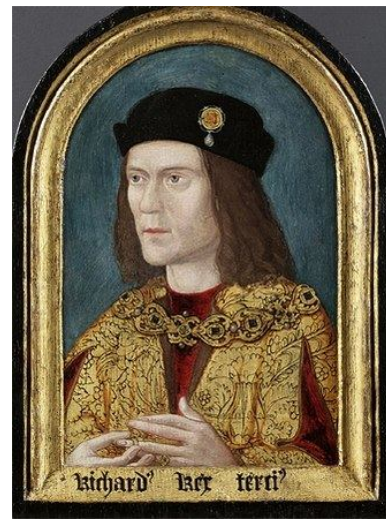


Velkommen til  
**CP-KONFERANSEN**  
21-22 MARS 2024



*Cheated of feature by dissembling nature  
Deformed, unfinish'd, sent before my time  
Into this breathing world, scarce half made up  
And that so lamely and unfashionable  
That dogs bark at me as I halt by them*



Shakespeare, King Richard III (I, 1)

- Should cerebral palsy (CP) be called CP?
- Is it a disorder or a condition?
- Is it appropriate and useful to regard CP as a spectrum?
- How operational can or should a definition be?
- Can we better delineate timing and non-progressiveness?
- How do we describe motor and non-motor features?
- Should we emphasize the lifelong course, the impact on participation?
- How do we account for medical, social, political, and personal dimensions?



Horton



welfare  
poverty  
tuberculosis  
polio





DEVELOPMENTAL MEDICINE & CHILD NEUROLOGY



## The metaphysical model of disability: is this a just world?

Dan DMCN 2021

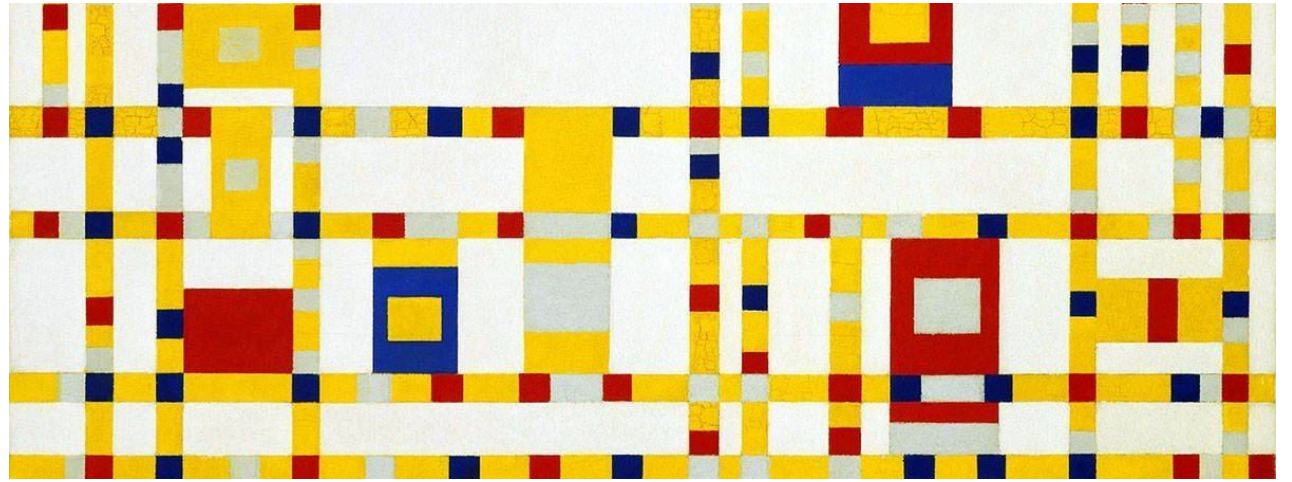
Throughout history, disability has been understood in many cultures as the manifestation of a higher power, whether as divine punishment and/or penance.<sup>1</sup> With variations in belief systems, this metaphysical view suggests that people endure physical suffering for their sins (or the sins of others). With progress in medical knowledge and also a considerable degree of secularization (particularly in the last 200 years), disability is now primarily viewed in medical terms, as the consequence of biological factors. In this biomedical model, health experts identify a person's impairments and limitations, and then take appropriate action to improve them.

It is noteworthy that both the metaphysical and medical models focus on the disabled person as the source of their problems. By contrast, the social model considers that disability results from environmental conditions preventing disabled persons from realizing their full potential and par-

studies has documented a widespread co-whereby one gets what one deserves or deserves.<sup>3</sup> This reflects a belief in some sort of universe that restores moral balance, which has been the just-world fallacy. This belief is thought to enable people to engage in long-term goals.<sup>3</sup> However, research has concentrated on negative implications: a tendency to rationalize people's suffering, the victims of misfortune for their own fate. As a result, people with health problems, for example, of chronic pain, are stigmatized, and higher levels of derogation have been documented for those with more severe conditions.<sup>4</sup> People who believe in a just-world beliefs tend to have more negative views of disabled people and experience more discomfort with them.<sup>5</sup> Just-world beliefs thus enhance the disenfranchisement of disabled individuals.

