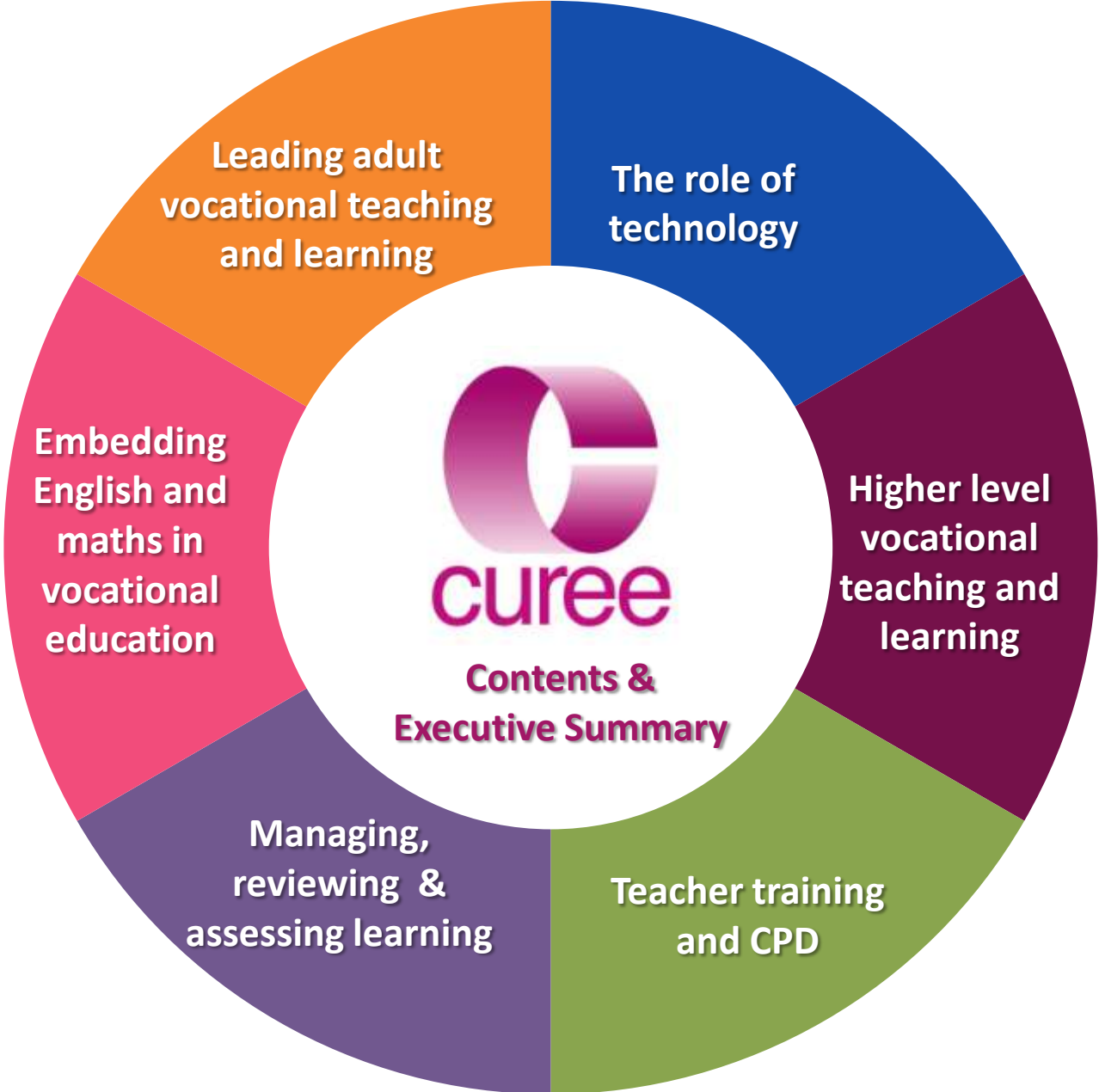


Submission to the Commission on Adult Vocational Teaching and Learning



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Executive Summary

Introduction

- CUREE has been researching teaching and learning for 15 years drawing on published evidence from across the world, reinforced by empirical studies into pedagogy and the curriculum in England. Our work has spanned the education system from early years to further education and skills, and HE. We work with colleges and schools across the UK, with national governments and agencies in the UK and overseas, and with international agencies such as OECD. Our support for evidence-based practice in the FE system has included regular publications summarising research relevant to leaders and practitioners (e.g. Inside Evidence for QIA/LSIS), and direct support for FE practitioner research.
- Over 15 years we have accumulated a large database of relevant and valid research on teaching and learning and we have interrogated this to create this response to the Commission's call for evidence. The last 10 years has seen a large and welcome increase in the volume and quality of research into teaching and learning. Regrettably, only a small proportion of it is located directly in the FE and skills sector. However, as many of the findings from research in other sectors (especially secondary) are relevant to FE, we draw on both school and post-school studies in this summary.
- We are conscious that the call for evidence is likely to result in the Commission and its Secretariat being buried in a mountain of words. In an effort to contribute as minimally as possible to this, we have used the presentation format for our submission. We hope this makes it more readable – it has definitely made it shorter. A full set of references to the sources cited can be found at the end. Where the sources are accessible online we have tried to provide the relevant hotlink.

How useful is the evidence?

CUREE has analysed the research against the 6 themes in the Commission's Call and has found a very wide variation in the volume, depth and detail of the evidence. This is reflected in the length and detail of our submission. Thus, our analysis reveals a rich set of useful, relevant and *practical* evidence on Managing Reviewing and Assessing Learning. The themes Leading Adult Vocational Teaching and Learning and Teacher training and CPD provided a lot of useful material with a considerable overlap between the two themes. This is probably not surprising as the literature on leadership in educational contexts emphasises the development dimension of the role. In contrast, the research in our database on the Higher Level Vocational Teaching and Learning theme was rather abstract, tended to focus on HE in FE and offered little by way of a guide to action. The evidence on Technology in education continues to show that technology is a valuable amplifier for a good teacher but cannot substitute for one. Note that we have not dealt separately with international evidence as the sources we have drawn on come from all over the world and, in particular from our systematic reviews of international research.

Overview and Implications

Overview

- CUREE's mission is to promote the use of research and evidence so we have focussed as far as possible on research likely to be of practical use to policy makers and practitioners. As noted earlier, this still varies considerably between themes. To try to make this submission more accessible and useful, we have pulled out the key practical implications as we see them for the Sector and for the Commission. For most themes, these are summarised on a single page but the richness of the material on Managing, Reviewing and Assessing Learning means that there are several implications pages (one for each sub-section) plus an overall theme summary.
- We have tried to include in our submission major national or international studies (where they exist) with high academic credibility and generalisability. These can be rather abstract and hard to relate to practice so we have chosen to illustrate them with case study style sources – often undertaken as a form of action research by FE practitioners. These are usually much easier to relate to but are inevitably very contextually specific. We hope the combination gives credibility and practicality, and gives us a direction for future action.
- For some themes, the research demonstrates a strong link between a particular pedagogic approach and learner success. Small group work, for instance, is shown to be a very effective teaching and learning technique but only if constructed carefully by the teacher in the form of co-operative groups. Small groups are widely used in the sector but co-operative groups sadly less so. This is a valuable example of a practice where the difference between effective and ineffective is small, subtle and quite hard to master.
- Our analysis of the research on literacy and numeracy shows a widespread consensus in the literature of the benefits of embedding English and Maths in vocational studies but also the difficulty of achieving this.

Implications for the Role of Technology

There is widespread evidence about increased engagement for many (although not all) learners from effective use of technology.

