



Engineering effective classroom discussions, questions and tasks that elicit evidence of learning



Discussion

- In pairs or groups discuss and make a list of all the ways in which you create questions for learners in your class...
- Prepare to share...



Plan key questions in advance

In the majority of cases our questioning is created as a result of what is happening in the class **as we teach and is very situational**

In order to ask questions that create thinking and learning we need to be **more strategic in the planning of our questions**

We generally know where our lessons are going (LI/SC) we should also be planning quality questions to further develop our pupil thinking...



Why Questions and Discussions?

Posing questions and engaging in learner discussion is important to teachers because:

It is an instant way of gathering evidence

Tells us what learners know or don't know

Allows us to further plan and develop next steps

Questioning and discussion should:

Cause thinking

Develop learning



Interesting Statistics?

- 90% of questions asked don't provide useful information for teachers or learners
- 90% of questions asked don't facilitate or elicit new learning or provide useful information for informing teaching - no new learning
- 35% of questions are to check understanding
- 55% of questions are managerial – e.g. who is finished etc.
- Less than 10% encouraged pupils to engage in discussion or thinking
- If your questioning is effective it leads to productive thinking which in turn causes new learning

(Ted Wragg/James Dillon, research on questioning)



Research – Visible Learning, J. Hattie

John Hattie's **visible learning research** shows where some of the biggest impact on accelerating pupil achievement sits...

Teacher Efficacy

Quality classroom discussion

Quality feedback

Quality questioning

Group working vs Individual working

Peer Teaching

Jigsaw methodologies

After school programmes



Expectations – HGIOS4

“How well do our questioning strategies enhance the learners’ experience and enable higher-order thinking skills?”

Challenge questions – HGIOS4 documentation



What we need to do...

Ask questions better

&

Ask better questions



How to ask questions better...

If we want our questioning to support thinking and cause learning then we need to find better ways to ask our questions...

- Teachers are still obsessed with getting the right answer
- Questioning which supports learning should encourage risk on the part of the pupil – it is ok to give a wrong answer



Some practical Ideas for asking questions better

- Use language to encourage discussion
- Use wait/think time
- Take the answer around the class – Basketball approach
- No hands up approach – random generator approach to answering
- Think pair share
- Minimal Encouragers
- Ask for Five
- Always respond positively – no put downs
- How to respond when an answer is “good”
- Keep the question going



Use Wait/Think Time

Wait time after question/answer – allows all pupils the chance to think things over

Teacher are still too obsessed with getting the right answer quickly.

Getting the right answer doesn't always show the right thinking- we must explore the thinking

Pace = engagement not speed

Speed = recall rather than deep thinking

Recall = lowest order thinking skill from Blooms



Basketball not Table Tennis

Pose



Pause



Pounce



Bounce



No hands up ...

Random approaches to answering

Why?

Alternatives can ensure everyone has given thought to an question/answer

Less confident pupils can't 'hide' or 'opt out'

Gives the teacher the chance to plan effectively 'on the hoof' according to responses



No hands up – alternatives...

Lollipop sticks

Random Generator

Magic Ball

Fist to Five

Traffic Light Cards

ABCDTF cards

12345 cards

Mini Whiteboards



Think, Pair, Share

A simple but well known technique:

Pupils are asked to list as many ideas/thoughts/answers as they can

(Think)

They then pool and compare answers with a partner

(Pair)

The pair then share their findings with the class

(Share)



Over to you...

Think, Pair, Share task...

Think about the tools/techniques we have looked at so far.

Put it into your context – what might you use and how

What are the benefits or pitfalls

Discuss with a partner your thoughts

Prepare to share with the group...



How to Ask Better Questions

As teachers our questioning technique can always be improved...

Teachers should be asking **fewer** but **better** questions

In an average career a teacher will ask **over a million** questions – however most of these questions have a closed, known answer – in other words they require little or no thinking and therefore no new learning



Some practical ideas for asking better questions

- Reflect on why you ask questions
- Play fewer guessing games with pupils
- **Ask more HOT or FAT questions**
- **Turn Closed questions into open questions**
- **Plan key questions in advance**
- **Use different question types – Open/Closed/Discussion/Hinge Point/Pop**
- Start with the answer and discuss why it is correct



Turn Closed Questions into Open Questions

Is this a polygon?

What are the properties of a polygon?

Which foods are good for us?

How do we know which foods are good for us?

What genre of film is Star Wars?

Why is Star Wars a Science Fiction film?



Discussion Questions

Questions that stimulate a discussion

Macbeth's character – discuss with evidence

CfE has improved education in Scotland – discuss

CLPL is enjoyable - discuss



HOT or FAT Questions

Are Dundee United the best football team outwith the Scottish Premier League?

What do you think?

Why do you think that?

How do you know?

Do you have a reason?

Can you be sure?

Is there another answer/way?



Over to you...

Using your own context think about some closed questions you might ask – make a list of 5 or so...

Reversion these questions to turn them into open questions and add some detail to turn them FAT



Hinge Questions

A hinge question is based on the important concept in a lesson that is critical to understand before you move on in the lesson

The question should fall during the lesson

Every student should respond within 2 minutes

You must be able to collect all responses and interpret results in 30 seconds

See Hand-out for further details and examples



Further Reading/Resources

Assessment for Learning: A practical guide for secondary teachers – Asking Better Questions **Ian Smith**

Skilful questioning: The beating heart of good pedagogy; J Doherty 2017
(Hand-out)

Dylan Wiliam on effective questioning in the classroom by Teacher Magazine:

<https://www.teachermagazine.com.au//articles/teacher-podcast-dylan-wiliam-on-effective-questioning-in-the-classroom>

