

HOW MAKING MUSIC SUPPORTS INTELLECTUAL, SOCIAL AND PERSONAL DEVELOPMENT

Listening skills

Considerable evidence has shown that everyday listening skills are stronger in musically-trained children than in those without.¹ Listening skills are closely tied to the ability to perceive speech in a noisy background, discriminate between sounds, pay attention and keep sounds in memory.

Language processing

The skills used in language processing are similar to the skills needed to perceive rhythm, harmony and melody. Studies have shown² that children with musical experience are able to make stronger distinctions between speech syllables than those without.

Neurological functioning

Because singing behaviour is multi-sited neurologically, singers tend to have greater connections between different areas of the brain than non-singers.³ This means that singing has a positive impact on how various areas of the brain interact and develop, including those related to music, language, fine motor behaviour, visual imagery, human social interaction, and coordination.

Development of literacy skills

Research has shown that children with reading difficulties have experienced improvement after engaging with music. A study of 15 children⁴ identified as 'poor readers' by their school demonstrated significant gains in reading comprehension, accuracy, and rate of reading following a rhythmic music intervention.

Aural and visual memory

Children with musical training have been found to have significantly better verbal learning and retention abilities. In research investigating the influence of group instrumental training on the working memory of children, the music group showed a greater increase on every measure of verbal memory than science and control groups.⁵

Spatial reasoning

There is strong and reliable evidence⁶ that active engagement with music leads to dramatic improvements in spatial reasoning – the abilities that form the basis for performance in engineering, architecture and design.

Abstract reasoning

Studies have demonstrated that children and young people participating in music instruction showed dramatic enhancements in abstract reasoning skills, with researchers identifying neural firing patterns that suggest music may hold the key to higher brain function.⁷

Executive functioning

Executive functions involve the conscious control of action, thoughts, emotions, and general abilities such as planning and problem-solving. Playing a musical instrument, particularly in an ensemble, requires many skills associated with executive functioning, including sustained attention and goal-directed behaviour.

Motivation and self-esteem

Music enhances self-efficacy, self-esteem, improvements in mood, reduced anger, increased motivation and improved behaviour. For young people not in education, training or employment, active engagement with music-making enhances self-confidence, increases aspirations and supports a more positive attitude towards learning⁸.

Social Cohesion, inclusion and pro-social behaviour

Making music in a group has been shown to contribute to feelings of social inclusion⁹, as well as to encourage tolerance and the development of social ethics. There is also evidence that collective music-making promotes elements of positive social behaviour including co-operation, belongingness, collaborative learning, group identity, turn-taking and teamwork¹⁰.

Wellbeing

Music is increasingly being recognised¹¹ for its beneficial effects on physical health and wellbeing¹². Music-making can contribute to improved negotiation skills, co-operative working and learning to trust peers. It provides respite from problems, supports healing, and creates opportunities for having fun.¹³

References

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- ¹¹ MacDonald, R., Kreutz, G., & Mitchell, L. (2012). *Music, health and well-being*. New York: Oxford University Press. doi: 10.1093/acprof:oso/9780199586974.001.0001
- ¹² There are many definitions of well-being. Typically, it is considered as relating to the state of being comfortable, healthy, or happy.
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