Teach First

Module 2 - ECT Training Session Outlines

Basic Induction Programme

This document contains the objectives for the ECT training sessions linked to module 2 session and a suggested approach for delivering each session.

Duration 1hr 20 minutes	Module 2- ECT training session 1 **Avoiding working memory overload**	Resources
ECF Links	2.4 Working memory is where information that is being actively processed is held, but its capacity is limited and can be overloaded. 2.9: Worked examples that take pupils through each step of a new process are also likely to support pupils to learn. 2b: Breaking complex material into smaller steps (e.g. using partially completed examples to focus pupils on the specific steps). 4g: Combining a verbal explanation with a relevant graphical representation of the same concept or process, where appropriate.	
Pre work for early career teachers	**Complete the following sections of the online curriculum** • Module 2 – Session 2: Introducing new knowledge to pupils • Module 2 – Session 3: Using worked and partially completed examples Teachers need to bring: • The example of how teachers have combined verbal explanation and graphical representation that they developed as part of the online study materials	
	Objectives: By the end of the session Early Career Teachers (ECTs) will have: • Reflected on their own practice regarding managing pupils' working memory load • Critically reviewed examples of combined explanation and graphical representation in practice • Developed a worked example for an upcoming lesson using a success criterion	
5 minutes	Introduce the session and share the session objectives Recap what working memory overload is. Use the Willingham diagram of the brain to support with your recap. Ask for the ECTs to share their reflections from the course on: • When they have caused working memory overload for their pupils • What caused this? • What was the impact on pupils? Did it have an equal impact for all pupils? Who was most affected if not?	Willingham, T., D., (2009). *Why Don't Students Like School?: A Cognitive Scientist Answers Questions About How The Mind Works And What It Means For The Classroom.* Jossey-bass.
30 minutes	**Combining verbal explanation and graphical representation**	

	Recap on how combining verbal explanation with graphical representation can reduce working memory overload. Share some examples from your own practice or from relevant literature. Share the following success criteria: The diagram that has been chosen and created has a justification from the teacher: • The diagram supports understanding of the concept • The diagram is clear and visible to pupils • The supporting explanation is clear, allowing pupils to understand the concept Ask teachers to work in pairs to share their example of combined verbal and graphical representations, use the success criteria to review it and improve it where possible. Circulate and address any misconceptions. Choose a few examples from the group and ask the teachers to share them, with their reflections on how they do and don't meet the success criteria, with the group.	
45 minutes	**Worked/partially completed examples** Recap on what worked and partially completed examples are and why they can be used during explanations to reduce the chances of working memory overload. Share an example from your own practice. Activity Consider an upcoming topic. How could you use a worked or partially completed example to support you to manage pupils' working memory load? Work with your partner to create a worked or partially completed example. When writing your example, consider the following points: • How is the worked example supporting you to teach your pupils what you want them to learn? • How does the worked and/or partially completed example support you to manage your pupils' working memory load? • How might you reduce the level of support over time? Circulate and address any misconceptions. Choose a good example and ask the teacher to share it, including their answers to the questions. Add to their explanation why you think it is a good example.	
5 minutes	Recap the session objectives Answer any queries or questions Remind ECTs about the pre-work ahead of the next session	

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Duration 1hr 20 minutes	Module 2 - ECT training session 2 **Building well organised mental models**	Resources
ECF Links:	2e: Linking what pupils already know to what is being taught (e.g. explaining how new content builds on what is already known). 2f: Sequencing lessons so that pupils secure foundational knowledge before encountering more complex content. 2h: Balancing exposition, repetition, practice and retrieval of critical knowledge and skills. 2i:Planning regular review and practice of key ideas and concepts over time. 3.7 In all subject areas, pupils learn new ideas by linking those ideas to existing knowledge, organising this knowledge into increasingly complex mental models (or "schemata); carefully sequencing teaching to facilitate this process is important.	
Pre work for early career teachers	**Complete the following sections of the online curriculum** • Module 2 – Session 4: Helping pupils remember Teachers need to bring: • the example of the topic that they added spaced and retrieval practice to as part of the online study materials	
	Objectives: By the end of the session Early Career Teachers (ECTs) will have: • Reviewed their example of spaced and retrieval practice created during the online study materials • Considered how to create or improve retrieval practice as part of their own curriculum • Created a retrieval activity that they can use in their practice	
5 minutes	Recap on the concept of a mental model. Recap on why spaced and retrieval practice support the building of long-term memory.	
20 minutes	Ask teachers to share their example that they created during the online study materials with a partner explaining the following points: • Where have you incorporated spaced practice and why? • Where have you incorporated retrieval practice and why? Circulate and address any misconceptions. Choose a good example and ask the teacher to share it, including their answers to the questions. Add to their explanation why you think it is a good example.	
55 minutes	Ask the teachers to work in groups to plan retrieval practice into an upcoming unit of work. If this is already common practice in the school, use this time to assess if what is planned is optimal for pupil learning. Consider the following success criteria by answering the questions in pairs: • You have time in your lessons to review learning at around a week and then monthly intervals • The retrieval task set asks the pupils to retrieve information from memory • The retrieval task set relates to the core concepts of the subject matter covered (as determined by the subject/phase teacher)	

	Where have you incorporated retrieval practice and why? What task would form the basis of the retrieval practice(s) and why have you chosen it? Circulate and address any misconceptions. Choose a good example and ask the teacher to share it, including their answers to the questions. Add to their explanation why you think it is a good example.	
5 minutes	Recap objectives Share the expectations for the next session	