

### September 7, 2020

## EM146: IBITA Advanced Course: "The role of extremities (head-hand-foot) in postural control - The Bobath Concept"



ALBA MAGRI

Pt, IBITA Advanced Course Instructor

The Bobath concept is a problem solving approach aimed at evaluating and treating people with movement disorders, postural control and function, caused by a lesion of the central nervous system. This approach to adult rehabilitation with central neurological damage stems from the work of Berta and Karel Bobath and has evolved over the last 60 years. The rationale for its application is rooted in current neuroscientific knowledge related to motor control, motor learning, neural and muscular plasticity and current biomechanical knowledge. The aim of the course is to present the relationship between center and periphery of the body starting from an inverse perspective with respect to the classical one in which the competence of the trunk and of the axial structures is often considered the basis of the movement of the limbs. In this context, the emphasis will be on the role of the periphery as an informant of the motor system (sensors) and as a facilitator of motor response. Particular attention will be given to the role of information coming from the hand, from the sole of the foot and from the head-neck system in the modulation of the output for postural control aimed at locomotion, transfers and reach to grasp. At the end of the course the participant will have a broader and more integrated vision of the postural mechanisms underlying the functional recovery to complete the knowledge provided in the basic course.

#### Specific objectives:

- Promote the evidence based approach based on updated literature

- To deepen the knowledge of the mechanisms of integration between sensory and motor systems, between postural systems and selective motion control systems

- To understand how cutaneous and proprioceptive afferential inputs influence postural and motor control - Acquire facilitation techniques (manual, verbal and environmental) that allow the sum necessary to reach the discharge threshold for the activation of sensor-motor systems

- Develop the reflection for the structuring of a treatment aimed at supporting neuroplastic processes

- Refine manual skills and implement technical competence at an advanced level - Support the discussion and discussion between participants and teachers and train clinical reasoning



12 Seats	<b>€</b> €750.00	<ul><li><b>40</b> Hours</li></ul>	<b>50</b> ECM
INTENDED FOR Doctors, Physiotherapists, Occupational Therapists	PAYMENTS Deposit €400.00 + VAT 22% (€488.00) within 7 days from the registration	CALENDAR 07-11 September 2020	<b>LANGUAGE</b> Italian
	Balance €350.00 + VAT 22% (€427.00) by date June 10, 2020 Total: € <b>750.00</b> + VAT		

# SCHEDULE

#### **First day**

- 8.30-9.00 Registration of participants and course objectives
- 9.00-11.00 Neurophysiology: "Sensory integration for the activation of motor areas"
- 11.00-11.15 Coffee break
- 11.15-12.30 Evaluation and treatment of patient A by teachers in collective session
- 12.30-13.00 Summary of clinical reasoning and discussion
- 13.00-14.00 Lunch
- 14.00-15.30 Treatment of patients by course participants with teacher supervision
- 15.30-15.45 Coffee break
- 15.45-17.30 Practical laboratory CHOR as the basis of the stand-to-sit transition. Sit-to-supine with the



contact of the hand to the support surface

17.30-17.45 Summary of the day, last questions and discussion.

#### Second day

9.00-11.00 Lesson: "The integration and the role of the afferents from the neck, from the palm of the hand and from the sole of the foot"

- 11.00-11.15 Coffee break
- 11.15-12.30 Evaluation and treatment of patient A by teachers in collective session
- 12.30-13.00 Summary of clinical reasoning and discussion
- 13.00-14.00 Lunch
- 14.00-15.30 Treatment of patients by course participants with teacher supervision
- 15.30-15.45 Coffee break
- 15.45-17.30 Practical laboratory Sensory stimulation of the foot and hand
- 17.30-17.45 Summary of the day, last questions and discussion.

#### Third day

9.00-10.00 Lesson: "Presentation of a case study - discussion"

10.00-11.00 Practical workshop: The alignment and stability of the head as a basis for spatial coordinates

- 11.00-11.15 Coffee break
- 11.15-12.30 Evaluation and treatment of patient A by teachers in collective session
- 12.30-13.00 Summary of clinical reasoning and discussion

13.00-14.00 Lunch

14.00-15.30 Treatment of patients by course participants with teacher supervision

15.30-15.45 Coffee break

15.45-17.30 Practical workshop - Moving from supine to prone with guide from the distal key points (head, hand, foot)

17.30-17.45 Summary of the day, last questions and discussion.

#### Fourth day

9.00-11.00 Practical workshop - Supine-standing passage with emphasis on the preparation of the forefoot and hand contact



- 11.00-11.15 Coffee break
- 11.15-12.30 Evaluation and treatment of patient B by teachers in collective session
- 12.30-13.00 Summary of clinical reasoning and discussion
- 13.00-14.00 Lunch
- 14.00-15.30 Treatment of patients by course participants with teacher supervision
- 15.30-15.45 Coffee break

15.45-17.30 Practical workshop - Active stimulation of the hand vs. Passive "sensory package" 17.30-17.45 Summary of the day, last questions and discussion.

#### **Fifth day**

9.00-11.00 Practical workshop - Facilitate verticality through the stimulation of the foot and hand 11.00-12.30 Evaluation and treatment of patient B by teachers in collective session and discussion 12.30-13.30 Lunch

13.30-15.00 Treatment of patients by course participants with teacher supervision

15.00-16.15 Practical laboratory: Facilitate verticality by activating the head-neck system

16.15-16.45 ECM test, certificate delivery and course completion