



UNIVERSITÀ  
DEGLI STUDI DI MILANO-BICOCCA

## COURSE SYLLABUS

### Technological Seminars

2223-2-I0202D015

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#### Aims

The seminar aims to examine in depth the knowledge about the development of motor control, of body image, of dominance, laterality and lateralization. Moreover, the topic of graphomotricity will be studied in depth: from scribble to representation.

#### Contents

LATERALITY AND GRAPHISM: To analyze in depth neurobiological mechanisms and developmental course of motor control, dominance, lateralization and laterality. To study the development of body image. To highlight the development stages of graphism.

#### Detailed program

LATERALITY AND GRAPHISM  
Origin of movement and neurobiology of motor control  
Body schema and Body image  
Perception-action-cognition cycle  
The role of visual function in motor control  
Dominance, lateralization and laterality  
Evolution of graphomotricity (scribbling, drawing, writing)  
Meaning and symbolism in children's drawing

## **Prerequisites**

Objectives of the first year courses

## **Teaching form**

Lectures and Tutorials

## **Textbook and teaching resource**

AJURIAGUERRA J., *Manuale di psichiatria del bambino*, Masson

COSTE J.C., *La psicomotricità*, a cura di P. Baldi, La Nuova Italia

PISATURO C., *Appunti di psicomotricità; la pratica psicomotoria nella clinica neuropsichiatria nell'età evolutiva*, Piccin Ed

PISATURO C., *Appunti di psicomotricità Lo schema corporeo*, Piccin Ed

MILITERNI R., *Neuropsichiatria Infantile*, Idelson

LURIA A.R. et al, *Come lavora il cervello*, Il Mulino

Von Hofsten C. Action, the foundation for cognitive development. *Scand J Psychol.* 2009 Dec;50(6):617-23. doi: 10.1111/j.1467-9450.2009.00780.x. PMID: 19930261

Purpura G, Tinelli F. The development of vision between nature and nurture: clinical implications from visual neuroscience. *Childs Nerv Syst.* 2020 May;36(5):911-917. doi: 10.1007/s00381-020-04554-1. Epub 2020 Mar 5. PMID: 32140777

Amann-Gainotti M, Antenore C. Development of internal body image from childhood to early adolescence. *Percept Mot Skills.* 1990 Oct;71(2):387-93. doi: 10.2466/pms.1990.71.2.387. PMID: 2251074.

## **Semester**

Second Semester

## **Assessment method**

Attendance

## **Office hours**

By appointment

## **Sustainable Development Goals**

GOOD HEALTH AND WELL-BEING | QUALITY EDUCATION | REDUCED INEQUALITIES

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