We can, on the contrary, transform our

- rehabilitation
- multidisciplinary
- special education
- reference centres



## *habilitation vs rehabilitation*

THE LANCET  
Neurology

Towards improving outcomes in motor disorders associated  
with cerebral palsy



Saranda Bekteshi, Elegast Morbalu, Sarah McIntyre, Gillian Saloojee, Sander R Hiberink, Nana Tatishvili, Bernard Dan

# Neuroscience underlying rehabilitation: what is neuroplasticity?

Dan DMCN 2019

Neuroplasticity generally refers to the capacity of neural networks to change their connections in response to experience. However, can therapy induce neuroplasticity? And does neuroplasticity contribute to functional rehabilitation? Affirmative answers to these questions have become the tenets of therapy and rehabilitation. They provide a mechanistic understanding, inform clinical work, and thereby, growing evidence base for specific practices. Various behavioural, ne



On a wider scale, structural neuroplasticity involves regional volume changes or the formation of new neural pathways, through synaptogenesis, axonal or dendritic sprouting, changes in myelin, or production of new neurons. The latter was long held to be impossible in the human brain beyond infancy (in contrast to other mammals), but the generation of neurons, whose function remains to be further clarified, has now been documented in several parts of the adult human brain.<sup>4</sup> Yet, more relevant mechanisms to neurodevelopmental

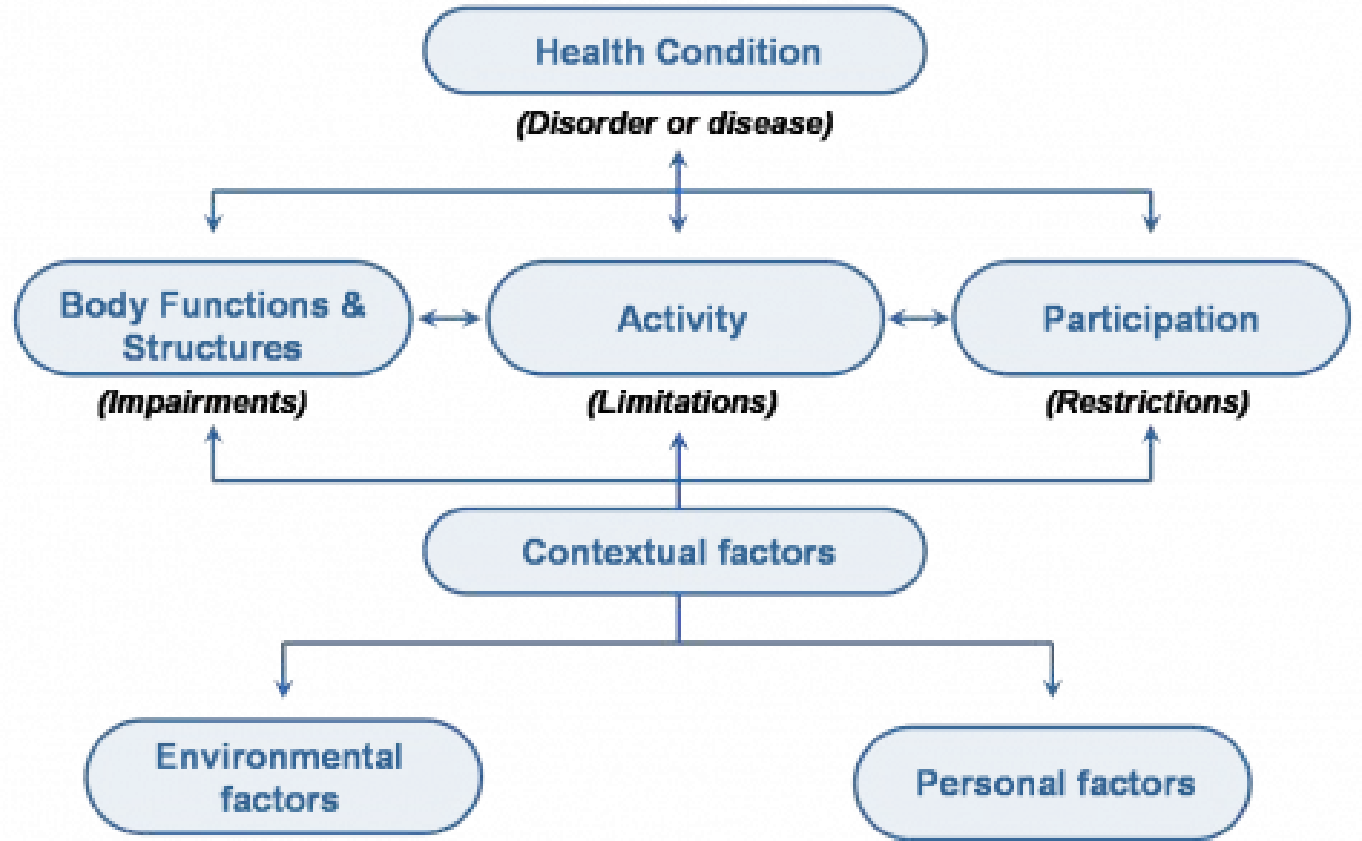
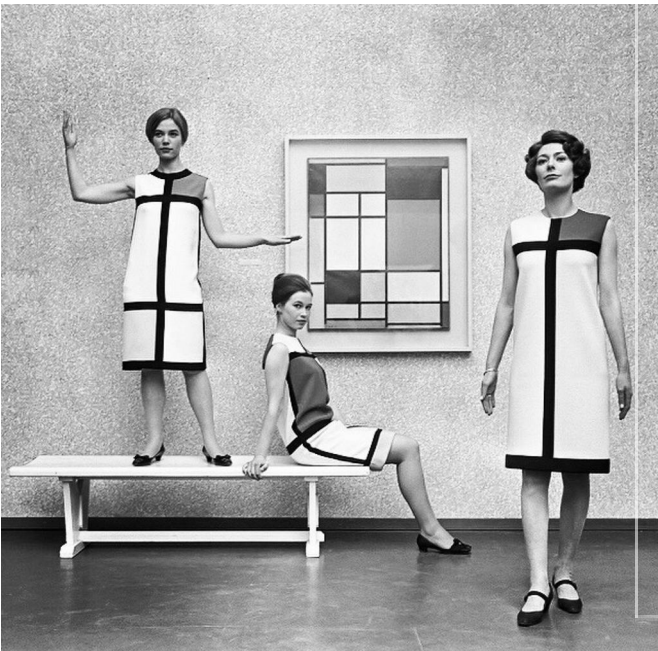
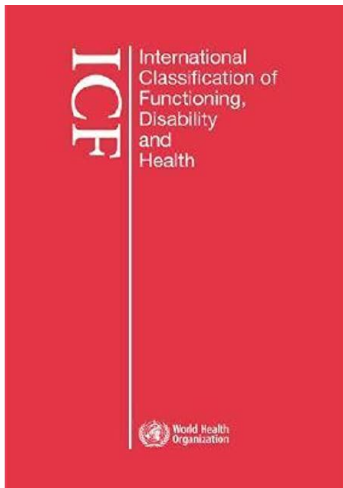
# Intensive repetitive motor training: how does it work in children with cerebral palsy?

