Value of Treatment for Multiple Sclerosis

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Can "Real World Evidence Data" advance equity of health care in Europe?

7 March 2017, 11:00 – 12:30

Venue: European Parliament, room ASP A3E2

Costs of MS: societal perspective

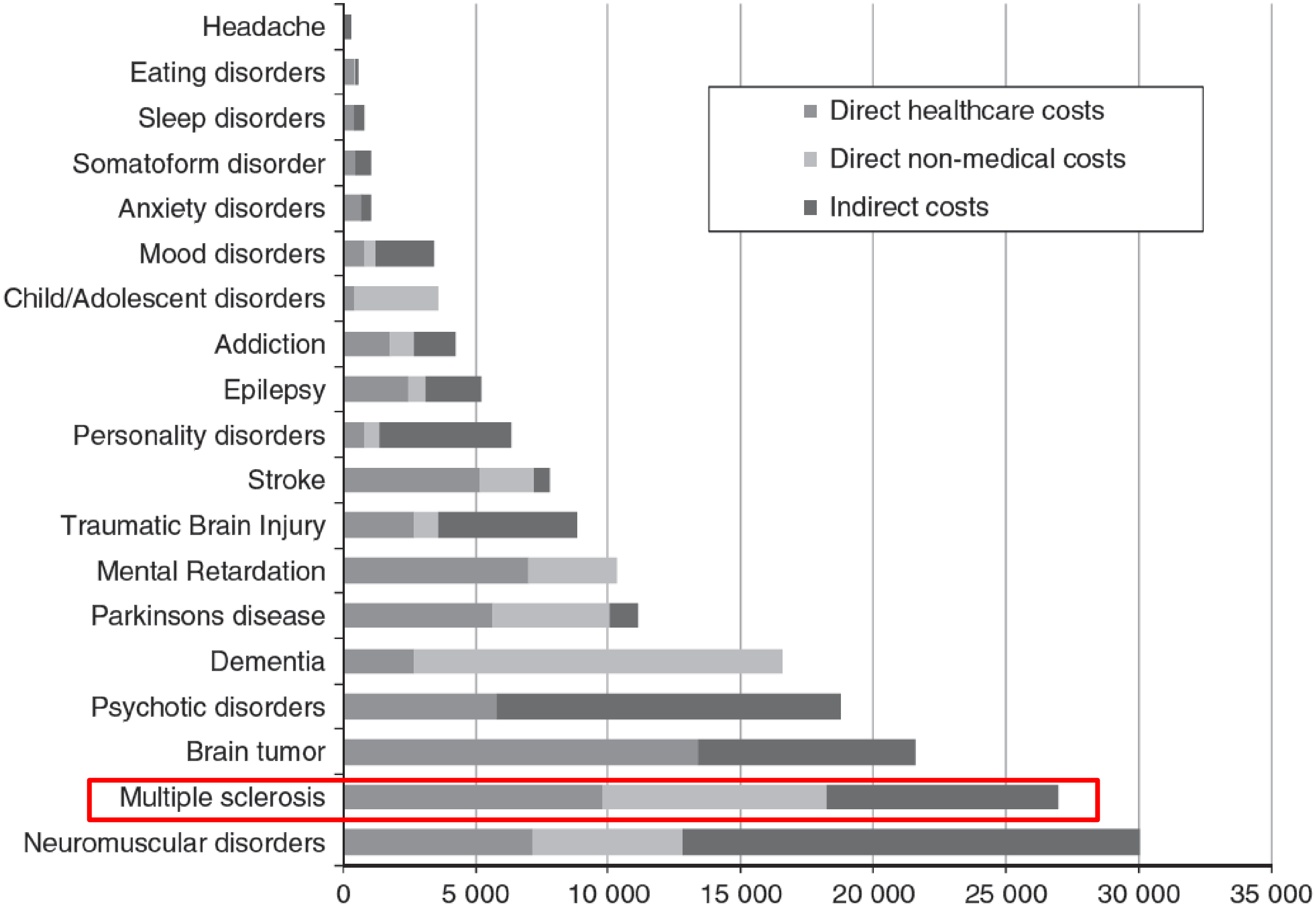


Figure 2 Cost per person by type of cost (€PPP 2010), all disorders.

