

“Movement is an essential principle in the design of effective learning” (Beard,2017:11)

Practitioner research project at Loughborough University

Taking 4 different types of activity Opezzo & Schwartz (2014) found that **walking outside resulted in the most creativity and free flow of ideas.**



“I can really feel my thinking”

“I’ve always walked to think things out – I just never thought I could do it with academic work.”

PhD student (2nd year)

Mild exercise simultaneously with an academic task results in an increase in bilateral prefrontal cortex activity – the place in the brain where executive functions take place, resulting in specific improvements in executive functioning and mathematics. Davis, et al. (2011)

This small scale qualitative study allowed students to stand and move whilst thinking, planning and reading. They used a standing desk and flip chart paper/magic whiteboard on a wall with coloured pens and ‘post its’. They were encouraged to move freely.

Many commented that they realised they did this automatically in their own rooms and one asked to take her shoes off as she liked the feel of a rubber mat under her feet and believed it helped her thinking process.

“Because I know I struggle with some stuff, I have my coping mechanisms... one is to stand and move.”

Undergraduate student
(final year)

References

- Beard, C (2017) How the human body shapes the mind: navigational tools used to support learning. In L. Clughen & J. Willis (eds.) *Creative Academic Magazine: Role of the Body in Creative Processes & Practices*. Issue 8.
- Davis, CL et al. (2011) Exercises improves executive function and achievement and alters brain activation in overweight children: a randomized controlled trial. *Health Psychology*. Jan: 30(1): 91-98
- Opezzo, M & Schwartz, DL (2014) Give Your Ideas Some Legs: The Positive Effect of Walking on Creative Thinking. *Journal of Experimental Psychology: Learning, Memory, and Cognition*. 40(4): 1142-1152

For further information contact: Karisa Krcmar k.krcmar@lboro.ac.uk