Early Career Teachers Programme: ECT 22-24 Mentor Clinic 1 Workbook

KEEP
GETTING
BETTER

Welcome to the call. While we are waiting for other to join, please test the functions of zoom below.
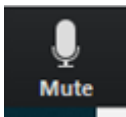
Zoom functions

Switching on your video
Look in the bottom left hand corner of the screen.
Click on the camera icon that says 'Start Video'
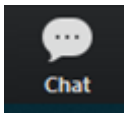 The icon will change and you will see your video.

Muting your volume
Look in the bottom left-hand corner.
Click on the microphone icon to mute.
The icon will change (with a red line through it) and your volume will be muted.

Using the chat function
Click on the quote icon, which says 'Chat'.
The chat box will display – type your name.
Press 'Return/Enter' on the keyboard – your comment will be sent for everybody to view. You can change who receives the message by changing the 'To' from 'everyone' to 'host'

Session aims and purpose

In this clinic we aim to deepen our understanding of effective models of classroom practice and teaching 'tasks' (for example, planning effective questions to check for understanding) which support ECTs to develop their understanding. We will also compare how models that are performance-based or task-based are different but have key features in common.

A summary of the session aims and their rationale is below:

Aim	Why?
Deepen understanding of effective models for ECTs	• ECTs are likely to benefit from carefully guided instruction such as models • Modelling is a key feature of instructional coaching
Compare performance- and task-based models	• Instruction and subject strands will have a greater focus on task-based modelling

Active ingredients of instructional coaching

> **A clear model of better –** Teachers are shown what the desired state should look like in practice to build their mental models. Without knowing what something should look like, the teacher is always going to struggle to re-create it in their own practice.

> **A bite-sized area for improvement** – The area of focus needs to be small in order for it to be modelled, understood, practised and the feedback to be focussed. If the area for improvement is too large, then it might not be able to be fully explored and practised, and misconceptions could develop.

> **Use of deliberate practice** – It is not enough for mentors and teachers to talk about and explore the area for improvement. Teachers need to practise the area for improvement, receiving feedback and re-practicing to support embed changes into practice.

> **A standardised routine** – The coaching should take place weekly for the incremental changes to, over time, have a larger impact on practice and for the teacher to see the impact of the improvement

Features of an effective model

> **Focuses the teacher's attention** – The model is concise and focused on the key elements. It avoids unnecessary additional information.

> **Builds the teacher's mental model** – The model involves making the mentor's thinking visible. It provides explicit links between theory and the practice being demonstrated.

> **Puts the step into the teacher's contexts** – The model is tailored to the teacher's particular class or subject content as well as their year group/phase.

Types of model

There are two types of model that can be used in instructional coaching. In a performance-based model, you as the mentor are performing what the step looks like in practice. Performance models are suitable for an step that focusses on how things are delivered in the classroom. For example, a set of instructions, an explanation of a concept, or responding to behaviour in the classroom. We have focussed on this so far as part of the training as the vast majority of behaviour steps are performance based.

However, as the focus switches to the instruction and subject strands, **task-based models** will become more important. A task model is where you use a teaching product to show the teacher what something should look like. It is suitable for steps that focus on developing a 'product' for teaching. For example, writing lesson objectives, a do now or starter activity or scripting a series of questions to check understanding.

Reviewing an example of a <u>performance-based model</u>

An ECT has a step which is to 'break a process down into logical steps for pupils'. The video is of a mentor modelling to the ECT how they would teach pupils how to form the letter 'a' by breaking the process of forming the letter down into logical steps.

A good exposition which **'breaks a process down into logical steps for pupils'** will have the following criteria…

> **Broken-down**: the process being modelled is broken down into distinct steps.
> **Logical:** the steps group parts of the process logically and are delivered sequentially.
> **Pace**: teacher does not speak too quickly or too slowly so pupils remain attentive.
> **Emphasis**: teacher uses their voice to emphasise the start of each step.
> **Clear and confident:** teacher's voice is authoritative, upbeat and can be heard from anywhere in the classroom but does not sound like shouting.
> **Open and aware**: as the teacher writes on the board, they are positioned so they can frequently scan the class.

Use the table below to review the model in the video. The model has been shared as an example of good practice, however, if you see a 'next time try' please write it down to share with the group.

