then move onto how it applies to new learning.
- It is imperative that teachers use this as a tool to assess if the learning has been successful with all pupils in the class.

## What pupils need to do:

- Pupils can respond with various levels of depth and conceptual fluency/confidence.

## When to try it:

- When the next stage of learning involves moving onto new content that builds on previous learning.

## What to avoid:

- Teachers being unprepared for the range of responses from different ability pupils – teachers need to have planned the next steps, if all pupils do not understand the concept.
- Lack of teacher subject knowledge and understanding of how to address misconceptions.
- Pupils not being able to solidify their understanding of the topic, through their MWB.

## How do I know that it has worked?

- All pupils can correctly answer the question, in some form of detail.
- Pupils can apply this learning to their new learning.