There are growing numbers of cases of effective use of technology for portfolio building, growing confidence in participating in assessment and making challenging learning experiences (because of cost, safety or complexity) real

Evidence about positive effects in terms of student outcomes is harder to identify, not least because of the pace of change in the technology itself. The role of technology enthusiasts and the preponderance of natural innovators amongst technology users is also hard to isolate from the other variables.

But in most cases the key determining factors are the skills of the teachers in designing appropriate tasks and creating appropriate learning pathways that are enhanced or made feasible by use of technology. So the evidence from Teaching and learning theme also applies to the evidence in this theme .

The Commission may wish to consider amalgamating the two or making strong connections between them in its findings – because without effective design of teaching and learning approaches the benefits of technology are difficult, if not impossible, to realise.

Implications for Higher level Vocational Education

There seem to be a range of learning, organisational and public relations benefits from offering higher level vocational learning in FE.

But there is also a need to develop a distinctive ethos and to overcome early resistance to more challenging learning experiences and requirements. Similarly there is a practical and cultural journey for FE colleagues to take in moving from a supportive to a more challenging role.

Achieving such changes in culture and practice is likely to have wider benefits for vocational pedagogy and, as the evidence for the teaching, learning and assessment theme shows, increasing the emphasis on challenges for all students is an important way to strengthen teaching and learning for all students.

Establishing an appropriate pedagogy for HE learning in FE contexts spans organisational boundaries. So, as for the embedding of LLN in vocational contexts, development work in this area provides an important opportunity for sector leaders to model leadership of CPD and professional work based learning for teachers through participation in R&D work that spans traditional boundaries

Implications for CPD and teacher education

The evidence about the types of continuing professional learning and development activities that make most difference to both teachers and their students is strong and well established. Practices that reflect such evidence are much rarer for a range of reasons relating to costs, logistics, CPD expertise, capacity and low expectations within the sector, and the need to thread together a series of structured professional learning activities over time.

Highly effective providers are already experimenting with the approaches that make a difference. CPD works in those settings because leaders align staff and student learning and take a direct and active interest in both. A lack of interest or expertise in either makes the other field of development vulnerable.

Nonetheless many of the most effective approaches to work based professional learning for teachers can be cost effectively “wrapped around the day job” provided proper structures, tools and protocols are put into place and supported by colleagues with specific expertise in relation to both the CPD process and its content.

- An effective first step for providers at early stages of development is to investigate in depth existing starting points, capacities and understandings about effective CPD.
- A second stage is the identification of sector based expertise in making use of effective CPDL strategies.
- A third step is the development of tools and protocols that model the teaching and learning approaches that are needed for students and to work out how to model these as part of staff CPDL
- A fourth step is to involve leadership teams and colleagues at all key levels across a provider in research and development work designed to identify, build on and recognise effective professional learning and CPD capacity and practices.

By taking an active role in leading this work in their institutions and in drawing in specialist expertise from elsewhere, Leaders will be killing two birds with one stone, they will be finding out what they need to know to lead effective teaching and learning and modelling the key practices involved in ways that will influence staff.

Implications for Managing and Assessing Learning - Overview

- The evidence here highlights many good practices and emphasises in particular the importance of the meaningful and contextualised opportunities that vocational education offers to learners.
- But it also reveals the opposite side to this coin; the evidence about the extensive nature of uninspiring teaching and learning is particularly worrying. It may well be that traditional forms of assessment and learning are obscuring important ways of involving learners and teachers in ongoing formative assessment. Similarly, the focus on vocational contexts seems to be obscuring ways of connecting learning with learners' lives beyond the vocational learning setting..
- This implies that the vocation specific traditions and practical demands of vocational education are a challenging environment in which to experiment with new and more inspiring, participative, independent and challenging approaches.
- The approaches highlighted by the evidence here would do a great deal to address this if tackled in depth and through effective approaches to CPD. It will be important for the Commission to model these practices in its own approach to communicating its findings and recommendations. We hope the Commission can:
 - avoid quick fixes without underpinning opportunities to explore why they do and don't work in different contexts, and:
 - Support offer opportunities to collect and analyse evidence about how changes in the teaching and learning offer from teachers is being experienced by students.
- What is sauce for the goose is sauce for the gander.... One of the most important routes for embedding such approaches in day-to-day vocational education is ensuring that the teachers expected to make these changes on behalf of their students get to experience their benefits first hand.

Promoting independent learning and assessment

Independent learning in vocational settings can undoubtedly be designed to benefit from the motivation that comes with applied learning.

But specific steps are needed to ensure learners develop meta-cognitive control of the learning process and what they are learning.

Similarly assessment strategies and traditions in vocational settings may obscure the demands of AfL or restrict full use of the quite demanding teaching and learning strategies that underpin independent learning, especially AfL.

Teachers may be talking the talk but the Commission can do much to enable them to walk the walk by promoting enquiry and coaching based, in-depth CPD opportunities for staff whose outputs can serve to illustrate best practice and some of the common obstacles along the way

Collaboration and talk

In order to secure the benefits of collaboration in practical, vocational contexts, small group discussions need to be structured. E.g. by involving groups of two to six students, using a specific stimulus to prompt/reveal a range of views, designing tasks that depend on a substantive discussion task that is meaningful

Securing high quality talk requires planning and preparation by both staff and students and the relevance of such talk to vocational learning may not always be immediately evident to students. Consistency of approach between teachers and exploration with employers of the benefits to them of learning that involves this approach can both be used to reinforce potential benefits.

The evidence argues for the Commission promoting these demanding but effective approaches to teaching and learning. It also suggests that the Commission could model their use through its consultations with the profession about its findings and next steps.

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Thinking skills

Thinking skills matter in their own right in vocational contexts just as much as in non vocational ones. They are also important skills in ensuring that students access learning opportunities in appropriate depth.

Strategies that are effective in helping students develop effective thinking skills have much in common with those that are important in securing depth in collaboration and developing the rare but important exploratory talk in learning settings.

The Commission can help to build a virtuous circle of teaching and learning strategies, tools and practices by promoting all three, illustrating the powerful connections between them and highlighting some of the environmental conditions in the sector that encourage surface level adaption of what are seen as “techniques” and militate against exploration in depth. Key here is enabling teachers to develop an understanding of not just what works but why it does so that they can interpret approaches from their students and contexts and make connections between them.

Challenge

The focus in the sector on the needs and affective concerns of sector learners and the demands of the vocational learning context seem to dominate the agenda and risk suppressing the development of specific and explicit strategies for ensuring that every learner is appropriately challenged.

The Commission might want to probe further the reason for the lack of emphasis on challenge and the lack of evidence about use of enquiry and open ended problem solving as a learning strategy across the sector.

A supportive environment

There is extensive evidence about a wide range of sophisticated practices for creating a supportive learning environment in vocational settings.

The identity of learners plays an important role here and many teachers in the sector are skilled in mobilising learners' desire to become scientists, engineers etc to create an effective and focussed classroom context.

The Commission may want to consider how to build on and harness this strength to ensure it is applied consistently and in particular is used to encourage learners to develop literacy, numeracy, thinking and collaboration skills as well as vocation specific ones

Vulnerable learners

The evidence about effective approaches to teaching and learning support for vulnerable learners seems to be small scale and, understandably to focus on particular groups and contexts

This seems to be an areas where technology has a particular part to play and where personalisation of learning is key.

Many of the strategies highlighted throughout this theme will be helpful to teachers in responding to such needs but will need specific contextualisation in this context.

The Commission may wish to encourage, small scale studies of a wider range of cases followed by a suitably theoretically underpinned meta-analysis to reveal and develop current best practice.

