

More than Movement:

Investigating dance for people with Parkinson's

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Dance is becoming increasingly popular as a therapeutic activity for people living with Parkinson's disease, with classes now being offered in the UK, Ireland, United States and another 25 countries around the world. There is some evidence that dance can have beneficial effects for people with Parkinson's, with reports of improvements in movement, mood and thinking skills.

In the Body Eyes and Movement (BEAM) Lab at the University of Manchester, we are interested to find out more about how dance can help people with Parkinson's, particularly in areas that have been less well investigated. For example, Parkinson's can affect the ability to produce facial expressions, recognise emotions and use gestures, which are important for communication and social interaction.

Funded by a 'Research into Practice' Impact Accelerator award from the Economic and Social Research Council (ESRC), the project **More than Movement** was a collaboration between the BEAM Lab, English National Ballet, social enterprise Equilibrium Dance and Arts, and Dr Matthew Sullivan from Manchester Metropolitan University, who has Parkinson's. The project explored **how dance can influence everyday movement, emotion and communication** for people with Parkinson's, by pilot-testing a dance programme co-developed by **dance artists, researchers, physiotherapists and people with Parkinson's**.

It became clear during the development process that people with Parkinson's did not want to simply take part in an "exercise class". Although physical activity can help with controlling symptoms in Parkinson's, we all know how hard it can be to get motivated and stick to something that is "good" for us, even with the best of intentions. This is where dance comes in, by offering something unique that can benefit people in a variety of ways (with elements such as movement, rhythm, memory, attention, emotion, and social interaction), while also being enjoyable and offering an escape from the difficulties of everyday life.

The programme drew on English National Ballet's approach to dance and Parkinson's, while also incorporating elements of the classical Indian dance form Bharatnatyam, which features story-telling, hand gestures (Mudras) and expressions. Classes followed themes inspired by the cotton industry with its links to local history. This helped to promote imagery and creativity, allowing participants to feel immersed in the dance experience and explore new ways of moving, rather than focusing on the limitations of their condition.

The social aspect of dance as a group activity is important. Classes were followed by tea and cake, providing an opportunity for the participants, dance artists and researchers to chat, ask questions and get to know each other better.





We explored potential effects of the classes by taking measures in the lab before and after the 6-week pilot programme. Movement during the classes was also recorded using wearable sensors, and participants rated their mood before and after each class.

Preliminary results suggest that the dance classes may help to improve everyday mobility and hand movements, as well as mood and emotional well-being. Feedback from participants also revealed other benefits such as improved confidence and motivation. One participant was surprised at the freedom of movement she found when dancing:

“How come I can’t walk properly but I can dance?”

Another member of the group described how she had used some elements from the classes (such as imagery) to help with everyday tasks:

“Imagination helps with movement in normal life...I have used the 'lotus' flower movement to help with some daily tasks at home, and the 'weaving' to stretch during the day”

It is hoped that the project will inform the future development of dance programmes to improve movement and well-being for people living with Parkinson’s. The findings could also lead to further research into beneficial effects of dance in other age-related conditions as well as in healthy older adults.

Further information


BEAM Lab: <http://beamlab.lab.manchester.ac.uk/research/danceandparkinsons/>

English National Ballet – Dance for Parkinson’s: <https://www.ballet.org.uk/project/dance-for-parkinsons/>

Equilibrium Dance and Arts: <http://equilibriumdancearts.wixsite.com/equilibriumdancearts>

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