

***WFNR***  
**SPECIAL INTEREST GROUPS MEETING.**

**M & S BI - SIG**

Thursday, 23<sup>rd</sup> May

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Italy

# M&S-BI SIG

## Specific Features

Main SIG targets are not only isolated impairment or particular treatment but:

- **recovery of dysability as a whole**  
(strenght – swallow – speech – cognitive....)

Rehabilitation programmes in BI Patients regard different SIGs  
in a cross-sectional way

### SIGs:

- Robotics
- MT
- Early rehab
- Clinical pathways
- Dysphagya
- Neuropsychological
- Ethics

## Scientific Activity

- International Trial

- “SISTER: Spasticity in Stroke and intrathecal Baclofen– Randomized controlled, open-label”
- “CUBIST: A randomized, double blinded, active controlled study for clostridium difficile therapy”
- “PRA - Multicentric study on the functional recovery in stroke patients with antidepressant”

- National Trial

- “Multicentric Study for the prevention and control of disease: implementation of care pathways in the Italian Regions”
- “The clinical and rehabilitation care path for stroke patient in the Pavia province”

# M&S-BI SIG

## SCIENTIFIC SPHERE

- Practical problems for *randomized control group design*
- Differences in sample characteristics
- Risk of researcher bias
- Difficulties in outcomes measurement and comparisons



# M&S-BI SIG



## CLINICAL SPHERE

- **Multicentric studies**
- **Comparability of treatments**
  - High costs
  - Granting
- **Lack of specific and unambiguous models**

# **M&S-BI SIG**

## **INTEREST FIELDS:**

- ❖ ***New Technologies employment***
- ❖ ***Patients' frailty and complexity in Internal Medicine and Geriatrics Units***
- ❖ ***Disabled people Working Reintegration Approach***
- ❖ ***New Welfare Models***

# **M&S-BI SIG**

## ***specific research issues***

- Ethical Committees / Technical Scientific Committees
  - Is the “Experimental Study” definition valuable for NRB?
  - Are EC evaluations conformed to the new experts indications/suggestions?

# M&S-BI SIG

## Specific Research Issues

- Technical aspects

- Computer System for DB: need to optimize data mining techniques and design

issues on scales' implementation

choosing of different scales, feasibility for NRB  time-consuming



# M&S-BI SIG

## *Specific Research Issues*

- Organizational set-up
  - **Clinical/Research activities: unbalanced ratio**
  - **Educational needs**
    - 1) curriculum and involvement for all specific professionals
    - 2) research expertize implementation: study design, articles' writing, .....
  - **Granting and insurances**
  - **Statistical support**

# **M&S-BI SIG**

## ***International Activities***

- **Year 2012**

- IX<sup>th</sup> World Congress of IBIA: Symposium on Brain Stimulation
- IX<sup>th</sup> Mediterrean Congress of PMR: Brain stimulation
- Rorig Meeting , Zihlschlacht :The use of robotic device in early verticalitation of VS patients
- 17th EMN Congress EuroAcademia Multidisciplinaria Neurotraumatologica Cluj-Napoca Romania:  
**Effects of Decompressive Craniotomy in Brain Injury**

- **Year 2013**

- 6<sup>o</sup>th Asean Rehabilitation Medicine Association –Manila: “Robot-assisted Neuromotor Rehabilitation: Evidences from Literature”

# M&S-BI SIG

## FUTURE PERSPECTIVES

- Neurorehab Programs **Standardization**
- Evidence based **Cost-outcome evaluations**
- Stroke and TBI Neurorehab **Outcome Indicators**
- Implementation of new **Technologies and Telemedicine**
- Analysis of restricting factors in pts **Cooperation**
- Psychosocial interventions for **pts and caregivers QoL**

# M&S-BI SIG

## *Our Present Researches*

- Current Projects

- Efficacy of DBS in VS and MCS Patients
- tDCS in the bladder activity in spinal cord injured Patients
- tDCS in post-stroke dysphagia recovery
- tDCS in post stroke aphasic Patients
- tDCS and robot-therapy for upper limb recovery in post stroke Patients
- Effects of early verticalisation with the Robotic System Erigo® in VS and MCS Patients
- Validation of an assessment scale for aphasia
- Agnosia syndrome: Locked-in syndrome
- Neuroradiological study of DAI
- Neurophysiological study on sleep waves and rhythms in VS and MCS Patients