Implications for English and Maths in adult and vocational education

The key message from the evidence about literacy and numeracy within vocational education is that it is crucial to embed LLN in vocational contexts and to support such embedding through partnerships between literacy and numeracy specialists and the relevant vocational domain.

Although complex to achieve and requiring of a mix of specialist expertise, this approach also creates opportunities to model practices consistent with evidence from other themes, specifically relating to the leadership of teaching and learning and to CPD. The inter-disciplinary nature of the development work creates a natural call for leadership spanning organisational boundaries. It also offers a context in which working out how to meet aspirations for students via exploration similarities and differences between:

- literacy and numeracy,
- both of these and a given vocational context; and
- will naturally propel colleagues towards depth and effectiveness

Implications for the leadership of teaching and learning

Leadership evidence suggests that the Commission should, above all else, encourage leaders in the sector to take a continuing interest in the quality of teaching and learning in general, and model this explicitly by expanding their own knowledge and understanding of effectiveness through enquiry.

The strategies that have been shown by robust evidence to make more difference than anything else leaders do over time highlight in particular:

- making explicit what and how they are learning about effective teaching and learning and CPD; and
- encouraging all leadership colleagues to do the same

This modelling of commitment to continuing improvement has both instructive and symbolic benefits and works most powerfully when it involves leaders in enquiring into effective teaching and learning and CPD – in some ways in treating their staff as their class.

Other important leadership strategies for strengthening teaching and learning include: making regular classroom visits, providing effective formative and summative feedback and exploring issues that cross organisational boundaries.

Evidence by Theme

In the following sections, we set out in a little more detail, the evidence we have analysed against each of the Commission's themes. You can jump directly to an individual theme by clicking on the Theme title below. Or just press <next> to go through each theme in sequence.

- [The role of Technology](#)
- [Higher Level Vocational Education](#)
- [CPD and Teacher Education](#)
- [Managing, Reviewing and Assessing Learning](#)
- [Embedding English and Maths in Vocational Education](#)
- [Leading teaching and learning](#)

Teacher training and CPD in adult and vocational education

Explore the evidence:

- [Prevalent models of CPD](#)
- [What constitutes effective CPD?](#)
- [The role of leadership in effective CPD](#)
- [The role of the specialist in effective CPD](#)
- [Linking CPD with student / client needs](#)
- [Creating an ethos of continuing development and continuous improvement](#)
- [Implications](#)
- [References](#)

Prevalent models of CPD

One-off sessions remain a common approach to CPD, especially via:

- INSET days and workshops

But more sustained approaches are beginning to emerge and include:

- CPD integrated with action plans for improvement
- Action research / enquiry projects

Although the trend has moved away from one-off short CPD courses in recent years to more integrated CPD programmes linked to personal and wider action plans the pure INSET model still persists largely due to inertia and low expectations on the ground as well as costs and logistics associated with the alternative models (Villeneuve-Smith *et al.* 2009).

What constitutes effective CPD?

Effective CPD linked to positive student outcomes involves:

- Structured, sustained dialogue to enable reflection rooted in evidence of experiments with learners
- Scope for participants, via collaboration, to identify own CPD starting points (within a given framework)
- Goals set via lens of aspirations for students
- Effective use of time to embed practices in classrooms e.g. in-session planning, use of peer teaching
- Observation & deconstruction/feedback from specialists (what isn't within reach on one's own)
- Observation for learning - learning to learn from looking
- Tools to scaffold quality
- Modelling
- A pedagogy and a curriculum for staff (CUREE 2010)

The role of leadership in effective CPD

The most effective leadership contribution to establishing the trust necessary for in-depth professional learning was for leaders to directly participate in practitioner learning and development in both a facilitating and learning role. In CUREE we refer to this as “leaders treating the staff as their class”.

Leadership of and participation in CPD was identified by Robinson (2007) and colleagues ([CUREE 2009](#)) to be the leadership activity with the largest impact on improving teaching and learning in their institution.

A study which investigated leader behaviours in university departments with consistently high quality teaching found they:

- Led by example – including developing their own teaching skills, modelling proposed pedagogies and articulating the pedagogic rationale for their introduction
- Learnt about other educational approaches as models
- Built a community of practice – including establishing forums for talking about teaching
- Recognised and rewarded teaching development effort – e.g. through teaching awards (Gibbs *et al.* 2007).

[Continue](#)

The role of leaders in effective CPD: facilitating relationships

Studies (CUREE 2010) highlighted the importance of leaders:

- Having an open door policy, and working closely with and listening to their staff
- Creating a 'safe' environment which allows practitioners to discuss openly what has not gone so well as they develop practice.

Leaders' support of their colleagues' CPD entailed:

- Helping practitioners plan and co-ordinate the development of their practice and providing formative feedback
- Developing particular specialist skills for supporting CPD
- Being effective practitioners themselves (Gibbs *et al.* 2007). It was important that leaders had the skills to support practitioners in their work as teachers and had effective pedagogic skills themselves.

[Continue](#)

The role of leaders in effective CPD: planning

Effective planning needed to take account equally of national and local priorities, as well as individual practitioner and student needs. Programmes tended not to deliver the improvements expected when:

- Leaders relied too heavily on examination awarding bodies to provide staff development (Ofsted 2006)
- Practitioners were left to make their own development arrangements as self-regulating professionals (Timperley *et al.* 2007)
- Institutions put too much emphasis on achieving national objectives at the expense of local priorities (Ofsted 2006).

Ofsted (2006) sets out the strategic steps for planning and beyond as the logical chain of:

- Identifying institution and staff needs
- Planning to meet those needs
- Providing varied and relevant activities
- Involving support staff alongside teaching staff
- Monitoring progress
- Evaluating the impact of professional development.

The role of the specialist in effective CPD

Effective specialist support consisted of synthesising expert knowledge about teaching and learning, and knowledge of teachers' existing skills and context. Specialists achieved this through a mix of input of new knowledge and skills, and facilitation of changing practice which helped teachers understand:

- Underpinning rationale or “theory” and how this translates into practice
- Pedagogical content knowledge
- How students learn particular curricula
- How that learning should be assessed in order to focus teaching.
- The limitations of current orthodoxies or practices into the context of wider evidence about what is possible

Specialists provided direct support through modelling, workshops, observation, and coaching. They also set up peer collaboration in order to enable experimentation and risk taking within a supportive network. Peer collaboration which specialists enabled and encouraged included:

- Peer observation
- Peer coaching
- Sharing practice
- Joint planning and debriefing. (Cordingley *et al.* 2007, CUREE 2010)

Linking CPD with student/client needs

Good quality CPD involved close alignment between student learning and professional learning, with some evidence that where professional learning is not focused around student learning, CPD is not likely to be effective.

Specific analysis of student performance or practitioner-student relationships can:

- Provide the motivation to engage in CPD
- Inform its design
- Help practitioners understand the impact of their changed practice.

Closer attention to students' experience was also found to be the catalyst for helping practitioners develop a greater appreciation of their students' capacity to learn and therefore greater confidence in their own ability to make a difference. (Cordingley *et al.* 2007, CUREE 2010)

Creating an ethos of continuing development and continuous improvement

Successful organisations had an ethos of professional learning in which teachers worked together and with leaders over time to develop their practice to improve student outcomes. CPD in such organisations was not a series of bolt-on activities but part of a whole organisation strategy based on collaboration and a culture of enquiry.