Gustavsson et al. Eur Neuropsychopharm 2011

Costs of MS: societal perspective

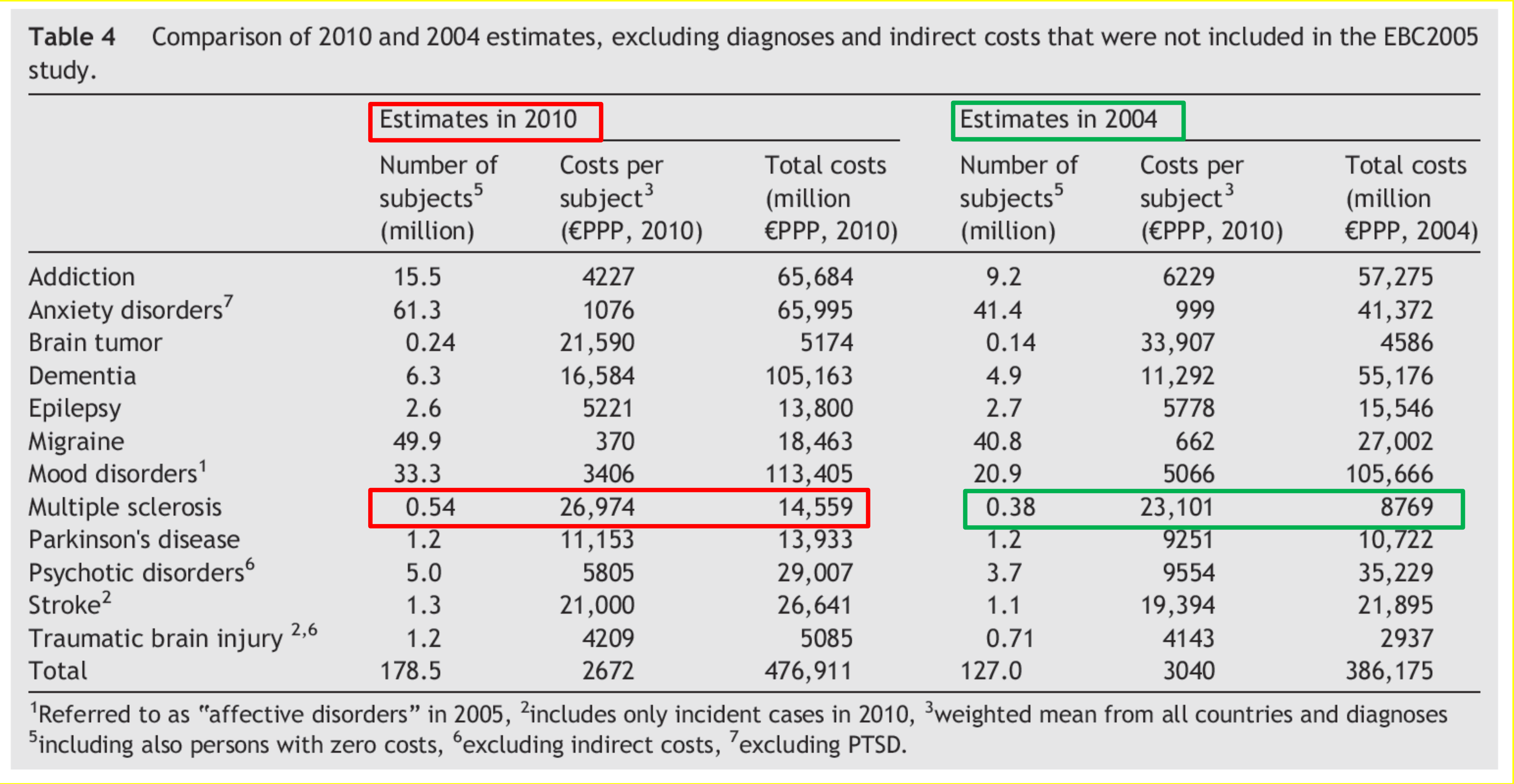


Table 4 Comparison of 2010 and 2004 estimates, excluding diagnoses and indirect costs that were not included in the EBC2005 study.

