EXERSCI 708
Advanced Seminar in Movement Neuroscience
(15 points)
(Semester 2, Newmarket Campus)

Who should take this course?
BSc and Biomed Sci (Honours), MSc and PGDip Sci students interested in basic and clinical neuroscience related to movement and sensorimotor control.

Learning Outcomes
1. Apply and critique contemporary research topics in movement neuroscience.
2. Identify and explain the role of primary motor cortex in voluntary movement and through non-invasive brain stimulation.
3. Explain the neurophysiology underlying the cognitive control of action.
4. Identify and explain and apply neurophysiological basis of muscle synergies and their clinical management.
5. Describe, identify and explain the neurobiological factors that underpin spontaneous neural reorganisation underlying cerebral palsy and stroke and its implications for recovery and rehabilitation.

Learning and Teaching
One three-hour seminar per week. An understanding of concepts covered in EXERSCI 305 Movement Neuroscience is assumed. For students who haven’t taken EXERSCI 305, additional study may be required.

Teaching Staff
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Assessment

1. Seminar Presentations 30%
2. Quizzes 20%
3. Assignment 10%
4. Final exam 40%

Recommended Textbooks

*Useful Reference Books at Library:*


Student Feedback

Since inception this course has student approval ratings that range from 80-100%.