Individual practitioners engage better with CPD when their professionalism and agency is harnessed. This means engaging with their underpinning values and beliefs, and their understanding of the needs of their students. Leaders and specialists engaged practitioners in long-term professional learning and development by:

- Using the opportunity of performance review for practitioners to discuss their current practice, decide on professional development needs and consider longer term career aims
- Identifying own goals and objectives from within a CPD programme menu
- Setting the agenda for meetings during the course of a CPD programme
- Deciding the extent of their involvement in a particular CPD programme (i.e. deciding for themselves what it was they wanted out of the programme)
- Creating own resources and teaching units. (Cordingley *et al.* 2003, Cordingley *et al.* 2007, Ofsted, 2006, CUREE 2010)

Implications

Sector organisations may already have a good deal of knowledge and expertise about work-based professional learning that may or may not be brought to bear in CPD.

Leaders will themselves benefit from CPD or work-based learning activities with specialist support in relation to the focus of CPD that makes most difference to staff and to students. ([Bell et al. 2012](#))

Many of the most effective approaches to work-based professional learning for teachers can be cost effectively “wrapped around the day job” provided proper structures, tools and protocols are put in place and the work is supported by colleagues with specific expertise in relation to both the CPD process and its content.

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Managing, reviewing and assessing learning

In this section we explore some of the teaching and learning strategies that are known to be powerful in supporting positive learner outcomes. Some of them are widely recognised and effectively used in the FE sector, whilst others remain less well known and implemented. We also consider factors, such as the learning environment, that can affect learning and explore additional and alternative strategies that can support progress of different (including vulnerable) groups of learners.

Though there are examples of creative use of effective pedagogic approaches (some of which are outlined below) the principal criticism of teaching and learning in the sector – made by researchers and inspectors alike – is that it is too often, ‘uninspiring’. For example, in their review of practical and vocational education Lucas et al 2010 concluded that *‘the range, repertoire and flexibility of vocational pedagogy is often too narrow. While the context [such as workplace] may be engaging the methods used can be too passive and uninspiring’*. Similarly, 2010 Ofsted inspections found that uninspiring teaching was present in many work-based learning contexts. Reasons for this can be found in the character of the vocational curriculum (e.g. the specificity of context, the frequency and amount of high-stakes assessment) but the evidence outlined below suggests that it doesn’t have to be this way.

Explore the evidence:

Teaching and learning strategies

[Supporting independent learning](#)

[Assessment](#)

[Collaborative learning, group-work and peer support](#)

[Learner dialogue](#)

[Thinking skills and meta-cognition](#)

[Challenge in learning](#)

Some of the factors that affect learning

[Classroom climate and relationships](#)

[Learner dispositions and beliefs](#)

Supporting the progress of *all* learners

Implications - [1](#) [2](#) [3](#) [4](#) [5](#) [6](#)

[Implications overview](#)

[References](#)

Independent learning

Supporting learners' responsibility for their learning has been high on the priority agenda in FE for a while now. Independent learning is often linked with learners' ability to engage in learning successfully and make progress. Independent learning skills are also crucial for those who wish to access higher level learning.

What is independent learning?

- The key feature of independent learning is the shift of responsibility for the learning process from the practitioner to the learner
- Independent learning does not merely involve learners working alone, practitioners have a key part to play in enabling and supporting independent learning
- This involves learners acquiring an understanding of their learning, being motivated to learn and collaborating with practitioners to structure their learning environment

Independent learning is closely linked with **self-regulation**. It includes:

- Planning
- Self-monitoring
- Controlling the pace and direction of the work
- Evaluation.

Self-motivation is also necessary for successful independent learning

Positive relationships between teachers and pupils, **based on trust** is another essential element of independent learning ([Meyer et al. 2008](#))

[Continue](#)

Skills of independent learners

Learners need to acquire a range of skills in order to engage successfully in independent learning. These include:

Cognitive skills: e.g. being able to construct informal rules for solving problems; classify objects according to given criteria; form hypotheses; and reason logically.

Meta-cognitive skills: learners being able to articulate *how* they learn, and to identify key activities essential for learning such as listening, remembering, applying previously learnt knowledge, making connections, etc.

The context specificity of vocational learning can militate against development of meta-cognitive control of learning; students and some staff are often focused on the specific requirements of given work settings in ways that inhibit the identification of underpinning principles

Affective skills: these related to regulating and managing one's own feelings within the learning process. Motivation is the most important affective attribute in relation to independent learning ([Meyer et al. 2008](#)).

[Continue](#)

Teaching and learning strategies that support independent learning

Research highlights a number of strategies that supported independent learning including:

Scaffolding, i.e. providing (and then gradually removing) supportive activities and frameworks that structure learning

Providing learners with opportunities to **self-monitor**, which is dependent establishing goals and receiving feedback from others and from oneself

Practitioners **modelling learning behaviour**, e.g. showing learners how categorising information makes it easier to remember

Developing language for learning, which helps learners become more aware of the steps involved in learning, understand their own learning and helps them make explicit and thus share their thinking

Providing feedback, particularly on work done beyond class settings is linked with learners' improved confidence in working independently and helps them develop the reflective aspect of independent learning ([Meyer et al. 2008](#))

[Continue](#)

Promoting independent learning: a case study

A sixth form college practitioner explored how modelling organisational skills can support independent learning.

The practitioner decided to model for learners how to keep their work organised by providing them with a ring binder folder with resources and tools structured in line with the exam specifications. It also included revision techniques and provided links to useful websites and resources. The practitioner explained the structure, content and focus of each section.

The learners made good and consistent use of their folders throughout the course. They found it easier to understand the nature and structure of the course and were able to plan their work. Approx 30% of learners did some independent work (not set by practitioners) outside lessons as a result of using the resource. Using the resource also prompted a significant proportion of learners to engage in revision more and do it more effectively ([Hopkins 2010](#)).

Independent learning: how assessment can contribute

Another powerful way of motivating and supporting learners to take control of their learning and enable them to become skillful at it is by making use of formative assessment, also known as assessment for learning (AfL). AfL practices include:

- Effective questioning that probes students' understanding
- Comment-only marking that structures students' learning
- Sharing criteria with students to help them understand what counts as success
- Peer assessment that helps students learn how to give and take constructive criticism and advice that will help them to progress ([Torrance et al. 2005](#))

Evidence shows that AfL can be a powerful way of improving the quality of teaching and learning. Yet, [Sachdev et al. \(2007\)](#) argued that despite its relevance and importance for the sector, AfL practice in FE wasn't widespread. In the schools sector researchers have identified that as little as 20% of the full potential of AFL was being used systematically some 5 years after its initial introduction.

[Continue](#)

Use of AfL in FE: some examples

Here are some examples of how AfL can be used easily and effectively in adult and vocational education.

AfL doesn't have to be difficult to initiate

In an adult learners' mixed level Spanish lesson, the learners held up a red or white card to show whether they understood the correct use of present tense reflexive verbs. The teacher then asked them to write on their cards what they felt confident with, and what they would like to focus on a little more. The teacher then used the cards to plan the next lesson ([Ofsted 2009](#)).

AfL strategies and benefits

Elsewhere, a group of practitioners experimented with a range of AfL strategies in their A level Business study teaching. These included:

- Studying model answers and mark schemes
- Formulating assessment criteria collaboratively with learners
- Self- and peer-assessment
- Structured dialogue.

By the end of the twelve-week period the participating learners had improved grades in their assessed work, with one learner leaping from an E grade to grade A ([CUREE 2009a](#),p.5). At the same time, the learners 'have begun to appreciate that becoming actively involved in their education by developing the ability to assess their own progress has empowered them to take control of their learning and identify what actions may be needed to move on to the next level' ([Alvarez 2010](#), p.12).