Success Criteria	Write yes if the model showed this and no if it did not	Comments
Demonstration: The model provides a demonstration of the technique/strategy.		
Authentic: The model is delivered as though in front of a class, without 'breaking out' of role.		
Exposes thinking: The model uses a 'whole-part-whole' structure: first the whole model is shared, then it is broken down to show the success criteria, then the whole step is modelled again.		
Nothing extra: The model does not contain unnecessary additional information.		
Next time try…		

Reviewing an example of <u>a task-based model</u>

An ECT has a step which is to 'ensure the learning goals are achievable for pupils in a lesson'. The video is of a mentor modelling to the ECT their thinking process when they are planning backwards from learning goals and breaking them down in order to plan a lesson which is achievable for their pupils.

> Lessons which are planned to **'ensure the learning goals are achievable for pupils in a lesson'** will have the following criteria…
>
> > **Achievable**: pupils at this particular ability and age level can achieve this learning in the time available.
>
> > **Granular**: the knowledge, skills and concepts are broken down to make it clear what needs to be covered in the lesson.

Use the table below to review the model in the second video. The model has been shared as an example of good practice, however, if you see a 'next time try' please write it down to share with the group.

Success Criteria	Write yes if the model showed this and no if it did not	Comments
Demonstration: The model provides a demonstration of the technique/strategy.		
Authentic: The process being modelled is as close to teacher practice as possible.		
Exposes thinking: The model uses a 'whole-part-whole' structure: first the whole model is shared, then it is broken down to show the success criteria, then the whole step is modelled again.		
Nothing extra: The model does not contain unnecessary additional information.		
Next time try…		

Questions

How did the task-based model differ to the performance-based models you have seen?

What were the similarities?

What ensured that the model was effective?

Section Three: Option A: <u>Problem Solving</u>

What are the barriers to effective modelling on a weekly basis?

What have you found to be supportive?

What other solutions do you have?

Action Planning

In pairs, reflect on and consider:

What are the key features of modelling for ECTs – why are they effective?

What might/will you do differently when modelling to your ECT (now or when delivering task-based models)?

Section Three: Option B: Improving an example

We are now going to look at an example of a model that needs improving and spend some time individually making changes to improve it. It is a written case study. The step is taken from Behaviour week 5 – "Low Level Disruption" and the step that has been selected for the teacher is "Know the behaviours you expect to see from pupils at different points in the lesson, that are in line with your school's policy and communicate them clearly at the appropriate moment in your lesson".

The model to improve

(Mentor seated, talking to teacher at the table)

Imagine I am about to start my class working on an independent task. I want them to work on their own, however, before I do this, I want to remind them of the

behavioural expectations if they are stuck. In order to do that I might say something like "if you need help you need to put your hand up and I will come to you when I have finished helping other students". I would add "don't sit there and do nothing whilst you wait, try another question, but remember, don't call out."

Ok, now we've talked about what I would do, let's talk about the impact that that those phrases might have on the pupils; after that you can practise.

Success Criteria	Write yes if the model showed this and no if it did not	Comments
Model		
Demonstration: The model provides a demonstration of the technique/strategy.		
Authentic: The model is delivered as though in front of a class, without 'breaking out' of role.		
Exposes thinking: The model uses a 'whole-part-whole' structure: first the whole model is shared, then it is broken down to show the success criteria, then the whole step is modelled again.		
All criteria: The model exemplifies all the success criteria for the step (below).		
Nothing extra: The model does not contain unnecessary additional information.		
Step (within the model)		
Visible: behaviours are stated and expressed as visible actions, e.g. 'I should see you passing the resources along to each other' not just 'You need to work well together.'		
Concise and familiar: teacher uses the fewest words possible and ensures they are words pupils will understand.		
Clear and confident: teacher's voice is authoritative, upbeat and can be heard from anywhere in the classroom but does not sound like shouting.		
What was particularly effective?		
Next time try		

