



*It takes 'three or four experiences involving interaction with relevant information for a new knowledge construct to be created in working memory and then transferred to long-term memory.'*

### **Strategy overview**

Hattie (2009) found an effect size of 0.71 for spaced practice.

### **What is it?**

Multiple exposures provide students with multiple opportunities to encounter, engage with, and elaborate on new knowledge and skills. It is not simple repetition or drill work. Research demonstrates that deep learning is developed over time via multiple and spaced interactions with new knowledge and concepts. This may require distributing practice across several days, and using different activities to vary the interactions learners have with the new knowledge.

### **How effective is it?**

Research demonstrates that multiple exposures greatly improve learner retention of new knowledge. It is most effective when exposures are used deliberately to assist learners to master new knowledge and skills, and when the exposures are spaced over time. Massed practice is less effective with an effect size of 0.41.

### **Considerations**

Multiple exposures are most effective when strategically spread over time, as part of a unit and/or lesson structure. To make the repetition meaningful, it is essential to clearly state the link between the learning intentions and the work





being done.

Multiple exposures require planning and structure. They provide opportunities to engage, and re-engage, with concepts and ideas, and to practice new skills in different contexts. Planned, intentional repetition supports transfer of learning from earlier exposures to later exposures. It is vital to offer feedback on how well a student is achieving the learning goals.

Timely feedback on practice remediates student misunderstandings and prevents them repeating mistakes in multiple exposures. Feedback also informs teacher practice and pinpoints where teaching strategies need be adapted.





## **Personal reflection on my teaching practice...**

Reflective practice provides a means for teachers to improve their practice to effectively meet the learning needs of their students. Brookfield succinctly describes the advantages of reflective practice to teachers as:

- It helps teachers to take informed actions that can be justified and explained to others and that can be used to guide further action.
- It allows teachers to adjust and respond to issues.
- It helps teachers to become aware of their underlying beliefs and assumptions about learning and teaching.
- It helps teachers promote a positive learning environment.
- It allows teachers to consciously develop a repertoire of relevant and context specific strategies and techniques.

It helps teachers locate their teaching in the broader institutional, social and political context and to appreciate that many factors influence student learning.





## Multiple Exposures

### **This strategy is demonstrated when the teacher:**

- links multiple exposures to the learning goals

*Personal reflection on my teaching practice...*

- plans units of work that clearly identify new knowledge and skills that will benefit from multiple exposures

*Personal reflection on my teaching practice...*

- uses a variety of learning and assessment tasks that vary students' interactions with the knowledge and/or skills, and support transfer of learning.

*Personal reflection on my teaching practice...*

### **This strategy is not demonstrated when the teacher:**

- repeats the same activity many times with no variation in context, resulting in dull repetition

*Personal reflection on my teaching practice...*



## High Impact Teaching Strategies (HITS)



## Multiple Exposures

- does not provide timely feedback, resulting in students repeating mistakes multiple times.

*Personal reflection on my teaching practice...*

### **This strategy is demonstrated when students:**

- consolidate their learning through opportunities that engage and re-engage them with new content over a period of time

*Personal reflection on my teaching practice...*

- feel supported and confident about new learning.

*Personal reflection on my teaching practice...*



## High Impact Teaching Strategies (HITS)



### **Continuity of practice**

The teacher uses repetition to review and reinforce new learning, particularly when introducing new concepts and skills. Professional learning activities focus on building teachers' understanding of evidence based high impact teaching strategies.

The teacher plans the use of repetition to review and reinforce new concepts and skills, explicitly linking each exposure to the learning goals.

The teacher assesses student competence at each stage and provides timely feedback to remediate student misunderstandings and/or mistakes.

Teachers work in Professional Learning Communities to develop multiple exposures learning activities in different contexts which support transfer of learning.

Across learning areas, teachers are skilled in planning and structuring multiple exposures.

Teachers collaboratively plan and develop learning and assessment activities that incorporate multiple exposures.

Teachers analyse a range of data, including student feedback, to measure the impact of multiple exposures on student learning and to evaluate their effectiveness.

Use of multiple exposures is deliberate, systematic and embedded in lesson and unit structures, and applied strategically to support knowledge acquisition, transfer of knowledge and deep understanding.





An integrated, whole-school approach to using high impact teaching strategies is implemented, and regular monitoring and evaluation processes ensure teacher accountability.