[Continue](#)

Summative assessment

[Torrance et al.](#) (2005) completed a comprehensive study of different methods of assessment in FE and their effect on learners.

The research found that:

- Whilst a broad range of assessment methods were seen as appropriate by learners, extensive written work was disliked and avoided, except by those studying at A level. Multiple-choice online tests were very popular.
- Making the assessment criteria clear to learners helped their achievement and retention

The researchers also found that extensive use of assessment, summative in particular, may come to dominate the learning experience ([Becta 2006](#), [Becta 2007](#)).

Another study arrived at similar conclusions, highlighting that summative assessment can:

- Lower learners' self-esteem
- Favour transmission teaching
- Create high levels of anxiety, especially amongst older students ([Harlen and Deakin Crick 2002](#))

The study also found that emphasis on summative assessment is connected with learner orientation towards grades rather than valuing learning for its own sake ([Harlen and Deakin Crick 2002](#)).

[Continue](#)

Summative and formative assessment: the nuances

Many practitioners share concerns about excessive use of *summative* assessment approaches. TLRP project Literacies for Learning for example found that tutors often feel constrained to use existing assessments, even though changing them would benefit students' learning ([TLRP 2006](#)).

But it's not all doom and gloom by any means. Research evidence shows that there are a number of ways in which practitioners and adult and vocational education providers can increase the positive and decrease the negative impact of *summative* assessment. These include e.g.:

- Explaining purpose of the assessment and providing feedback from testing focused on further learning; and
- Using assessment to convey a sense of learning progress to learners ([Black et al 2003](#)).

In the same way as summative assessment can be used with positive and negative effect on learning, so can *formative*. Research in schools has shown that the same AfL activities can lead to very different kinds of learning. Whilst teachers working in the spirit of AfL encourage learners to become more independent, critical learners, others use AfL activities to transmit knowledge and skills.

[Continue](#)

AfL: Capturing the spirit or following it to the letter?

Working in the spirit of AfL

A group of college tutors worked on the AfL approaches of questioning and oral feedback. They aimed to reduce the amount they talked in lessons, encourage more engagement and promote learner independence. The tutors' approach stemmed from the belief that whatever the learners' starting points, they had the ability to progress. They made addressing learners' needs and interests a priority over following a predetermined scheme of work. The tutors organised collaborative working and peer and self-assessment activities to great effect. Learners in one of the groups were observed to spontaneously check and mark each other's work. They had developed the habit of looking at each other's work and commenting on it, and making suggestions for improvements.

Following AfL to the letter

On the face of it, the approach adopted by tutors working in an adult education centre was similar to the one described above. Continued dialogue between the learners and between the tutor and learners was important to them. But often it was simply concerned with subject knowledge (such as the correct use of apostrophes or ways of calculating percentages) or about assessment (such as the assessment criteria of one of the national tests). Similarly, although the practitioners increased the amount of group activity in their work, they saw it primarily as a superficial change to their existing practices rather than a fundamental change in approach. Challenging approaches such as group discussion were never used due to the tutors' concern about undermining their learners' confidence ([Derrick et al. 2009](#)).

Implications – independent learning and assessment

- Independent learning in vocational settings can undoubtedly be designed to benefit from the motivation that comes with applied learning.
- But specific steps are needed to ensure learners develop meta-cognitive control of the learning process and what they are learning.
- Similarly assessment strategies and traditions in vocational settings may obscure the demands of AfL or restrict full use of the quite demanding teaching and learning strategies that underpin independent learning, especially AfL.
- Teachers may be talking the talk but the Commission can do much to enable them to walk the walk by promoting enquiry and coaching based, in-depth CPD opportunities for staff whose outputs can serve to illustrate best practice and some of the common obstacles along the way

Collaborative learning and peer support

Collaborative and peer-assisted learning is well-evidenced as one of the most powerful teaching and learning strategies. For example, in their Toolkit of strategies to improve learning developed for Sutton trust, Higgins *et al* (2011) argued that **peer-tutoring or peer-assisted learning**, i.e. when learners worked in pairs or small groups to provide each other with explicit teaching support, were ‘high impact and low cost’ strategies.

Similarly, Hattie (2009) found that “**reciprocal teaching**”, an approach where learners temporarily take on the role of a teacher to support the development of their peers’ understanding through dialogue, had a very high effect size (0.74).

Studies of the effectiveness of **small group-work approaches** within whole-class teaching in post-compulsory education (Lou *et al.* 2001, Springer *et al.* 1999 cited in Hattie 2009, p.95) found that these had medium to high effect on learners’ achievement, attitude and persistence.

Regardless of which approach to learners supporting each other practitioners opt for, research suggests that the role of the teacher in supporting reciprocal teaching, peer-assisted and other types of collaborative learning is crucial (Hattie 2009, Higgins 2011).

The slides that follow explore key approaches and how they are used in adult vocational teaching and learning.

[Continue](#)

Peer-supported learning

Peer feedback

Peer feedback is one approach commonly used by effective vocational and adult education practitioners to structure peer assisted learning. Some experiment with online, shared workspaces where learners can upload writing and comment on others' work ([CUREE 2011](#)).

Understanding of the assessment criteria was key to making peer marking successful.

The approach seems to work particularly well for learners who need to develop their skills of essay writing or providing explanations and detailed responses is part of the assessment requirements for qualification purposes ([CUREE 2011](#)).

Practitioners identified some challenges to using peer-marking. Although most learners were positive about the method, some were not impressed by it because they viewed marking work to be a teacher's responsibility.

Peer teaching

Developing a set of resources to support pairs of learners teaching each other, was an approach trialled by a Sixth Form college Maths practitioner. The resources included thorough solutions so that all learners, regardless of their prior achievement, could take on the teaching role. The practitioner also added prompts and comments, similar to the ones he commonly used in his teaching, to allow learners explore their understanding ([Herring 2011](#)).

Small group-work approaches

Bennett et al's (2004) systematic review of research into the use of small-group discussions found that a number of factors had the potential to make a difference to the effectiveness of group-work including:

- The composition of the groups
- The nature of their set tasks
- The ways in which the discussion is scaffolded.

The use of small-group discussions resulted in a significant improvement of students' understanding of evidence when:

- Students in the groups held diverse views and understandings; and
- The use of an external stimulus prompted or revealed students' conflicting views.

They also found that gender role helped shape the interaction style for developing students' explanatory understanding. All-male groups confronted the differences in their individual predictions and explanations, all-female groups searched for common features, mixed groups progressed by turn-taking.

In order to secure the above mentioned benefits, small group discussions need to be structured.

The model tried by the researchers:

- Involved groups of two to six students
- Had a specific stimulus (e.g. a newspaper article, video clip, prepared curriculum materials)
- Involved a substantive discussion task of at least two minutes
- Had a specific purpose (e.g. individual sense-making, leading to an oral presentation or to a written product) ([Bennett et al 2004](#)).

Collaborative learning approaches

How does co-operative group work differ from small group work?

Research shows that it is important to distinguish between collaborative or cooperative group work and more traditional small group approaches. In co-operative groups the need to co-operate has been built into the *requirements of a structured group task*. By contrast, in small group work, there may be no specific requirement that students work together and, in fact, they may work individually on tasks for their own ends, even though sitting in groups.

In co-operative learning, tasks are designed to ensure that learners:

- Work together as a group
- Exchange ideas and resources
- Contribute to group discussions
- Challenge others' reasons and understandings
- Discuss alternatives, and
- Accept responsibility for the group's decisions ([Gillies 2004](#), [Kearney 2004](#), [Gillies & Boyle 2005](#))

Collaborative learning of this kind supports the development of learners' understanding and their thinking skills, and contributes to them taking more control for their learning. Frequently teachers specifically teach the group work skills demanded by the tasks they have designed quite explicitly.