Space to improve/rework the model

Section Three: Option C: <u>Adapting a model to your own context</u>

> <u>**Contextualisation**</u> is a key part of your role as mentor because it: supports ECTs' ability to **apply the key features of the model to their own classroom practice**
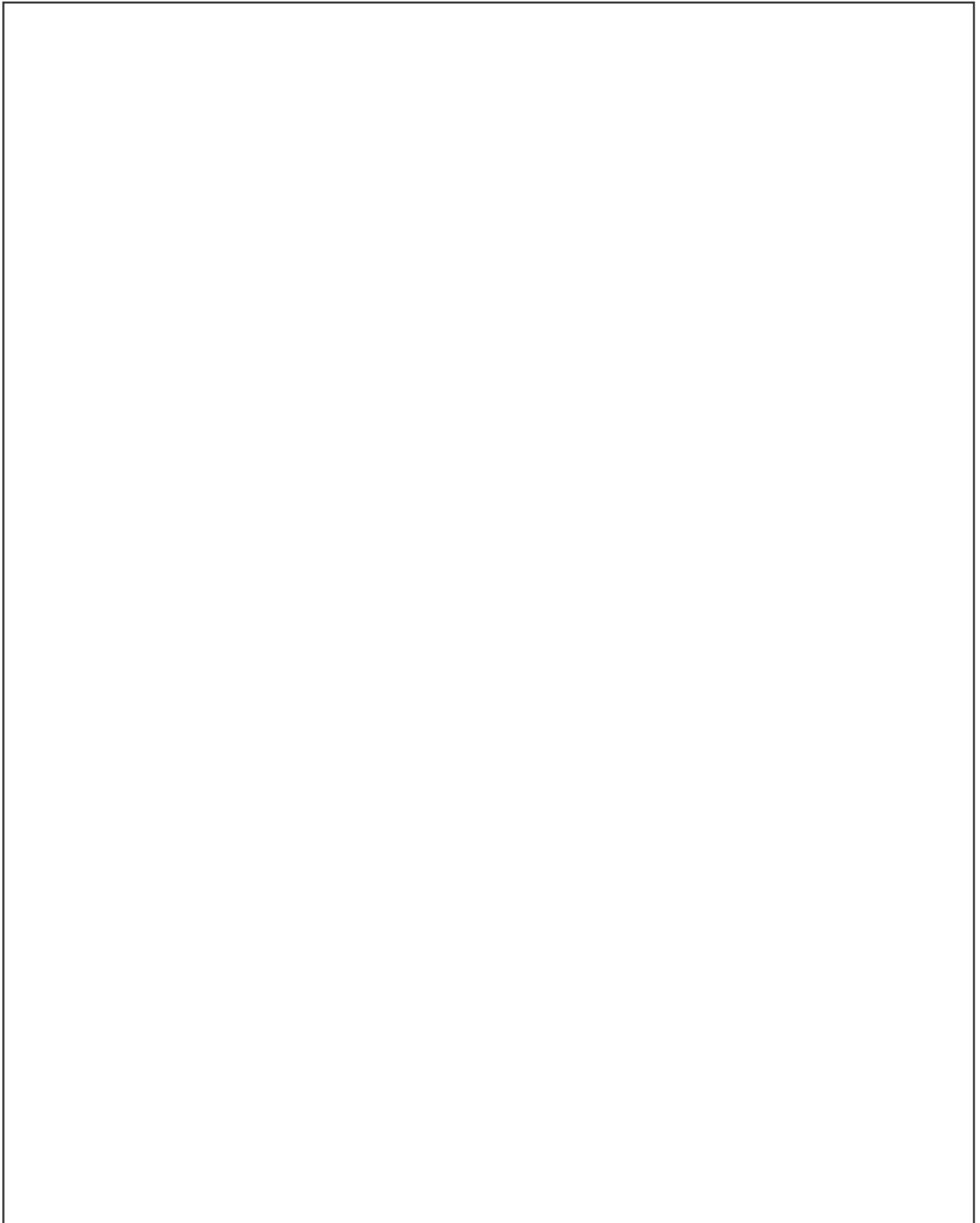
Choose from one of the steps below and plan how you will adapt the model you've seen in the clinic to suit your ECT's context/phase. Use the success criteria of a successful model to inform and support your thinking (on page 4 if you need to remind yourself).

Step 1: *to ensure the learning goals are achievable for pupils in a lesson, break down the learning goals to understand the complexity of the material to be taught to check if learning goals are achievable and amend them where necessary*

OR

Step 2: *to break a process down into logical steps for pupils*

Space to plan model adapted to your context:

Reflection and next steps

How has your thinking about instructional coaching developed through the session today?