	Estimates in 2010			Estimates in 2004		
	Number of subjects[5] (million)	Costs per subject[3] (€PPP, 2010)	Total costs (million €PPP, 2010)	Number of subjects[5] (million)	Costs per subject[3] (€PPP, 2010)	Total costs (million €PPP, 2004)
Addiction	15.5	4227	65,684	9.2	6229	57,275
Anxiety disorders[7]	61.3	1076	65,995	41.4	999	41,372
Brain tumor	0.24	21,590	5174	0.14	33,907	4586
Dementia	6.3	16,584	105,163	4.9	11,292	55,176
Epilepsy	2.6	5221	13,800	2.7	5778	15,546
Migraine	49.9	370	18,463	40.8	662	27,002
Mood disorders[1]	33.3	3406	113,405	20.9	5066	105,666
Multiple sclerosis	0.54	26,974	14,559	0.38	23,101	8769
Parkinson's disease	1.2	11,153	13,933	1.2	9251	10,722
Psychotic disorders[6]	5.0	5805	29,007	3.7	9554	35,229
Stroke[2]	1.3	21,000	26,641	1.1	19,394	21,895
Traumatic brain injury [2,6]	1.2	4209	5085	0.71	4143	2937
Total	178.5	2672	476,911	127.0	3040	386,175

[1]Referred to as “affective disorders” in 2005, [2]includes only incident cases in 2010, [3]weighted mean from all countries and diagnoses [5]including also persons with zero costs, [6]excluding indirect costs, [7]excluding PTSD.

Gustavsson et al. Eur Neuropsychopharm 2011

EBC RESEARCH PROJECT
THE **VALUE OF TREATMENT** FOR BRAIN DISORDERS

The Value of Treatment

European Brain Council

- Innovation in technology and medical processes are rapidly revolutionising human life.
- Current health systems have not been able to adapt quickly enough to meet the needs of patients.
- **Particularly true for brain disorders.**
- **Value-based healthcare** is currently the desired solution to improving health systems in Europe.
- **Holistic approach** towards coordinated, integrated care models intertwining patient and societal outcomes
- This implies:
    - developing a **workable model of care for brain disorders** based on ‘case studies’ (patient journey)
    - demonstrating what are **(cost)-effective interventions** and conduct cost effectiveness analysis
    - based on economic evidence, **providing policy recommendations** (policy development and multi-stakeholder engagement)

Access to MS disease modifying treatment in Europe

1.4 What % of the total population of people with MS does actually receive DMD treatment* in your country?

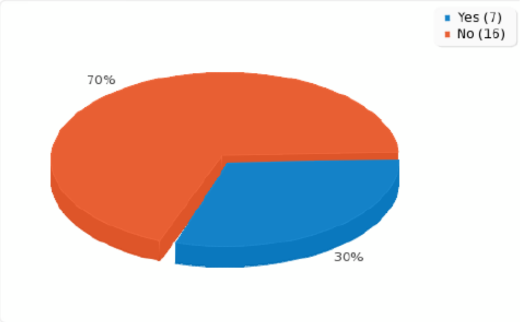
**DMD treatments include: Avonex, Betaseron, Copaxone, Novantrone, Rebif, Tysabri, Extavia and Gilenya.*

Country	*% of the total population of people with MS does actually receive DMD treatment*
Austria	65
Belarus	0
Belgium	70
Croatia	20
Czech Republic	25
Denmark	40
Finland	50
Germany	70
Greece	70
Iceland	70
Ireland	unknown
Italy	65
Norway	45
Poland	11
Portugal	70
Romania	25
Russia	40
Serbia	10
Slovakia	unknown
Spain	55
Sweden	45
Switzerland	unknown

MS Barometer 2013

Widespread health inequalities revealed

1.5 Is there a limit to the number of people with MS eligible to receive DMD treatment?



Replies	Countries
Yes	Belarus, Croatia, Czech Republic, Ireland, Poland, Romania, Serbia
No	Austria, Belgium, Denmark, Finland, Germany, Greece, Iceland, Italy, Norway, Portugal, Russia, Slovakia, Spain, Sweden, Switzerland, UK

The Value of Treatment in MS

Early treatment has been shown to reduce conversion of a first clinical demyelinating event (CIS) to multiple sclerosis (MS)