[Continue](#)

Collaborative learning and talk: a case study

One study (Swan 2006) explored cooperative, discussion-based learning of algebra in over 40 FE colleges.

The project was developed according to a set of principles, including that:

- Lessons would consist of rich, challenging group tasks
- Teaching would emphasise methods rather than just answers
- Learners would create links between mathematical topics
- Learners would be encouraged to make mistakes and learn from them

One of the activities within this approach involved groups of students reflecting on common generalisations. They categorised statements (expressed in words or symbols) under the headings 'always true, sometimes true and never true', and providing justification and explanation to each. A typical statement was "if you multiply 12 by a number, the answer will be greater than 12" or " $12a > 12$ ". Each group had to create a poster summarising the outcomes of them exploring generalisations.

Practitioners who were involved in the project and encouraged their students to discuss their existing knowledge and misunderstandings were much more successful at improving their students' learning and maintaining their confidence and motivation than those who simply conveyed facts and skills ([Van Grinsven & Tillema 2006](#)).

Collaborative learning and talk often become part of a single learning strategy as many group-work and reciprocal teaching strategies are discussion based. The next set of slides consider how talk can be structured to contribute to learning most effectively.

Dialogue

Impact of structured dialogue

There is a strong body of evidence indicating that structured dialogue can have a positive impact on learner success, including *improved*:

- Content learning
- Understanding
- Communication skills
- Control over their own learning.

Structured dialogue can support a range of affective changes including:

- Increased learners' interest in the subject
- Greater motivation towards learning
- Enhanced confidence and self-esteem (CUREE 2010).

[Continue](#)

Exploratory talk

Not all talk between learners is equally effective. The term 'exploratory talk' (Wegerif et al 2004; Mercer et al, 2004; Mercer & Sams 2006) is often used to describe educationally effective talk.

Exploratory talk occurs when group members engage critically, but constructively with each others' ideas. Statements and suggestions are offered for joint consideration. These may be challenged and counter-challenged, but challenges are justified and alternative hypotheses are offered (CUREE 2010).

With exploratory talk, reasoning is more visible than with the other two types of talk: cumulative and disputational talk.

With *cumulative talk* speakers build positively but uncritically on what others say.

Disputational talk is characterised by assertions, disagreement, short exchanges and individualised decision-making.

[Continue](#)

Strategies that make dialogue effective

Evidence from the sector and wider research is consistent: effective talk does not happen by itself. Practitioners had to use a number of techniques to ensure all learners participated and took risks in arguing a point and to guide them in how to use materials. During effective talk practitioners also challenged learners through questions and tasks to engage in higher order thinking.

Overall, the strategies described in the studies facilitated structured dialogue in four ways:

- Creating opportunities for all learners to express their ideas
- Promoting thinking at a higher level through questioning
- Creating a supportive context of mutual respect and regard
- Providing opportunities for learners to work in pairs and small groups to practice dialogue as well as providing guidance that enabled them to make such discussions productive (CUREE 2010).

Research suggests that *establishing and/or negotiating ground rules* is often an important first step in increasing learner participation in talk and creating a safe environment for learners to express their ideas. Ground rules can include:

- Inviting everyone to contribute to the discussion
- Respecting and considering all ideas
- Expecting reasons and making them clear
- Seeking to reach agreement before acting (CUREE 2010).

Implications - collaboration and talk

In order to secure the benefits of collaboration in practical, vocational contexts, small group discussions need to be structured. E.g. by involving groups of two to six learners, using a specific stimulus to prompt/reveal a range of views, designing tasks that depend on a substantive discussion task that is meaningful.

Securing high quality talk requires planning and preparation by both staff and students and the relevance of such talk to vocational learning may not always be immediately evident to students. Consistency of approach between teachers and exploration with employers of the benefits to them of learning that involves this approach can both be used to reinforce potential benefits.

The evidence argues for the Commission promoting these demanding but effective approaches to teaching and learning. It also suggests that the Commission could model their use through its consultations with the profession about its findings and next steps.

Thinking skills development and meta-cognition

Although analytical and critical thinking skills are sometimes referred to when trying to distinguish between vocational and 'general or academic' education (Education International 2009), this view gets increasingly more contested, with the majority of stakeholders across the world agreeing that:

'...analytical and critical thinking skills are no less needed by vocational learners than their academic counterparts and that vocational learning is no less intelligent' (Faraday et al 2011; p 79)

In addition to thinking and meta-cognitive awareness being important vocational learning outcomes in their own right, deploying these in teaching and learning is also known to lead to a number of additional benefits.

Meta-cognitive strategies (i.e. higher order thinking which involves active control over the cognitive processes engaged in learning) for example, have been identified to have a high effect (0.69) on learner outcomes (Hattie 2009).

Similarly, thinking skills programmes and approaches were found to be effective in a number of ways. E.g. they helped improve learner performance in cognitive tests and measurements of curricular outcomes (effect size of 0.62 for both). The overall effect size (including cognitive, curricular and affective measurements) was identified as 0.74 (Higgins *et al.* 2005; p3).

[Continue](#)

Thinking skills and meta-cognition in FE

Thinking skills techniques can make a difference to learners' achievement in the post 16 sector too. [Mosely et al \(2004\)](#) found that developing the concept-formation, enquiry and reasoning skills encourages learners to be more independent, and increase their ability to learn collaboratively with their peers.

The type of peer interaction in thinking skills approaches is distinctive from the more commonly used co-operative approaches to learning, where members of a team pool their information and report back. Peer interaction for developing thinking skills involves learners tackling problems that can only be solved together. Examples of peer interaction which successfully enhanced learning included:

- Developing reasoning through repeated engagement in structured peer discussion on capital punishment
- Chemistry “process workshops” – where students worked in teams on activities that involved information processing, guided discovery exercises, problem-solving, reflection on learning and assessment of performance.

But there was also evidence that the vocational learning environment doesn't always create the right conditions for developing thinking skills. Problems the researchers identified related to the readiness of the teacher and of the students, the design and content of courses, the learning environment and institutional support ([Van Grinsven & Tillema 2006](#)).

Implication - Thinking skills

- Thinking skills matter in their own right in vocational contexts just as much as in non vocational ones. They are also important skills in ensuring that students access learning opportunities in appropriate depth.
- Strategies that are effective in helping students develop effective thinking skills have much in common with those that are important in securing depth in collaboration and developing the rare but important exploratory talk in learning settings.
- The Commission can help to build a virtuous circle of teaching and learning strategies, tools and practices by promoting all three, illustrating the powerful connections between them and highlighting some of the environmental conditions in the sector that encourage surface level adaption of what are seen as “techniques” and militate against exploration in depth. Key here is enabling teachers to develop an understanding of not just what works but why it does so that they can interpret approaches from their students and contexts and make connections between them.

Challenge

Academic research and evidence from the ground about current adult vocational education in England had surprisingly few references to ways of constructing challenge in learning.

At the same time, challenge is one of the key ways of supporting learner progress and helping learners achieve their best.

Irrespective of ability, challenging learners means designing teaching and learning to elicit from students their best efforts and to enable them to think and act in ways that are transferable and/or discipline-specific; and which are progressively more complex, critical, creative and independent ([CUREE 2009b](#))

Research suggests that the principles of constructing challenge are similar for all learners, regardless of their achievement levels.

They include constructing challenge through differentiated curriculum tasks, creating opportunities to learn from risk taking and failing as well as succeeding and developing materials and resources focussed on preparing for challenge together with the use of processes that embed challenge such as collaborative enquiry.