What have you learned about modelling as part of instructional coaching?

Give an example where you would need to use a task-based model? When might you need to use a performance-based model? When might you need to use both strategies together?

What will you do differently over the coming weeks to put the new learning into practice with your teacher?

References

Furst, E. (2018). From neuroscience to the classroom. *ResearchEd* 1, no. 2 (September): 30-33

Mccrea, P. (2018). Expert Teaching What is it, and how might we develop it? Peps Mccrea. Available here: https://www.researchgate.net/publication/324759008_Expert_Teaching_What_is_it_and_how_might_we_develop_it_Peps_Mccrea/download

Willingham, D. T. (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.

Appendix 1: Improved model for Section 2: Option 2: Improving an example

Improved model

(Mentor seated, talking to teacher at the table)

> Imagine I am about to start my class working on an independent task. I want them to work on their own, however, before I do this, I want to remind them of the behavioural expectations if they are stuck. My expectations for this are always the same and pupils are familiar with them. I'm going to model how I remind pupils of these explanations.

[Mentor moves to front of the class, stood up as though speaking to a class of pupils, speaks in the same voice they would use in the classroom]

> In a moment you are going to start your independent work. You are going to work silently. If you need help put your hand up but try another question while you wait for me.

> Pens ready… off you go.

 [Mentor still stood up]

> Let's break down what I just did. Notice that the behaviours I wanted were visible – "put your hand up" instead of "don't call out", and "pens ready" instead of just "ready", this will allow me to check pupils are following my instructions.

> I was also concise, "try another question while you wait for me", instead of "don't sit there and do nothing whilst you wait, try another question".

> Finally, my voice was clear and confident.

> Let me run through the whole thing one more time.

[Mentor runs through model as though class is there]

Appendix 2: Self study material (to be completed prior to attending clinic 1)

Introduction

Welcome to the accompanying materials for Mentor Clinic 1. These materials, and the facilitated session, are designed to help you develop your instructional coaching practice, building on what you learnt during the mentor induction conference as well as your weekly coaching practice. We know how hard you are working to support your early career teacher(s) through instructional coaching; the aim of the mentor clinic is to help you get even more effective at doing this.

This course is an opportunity to review and develop some of the knowledge from the science of learning session in mentor induction. The facilitated session will link these ideas to 'providing a clear model of better', one of the active ingredients of instructional coaching. You will then apply this directly to your practice and receive feedback in the one-to-one 'coaching on coaching' session that you will book and attend during the second half of the Autumn term.

Working through this course before mentor clinic 1 will allow you to get the most out of the facilitated session, but the materials can be accessed at any time. This module should take around 15-30 minutes to complete.

Retrieval

The module begins with a quick quiz in the form of elaborative retrieval questions. This is because [research] shows that elaboration and retrieval are likely to be more effective than simply re-studying. Don't worry if you can't remember the content from the induction – if you need to, you can use the links to help.

Feel free to use pen and paper instead of typing into the boxes if you prefer.

Don't worry if you have forgotten some of the content from the induction conference. You can use the following links to support you if you have:

- [Willingham's simple model of memory]
- [Mental models] (page 9)

Reflection

1. Thinking about Willingham's simple model of memory, summarise the most important features/limitations of working memory.
2. How does long-term memory work alongside working memory?
3. What are mental models?
4. How are mental models formed?
5. How do the mental models of novices and experts differ?

Here are some possible answers to the retrieval questions. Take a few minutes to compare them to your answers. These are not intended as perfect, or complete solutions – you might have included

additional relevant information. The purpose of comparing them is to check your understanding as it is easy to pick up misconceptions.

1. Thinking about Willingham's basic model of memory, summarise the most important features/limitations of working memory.
   Possible answer: Working memory is where our conscious thought happens, it is how we pay attention to the environment around us, and where we 'bring things to mind' from long-term memory. Working memory is limited so we can only pay attention to around 4-5 pieces of knowledge at once; this means it is easy for it to become overloaded. When working memory is overloaded, we forget what we have been thinking about – it does not transfer to long-term memory. Although various training programmes exist which claim to enhance working memory, the evidence from cognitive science suggests that working memory should be considered to be fixed.