Current gaps of knowledge

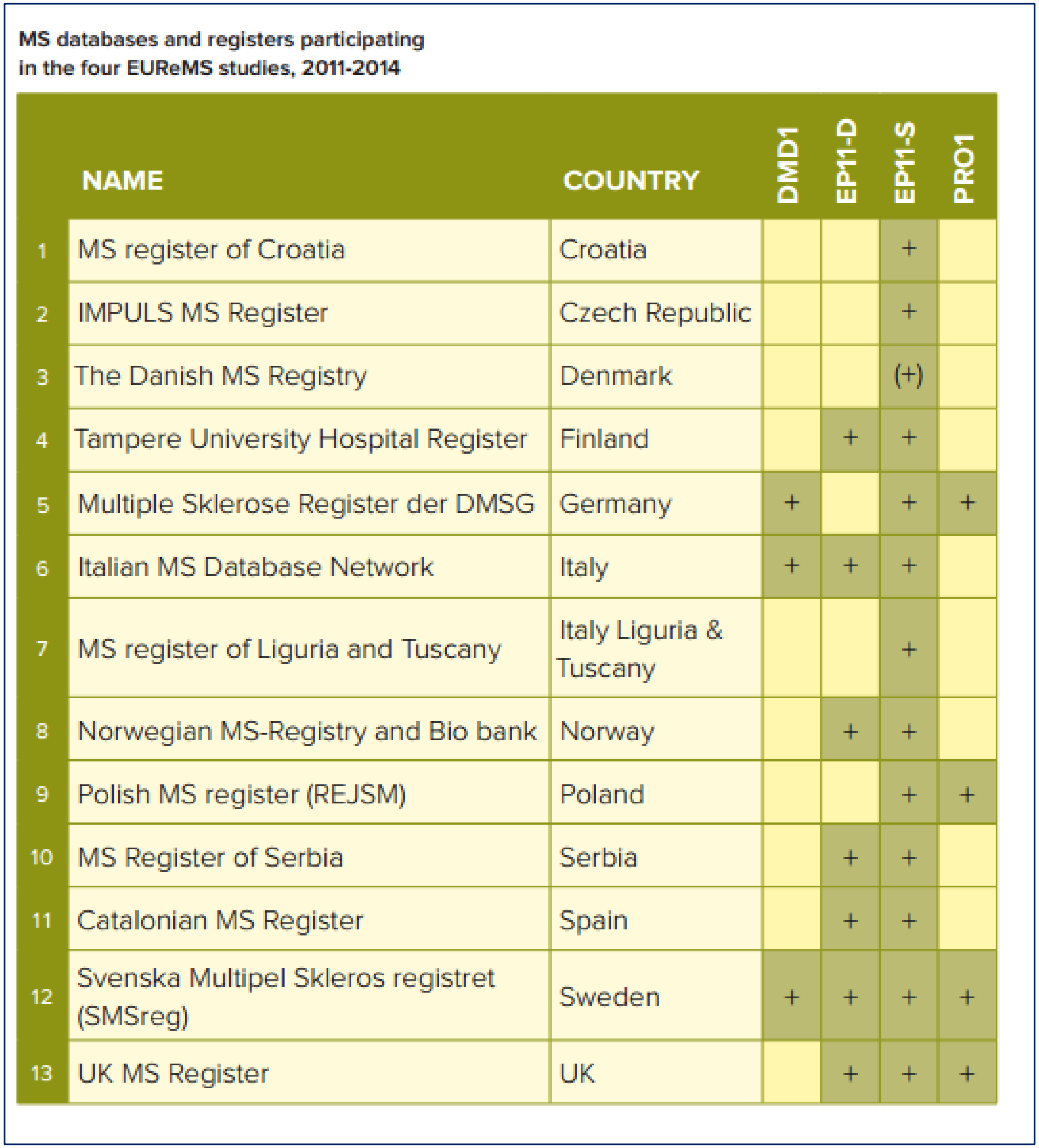
Need for better outcomes from:

- Clinical perspective
- Health care perspective
- Public health perspective
- **MS Patient perspective (PROs, PCOs)**

Need for better data collection:

- We need comparable sets of MS data across EU
- We can benefit of existing MS data collection
- Fruitful attempts have been made to harmonize and merge existing MS data sets
- **Indeed, there is now a great potential for consolidating a European MS Register**

Existing MS data collection & outcomes



MS databases and registers participating in the four EUReMS studies, 2011-2014

	NAME	COUNTRY	DMD1	EP11-D	EP11-S	PRO1
1	MS register of Croatia	Croatia			+	
2	IMPULS MS Register	Czech Republic			+	
3	The Danish MS Registry	Denmark			(+)	
4	Tampere University Hospital Register	Finland		+	+	
5	Multiple Sklerose Register der DMSG	Germany	+		+	+
6	Italian MS Database Network	Italy	+	+	+	
7	MS register of Liguria and Tuscany	Italy Liguria & Tuscany			+	
8	Norwegian MS-Registry and Bio bank	Norway		+	+	
9	Polish MS register (REJSM)	Poland			+	+
10	MS Register of Serbia	Serbia		+	+	
11	Catalonian MS Register	Spain		+	+	
12	Svenska Multipel Skleros registret (SMSreg)	Sweden	+	+	+	+
13	UK MS Register	UK		+	+	+

"There is great a potential for consolidating a European MS Register….."