[Continue](#)

Challenge (2)

Many of the individual processes that are effective in constructing challenge were present, to some extent, in evidence about teaching and learning in the sector e.g.:

- Personalisation
- Encouraging students to take increasing responsibility for their learning and practitioners shifting to a more facilitative role
- Undertaking diagnostic activities, aimed at establishing learners' starting points and monitoring their individual progress in learning

Yet, many of these, assessment and diagnostics in particular were undertaken as an end in itself and not used as the foundation for creating challenging learning experiences.

Whilst many practitioners tried to help their learners become more self-directing, this often related to their independent study or their attitude to learning rather than shifting the balance of power and responsibility towards the learner in the classroom.

One approach to constructing challenge - collaborative inquiry and problem solving – was rarely present in the evidence of teaching and learning in the sector.

But it was the lack of the explicit focus on challenging all learners and purposefully using a range of approaches to that end, that was particularly striking.

Challenge - implications

- The focus in the sector on the needs and affective concerns of sector learners and the demands of the vocational learning context seem to dominate the agenda and risk suppressing the development of specific and explicit strategies for ensuring that every learner is appropriately challenged.
- The Commission might want to probe further the reason for the lack of emphasis on challenge and the lack of evidence about use of enquiry and open ended problem solving as a learning strategy across the sector.

Classroom climate and relationships

The environment in which teaching and learning takes place, including the relationships between practitioners and learners, plays an important role in learning.

The Teaching and Learning Research Programme (TLRP), which distilled from the findings of 18 major research projects in further education, reached a similar conclusion with relation to teaching and learning in the FE sector.

“[Relationships] are crucial to the success of further education in helping disadvantaged, underachieving and excluded people of all ages to develop their often fractured identities as learners.” (TLRP 2008)

Hattie (2009) found that teacher-student relationships have a high effect (0.72) on learner achievement and attitude. He pointed out that:

‘Building relations with students implies agency, efficacy, respect by the teacher for what ... [the learner] brings to the class (from home, culture, peers), and allowing the experiences of ... [the learner] to be recognised in the classroom.’ [Hattie 2009: 118]

There is some evidence, that many learners, particularly those just out of school, find their relationships with FE sector practitioners more positive, they feel respected and listened too:

- “You get treated with respect.”
- “You are allowed to use welding tools on your own ... like an adult”
- “At school, if you have done something wrong they shout at you – at college you just have a little chat to sort it out”
- “You can have a laugh with them” ([Lumby 2007](#)).

[Continue](#)

Creating supportive and positive classroom climate

C. Rogers, a highly influential psychologist, found that when teachers provided emotionally supportive climate students learned more, enjoyed lessons more and attended more often. They were also more creative and more capable of problem-solving, showed more spontaneity, initiative and independence.

Several studies showed that teachers who provided high levels of empathy and care of this level were also characterised by a cluster of other positive behaviours, including:

- More discussion with students
- More use of student ideas in the teachers'
- Interactions with them
- More smiling with students.

In return, there was:

- More student talk
- More student problem-solving
- More asking of questions
- More involvement in learning
- More physical movement
- Higher levels of cognition
- Greater creativity
- More eye contact with the teacher ([Rogers & Freiberg 1994](#)).

Learner dispositions and beliefs: mindsets

Wider research and evidence from FE practice, as well as a number of projects completed recently (e.g. [Improving Incentives to Learning in the Workplace](#)) by TLRP recognise that the diversity of learner backgrounds and the dispositions they bring with them can have a significant impact on their own learning and others' learning (through the learning environment).

Influential research by C. Dweck links **learner mindsets** with their ability to persevere and overcome challenges in learning. She distinguished between fixed and growth mindsets.

C. Dweck found that around half the learners had a *fixed mindset*. They believed that they were born with a fixed amount of intelligence and there was very little, if anything, they could do to improve it. When faced with difficulty they gave up and blamed their intelligence for their failures, saying things like: "I never did have a good memory" and "I'm no good at things like this".

Those learners who had a *growth mindset* believed that ability and success were due to learning and that learning required time and effort. When faced with challenging work, they tried harder, saying things like: "I should slow down and try to figure this out" and "I've almost got it now"

Supporting growth mindsets

- Dweck recommended encouraging a growth mindset so that all learners view poor performance on a task as something that can be improved by effort and persistence, rather than as a personal, negative reflection on them.
- She recommended avoiding giving person-oriented praise such as 'you're good at this' because it assumes that success is due to personal attributes and teaches learners to interpret difficulties in terms of their personal weaknesses. Instead, Dweck recommended process-oriented praise such as, 'you tried really hard' or 'that was a good way to do it' because this focuses on the processes required for success – making an effort and finding effective strategies ([Dweck 2000](#)).

Learner dispositions and beliefs: encouraging persistence in learning

In addition to encouraging growth mindsets through e.g. praise, other strategies have been highlighted by research as effective in supporting learner persistence and progress. These included:

An enabling environment

Overt appreciation of the learners' efforts was a significant factor in persistence in learning. Learners stressed the value of tutor praise as a motivational tool and a key factor in building confidence and self-esteem. Conversely, perceived lack of interest or negative attitudes from teachers caused some learners to consider leaving or actually to leave their courses.

Group work

Group approaches enabled learners to articulate, compare and reflect on their experiences and thus recognise progress and achievement. Learners pooled knowledge in groups. They used each other as mutual experts and to work out whether they had succeeded in learning tasks, using the tutor to confirm these judgements. This process also helped build their confidence and sense of self-worth.

Incentives

Incentives (carefully chosen rewards for sticking with learning) played a role in encouraging learners to attend regularly. Learners were less motivated by less immediate or tangible rewards, such as getting a job, but carefully chosen rewards for sticking with learning played a part in keeping learners engaged. Particularly, they encouraged learners to stay beyond the crucial first weeks of their course. Success drove success. A sense of achievement motivated learners to stick with learning. This was further promoted by teachers recognising small steps of learning, such as growth in confidence ([CUREE 2010b](#)).

[Continue](#)

Encouraging persistence in learning

Some FE sector practitioners find that **focusing on the learners' point of view** can be effective in supporting their persistence and motivation.

Some practitioners responded to specific interests and preferences, or worries the learners had about the course and life in general. For example, the tutor working with a group of armed-forces learners was aware of potential resistance from this group because it was a mandatory programme and some of the learners had negative prior experiences of learning. She began the first formal session by inviting the learners to write down any positive or negative thoughts they had, so that she could take them into account and help the learners recognise, as the course progressed, how they were overcoming their obstacles.

In other cases, the tutors adapted the learning and teaching styles to address wider lifestyle issues for groups of learners. For example, a group of shift workers reported that a key demotivating factor for them was that they were often tired after completing a long shift before coming to their class. The tutor therefore aimed to provide very relaxed sessions, supported by more games and discussion sessions than she would usually do, to keep learners alert and engaged ([Kenwright *et al.* 2007](#)).

[Continue](#)

Learner dispositions and beliefs about learning

There is strong research evidence that learner beliefs about learning a particular subject can become either strong drivers (if the beliefs are positive) or considerable obstacles to learning and progress.

For example, [Stathpoloulu & Vosniadou \(2007\)](#) discovered that learners with a more sophisticated attitude to knowledge appeared to have a better understanding of the subject content (physics).

Whilst students with less sophisticated attitudes viewed knowledge as something passed from teacher to learner those with more sophisticated perspective viewed knowledge as fluid and changing, and recognised that the process of learning may be as valuable as the learning outcome itself.