2. How does long-term memory work alongside working memory?
   Possible answer: Long-term memory is where we store our factual and procedural knowledge; its capacity is thought to be essentially limitless. Storing knowledge in long-term memory allows us to 'bring it to mind' in working memory in order to make connections between new ideas and things we already know. We can think of knowledge as being stored in mental models, which help us 'chunk' multiple bits of information together. Recalling a chunk of information takes up less space in working memory than the individual component parts, allowing us to think about more complex ideas. This helps overcome the very limited capacity of working memory. For example, trying to remember the digits 378674912 is quite tricky, but our understanding of place value allows us to think about it as, for example three three-digit numbers 378, 674, 912 reducing the number of pieces to remember and making it easier to recall.

3. What are mental models?
   Possible answer: Mental models refer to the way knowledge in our long-term memory is organised and structured based on what we know, believe, have experienced and learned.

4. How are mental models formed?
   Possible answer: Our mental models are not static. They are like webs of knowledge which evolve and decay as a result of our thinking and interaction with the environment.

5. How do the mental models of novices and experts differ?
   Possible answer: The mental models of experts are more extensive (contain more knowledge) and more connected (pieces of knowledge are organised and linked together). The diagram below illustrates that expertise exists as a continuum, with greater expertise being associated with more complex and connected mental models. The diagram also includes what we know about the forms of instruction most likely to benefit novices and experts.

Mental models of expert teachers

We can use Mccrea's work (2018) to further develop our ideas of mental models for expert teachers. Mccrea describes expert teachers' knowledge as covering the following domains:

Path – Knowledge of the pathway towards mastery of a curriculum, including: the concepts and process that pupils need to know at different stages of their journeys; how these are best represented and sequenced (Hattie, 2003; Westerman, 1991); as well as common obstacles to progress (Sadler, 2016).

Pupil – Knowledge of what their pupils know and don't know, what motivates and concerns them, and how these things change over time (Berliner, 2004, Schempp, 2002). The development of pupil knowledge is produced (and limited) by teacher assessment knowledge (Christodoulou, 2017; Wiliam,2016).

Pedagogy – Knowledge of how learning works and how to catalyse it. This area draws on fields such as cognitive and behavioural science (Deans for Impact, 2015) as well as personal experience, to help teachers build a mental model of the learner (Willingham, 2017b). It encompasses cognitive, emotional, social and cultural dimensions of learning.

Self-Regulation – Knowledge of how to analyse, evaluate and iterate their own knowledge and action towards increasing impact (Ericsson, 2015; Hattie, 2012). This includes an awareness of their own cognitive biases and how to mitigate them.
Mccrea stresses that all of these domains are important and are interlinked. For example, asking expert teachers to teach an unfamiliar class (reducing their pupil knowledge) will result in worse outcomes.

He also describes how this knowledge is organised:

Extensive – They have a comprehensive, connected and evidence-informed understanding of the domains outlined above (Ericsson & Pool, 2016).

Actionable – This knowledge is knitted together with an appreciation of their local context, alongside the cues they routinely encounter through pupil interaction (Schmidt, 2007).

Fluent – The vast majority of this knowledge can be accessed and employed rapidly, and with minimal effort (Findell, 2009).

Meaningful – Expert teacher knowledge is threaded with their personal and professional values. They care deeply about their craft, and about elevating the life chances of their pupils (Schempp, 2002). As a result, they take full responsibility for their actions (Berliner, 2004), and are driven to continually improve their practice (Hattie, 2003).
As we saw in the mentor induction, these features allow expert teachers to act in ways that have a great impact for their pupils. Our goal therefore is to help build the mental models of our early career teachers, in order to support them in developing expertise. As they are relative novices, they will not have extensive mental models. This means that in order to avoid overloading working

memory, we need to identify bite-sized areas for improvement and provide explicit models of what these look like. Mentor clinic 1 is designed to further develop your practice in this area.

Reflections

The final part of the facilitated session will consider potential barriers and solutions to effective modelling as part of instructional coaching. To prepare for this, spend a couple of minutes thinking about the questions in the reflection below:

1. What areas of your coaching practice are you pleased with so far?
2. What barriers have you encountered to effective modelling on a weekly basis?
3. What solutions have you found to any barriers/what have you found helpful in mitigating challenges?
4. When coaching your ECT, which modules have you found most challenging