Pugliatti et al. Acta Neurol Scand 2012
https://www.ncbi.nlm.nih.gov/pubmed/23278653

Flachenecker et al. Multiple Sclerosis 2014
https://www.ncbi.nlm.nih.gov/pubmed/24777278

The Lancet Neurology. Making EUReMS count for people with multiple sclerosis. Lancet Neurol 2011.

european register
eurems
project of european multiple sclerosis platform

European Register for Multiple Sclerosis (EUReMS)

A tool to assess, compare and enhance the status of People with MS throughout the European Union - www.eurems.eu

3-year Project (2011-14)

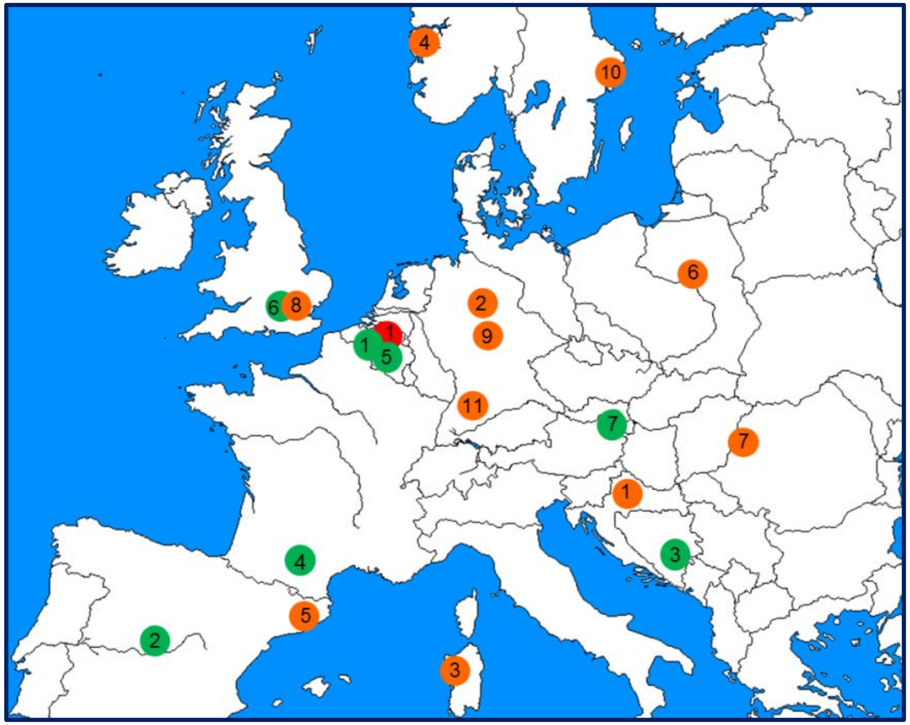
Co-funded (60%) by the European Commission

Public Health Programme, Call 2010
Priority area: 3.3.2 Promote health – Promote healthier ways of life and reduce major diseases and rare diseases

Launched in July 2011

Steering Committee, February 2010

Executive Agency for Health and Consumers



EUReMS Associated and Collaborating Partners

The Value of Treatment in MS: conclusions

Problem:

- PwMS' needs are not met by current health systems (access to treatment, preferences)

Identified solutions:

- **VALUE-based healthcare**
  - →**Holistic approach** to VALUE: patient and societal outcomes other than health care and clinical perspective
  - →Need to develop a **workable model of care for MS** based on 'case studies'
  - →Need to identify **(cost)-effective interventions and provide policy recommendations**

Gaps of knowledge:

- Description of the **MS patient journey** to develop 'case studies'
- Better clinical outcomes
- Patient reported/centered outcomes (preferences)

Best forseen tools:

- Consolidation of a European MS Register
- Consolidation of a multi-stakeholder engaged network at EU level [research funding bodies (e.g. EC), regulators (e.g. EMA), health care payers (eg., HTA bodies), Pharma, and Patients' advocacy bodies].

Executive
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Thank you