Another study ([Kyriacou & Goulding 2006](#)) found that students' views about themselves in relation to mathematics were similarly important. The review found that the extent to which students saw themselves as mathematicians had a strong positive impact on their motivation. Not seeing themselves as mathematicians tended to create barriers to putting effort into mathematics. For example, some students view mathematics as a subject that only clever people do well in and believe that any effort they put in to learning mathematics will make little difference.

The study found that learners worked harder when they developed a more positive identity of themselves. To achieve this practitioners needed to e.g.:

- provide a caring and supportive classroom climate;
- enable students to gain a deeper understanding of the mathematics;
- provide opportunities for students to collaborate; and
- enable students to feel equally valued.

Of these, the most important was helping students to gain a deeper understanding of the mathematics they were doing.

A supportive environment - implications

There is extensive evidence about a wide range of sophisticated practices for creating a supportive learning environment in vocational settings.

The identity of learners plays an important role here and many teachers in the sector are skilled in mobilising learners' desire to become scientists, engineers etc to create an effective and focussed classroom context.

The Commission may want to consider how to build on and harness this strength to ensure it is applied consistently and in particular is used to encourage learners to develop literacy, numeracy, thinking and collaboration skills as well as vocation specific ones

Supporting progress of all learners

Learning styles

There is evidence that, at least in the past, learning styles has been a key strategies for personalising learning and ensuring staff respond appropriately to the variety of learners' needs in their classrooms.

But the evidence behind the learning styles models and specifically their appropriateness for teaching and learning in FE concluded that they should be used with care ([Coffield *et al.* 2004](#)).

The review found that many models were weak and unreliable, and had a minor impact on teaching and learning. In addition, only two of the models explored in the review were identified as robust and useful in the context of post-16 education and training and some of learning styles models were never intended for education, but for the business world.

One problem highlighted by the reviewers was the contradictory advice about how to respond to learning styles. Whilst some researchers suggested matching the tutor's teaching style with students' individual learning styles, others suggest learners should develop a repertoire of styles.

The reviewers advised moving away from individual learning styles to broader notions of how learners approach and conceive learning and using teaching strategies which are proven to be more effective, such as using thinking skills techniques or providing feedback ([CUREE, 2007](#)).

Alongside these strategies that work for all learners, it is also important to provide additional support to some groups of learners to support their progress. The following slides explore these in more detail.

Supporting different groups of vulnerable learners

When looking at progression of vulnerable learners, LSIS commissioned review (NIACE 2010), drew conclusions for several groups of vulnerable learners.

Minority ethnic learners

Ethnicity was found to be a highly significant factor in withdrawal rates, especially for Asian learners. Written and spoken English skills was a potential barrier for some minority ethnic learners and this had an impact on their achievement and progression. The review highlighted the importance of

- Language support
- Guidance about course choice
- The use of different teaching and assessment strategies.

The review also suggested that role models and mentors can have a positive effect on young minority ethnic learners' progression and achievement as family values have a greater effect on than on white young learners.

Learners with learning difficulties and/or disabilities

The review found that consistent critical success factors in supporting progression for learners with different learning difficulties and disabilities (SEN learners) included:

- taking the wishes and aspirations of individuals as a starting point for planning and delivering programmes for those individuals;
- working with partner organisations to develop local progression routes to support transition between providers; and
- providing information, advice and guidance in a range of formats and media ([NIACE 2010](#)).

Supporting learners with learning difficulties and disabilities

With regards to SEN learners, [Dee et al.'s review](#) 2006 further showed the importance of targeting communication skills, particularly when supporting learners with profound and complex learning difficulties. It suggested that teachers need to be more aware of the range of ways through which learners may communicate, e.g.. through gesture and facial expression.

There was evidence too that activities such as storytelling helped people with learning difficulties to learn more about themselves and increase their ability to express themselves. For example, one study showed that belonging to a storytelling circle improved the social and emotional wellbeing of the learners as well as engaging them in a meaningful activity. The review also suggested that:

- Where the learning takes place is was important as what was being learned. Teachers had to help learners to make connections between formal (college or work) and informal settings (home, community) to help them transfer and generalise skills
- Active participation in learning increased learners' social and emotional wellbeing
- ICT and multimedia should be central in supporting learning and social inclusion rather than being seen as a useful, but peripheral, tool ([Mellar et al. 2007](#)).

Supporting young offenders' learning and progression

Young offenders are one of the vulnerable and most resistant learner groups. Practitioners working with such learners often look for alternative approaches to organising teaching and learning.

One group of practitioners working with young offenders developed an approach focused on the needs and starting points of young offenders. The four-hour classroom-based sessions alternated between frequently changing learning activities, some of them physical, each lasting no more than ten minutes. Each session also had at least two set breaks. This had the effect of breaking up the amount of time for which the young people had to concentrate. The style of material and the topics covered were also designed to help the students concentrate. Activities included:

- Using money as a hook to engage the students in numeracy work, such as written exercises on budgeting skills and effective weekly food shopping
- Reading books on crime and individual criminals' case studies to unpick the myths behind gang culture (not as glamorous as many young people imagine) while enhancing the students' literacy skills.

During each session, the project facilitators used a spinning wheel to determine which student went first or answered a question. The spinning wheel forced the students to get up off their chairs and become actively involved in the session ([Addison & Bucklee 2007](#)).

Implications – vulnerable learners

- The evidence about effective approaches to teaching and learning support for vulnerable learners seems to be small scale and, understandably to focus on particular groups and contexts
- This seems to be an areas where technology has a particular part to play and where personalisation of learning is key.
- Many of the strategies highlighted throughout this theme will be helpful to teachers in responding to such needs but will need specific contextualisation in this context.
- The Commission may wish to encourage, small scale studies of a wider range of cases followed by a suitably theoretically underpinned meta-analysis to reveal and develop current best practice.

Implications - overview

- The evidence here highlights many good practices and emphasises in particular the importance of the meaningful and contextualised opportunities that vocational education offers to learners.
- But it also reveals the opposite side to this coin; the evidence about the extensive nature of uninspiring teaching and learning is particularly worrying. It may well be that traditional forms of assessment and learning are obscuring important ways of involving learners and teachers in ongoing formative assessment. Similarly, the focus on vocational contexts seems to be obscuring ways of connecting learning with learners' lives beyond the vocational learning setting..
- This implies that the vocation specific traditions and practical demands of vocational education are a challenging environment in which to experiment with new and more inspiring, participative, independent and challenging approaches.
- The approaches highlighted by the evidence here would do a great deal to address this if tackled in depth and through effective approaches to CPD. It will be important for the Commission to model these practices in its own approach to communicating its findings and recommendations. We hope the Commission can:
 - avoid quick fixes without underpinning opportunities to explore why they do and don't work in different contexts, and:
 - Support offer opportunities to collect and analyse evidence about how changes in the teaching and learning offer from teachers is being experienced by students.
- What is sauce for the goose is sauce for the gander.... One of the most important routes for embedding such approaches in day-to-day vocational education is ensuring that the teachers expected to make these changes on behalf of their students get to experience their benefits first hand.

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- A wholly independent company, led by [Philippa Cordingley](#), CUREE is internationally recognised for the quality and impact of our work supporting practitioners, leaders and policy makers. We work in collaboration with a range of individuals and organisations. We work with schools and colleges, networks and Local Authorities across the country to support and inform CPD. Our clients also include national organisations such as the government, in particular the DFE and BIS, the National College, the Training and Development Agency for Schools (TDA), the Learning and Skills Improvement Service and Specialist Schools and Academies Trust. In recent years we have contributed very substantially to the growing shift towards evidence-informed practice in education by:
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 - Increasing policy makers' desire to build on what the evidence shows us



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