

MINOR IN PAEDIATRIC PHYSIOTHERAPY.

GENERAL INFORMATION. AUGUST 2014

Specifically for physiotherapy students, the School of Health at Avans University of Applied Sciences will be offering an English-language minor in Paediatric Physiotherapy. Students are able to start this programme twice a year: in September (Autumn semester) or in February (Spring semester).

Several topics related to motor development, motor control and motor learning are introduced and intensely discussed based on what is known as a 'task-oriented approach'. Motor skills will be viewed as intentional motor actions, strongly related to the task to be fulfilled, and in the environment the task is being performed (by the child).

A conceptual framework for paediatric physiotherapy will be presented and models used in paediatric physiotherapy will be discussed. The interrelationship between this framework and the models will be highlighted. Furthermore, a variety of video observations will be used to understand and describe how normal and abnormal children move and why they move the way they do (process-diagnostic

evaluation). Performed tasks will be analysed in order to understand and apply knowledge of motor control, motor learning and motor development.

Participants in this course will be challenged to elicit motor skills at the actual level of the child, and to increase the difficulty of a task step by step. They should be able to manipulate the task as well as environmental constraints in such a way that motor performance changes according to the predefined intentions. The underlying process from 'intention to contraction' will be closely studied within a 'heterarchical model' based on cognitive neuromotor science. The implications of the model for assessment and therapy will be discussed.

On a more pedagogical level, the emphasis on motor goals versus pedagogical goals will be discussed in the light of pedagogical and testing theories. The participants will, after finishing this course, be able to test children aged 4 to 11 using the Movement Assessment Battery for Children (Mabc). They will be able to analyse and interpret the test results. Students will also be introduced to the Albert Infant Motor Scale (AIMS).

In the second part of the course, children with DCD (Developmental Coordination Disorder) and CP (Cerebral Palsy) will be discussed. Participants will perform outdoor exercises and several field tasks.

DIDACTICAL APPROACH

The minor in Paediatric Physiotherapy is built on a variety of challenging study tasks, group work, self-study (literature), and a number of presentations. Lectures and discussion groups for which the participants must prepare and practice will be organised twice a week.

Blackboard will be used as a supporting electronic learning system. This system is available on the internet for all students enrolled in this course.

COMPULSORY READING

R. A. Schmidt & T. Lee (2014).

Motor learning and performance.

Stanningley, Human Kinetics, 5th edition. Champaign, Illinois.

Haywood, K.M., Getchell, N. (2009).

Life span motor development.

Fifth edition. Human kinetics. Champain, Illinois.

Piek, J.P. (2006).

Infant motor development.

Champaign, IL: Human Kinetics.

ASSESSMENTS AND COURSE CREDITS

An assessment will be scheduled at the end of the first part of the course (after 10 weeks). Each participant will present a topic related to paediatric physiotherapy. The presentation consists of two parts: a mini-symposium (PowerPoint presentation) and an interactive workshop.

At the end of the second part of the course (after 20 weeks) a final test will be scheduled consisting of 'true or false' statements and open questions. In addition, each study group will develop a portfolio in which the worksheets and data sheets are collected. Finally, the outdoor exercises and field tasks will be graded. To receive the course credits (30

ECTS, a workload of 840 hours), all parts must be graded with a 'pass'.

ENTRY LEVEL

Exchange students (who must be at least a 3rd year bachelor of physiotherapy student) are required to have passed their examinations on neurophysiology and the neuromotor system. They must also be motivated to work with children. Students must have a satisfactory verbal and written command of English. See the Avans website (www.avans.nl/international) for detailed information on the admissions requirements for studying at Avans.

FACILITIES

A participant registered at Avans will have access to all regular facilities.

- Avans has different buildings at different locations in Breda. In every building participants can use the library, PCs, copy/printing machines and pay for food in the school canteen with a facility card.
- From Monday to Thursday the school building is open until 10:00 p.m.
- Participants can use work, project and class rooms. Every room has computer and electronic whiteboard facilities.
- Participants will receive a personal Avans e-mail address to be used for all official (study-related) communication.
- The entire course will be supported by Blackboard.
 Enrolment in this minor programme is based on your student registration.

COURSE COORDINATORS AND LECTURERS

Ad van Tuijl

(coordinator & lecturer: alt.vantuijl@avans.nl)

Els Brouwers

(lecturer)

Contact

Avans University of Applied Sciences **School of Health**

Hogeschoollaan 1, 4818 CR Breda, The Netherlands PO-Box 90116, 4800 RA Breda, The Netherlands