Dan DMCN 2021

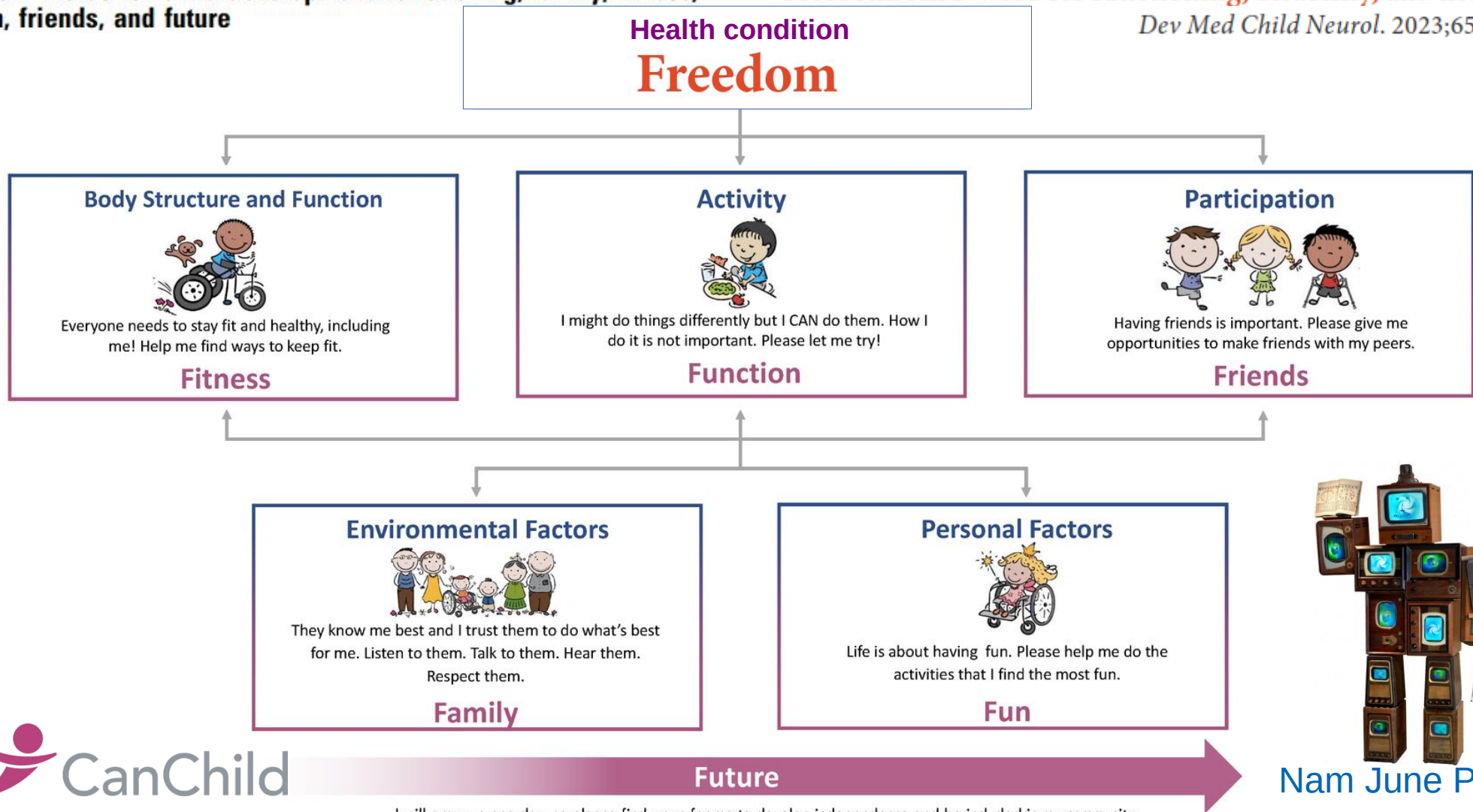
Intervention approaches for neurodevelopmental disability draw from the knowledge, experience, and evidence from rehabilitation of adults with acquired brain injury. In those interventions, intensive repetitive motor training has been successfully adapted, particularly in management of children with cerebral palsy (CP). Further research is required about goal setting, involvement of caregivers and pro



include spinal circuits and deep brain structures. A target appears to be the cortex, with neurophysiological and neuroimaging studies associated with intensive motor training in children with impairment show some inconsistencies, but generally point to increased markers of connectivity within brain areas relating to the task, from reduced to



Cieza & Kostansjek. The International Classification of Functioning, Disability and Health: the first 20 years. DMCN. 2021



Nam June Paik

I will grow up one day, so please find ways for me to develop independence and be included in my community.

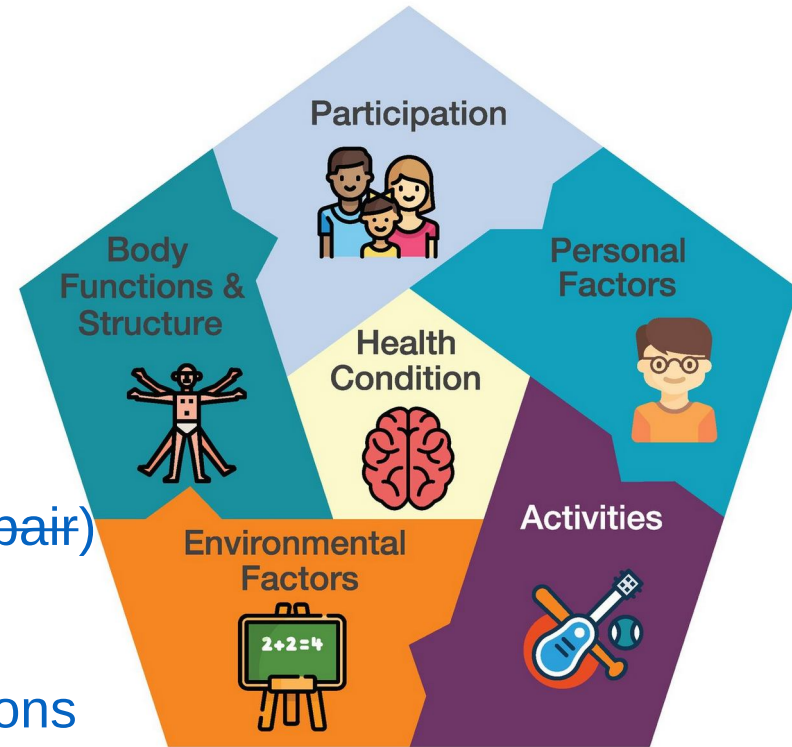


# Current perspective on health conditions



Caharija

- Enhance functioning
- Social and cultural conditions
- Person-driven goal setting (repair)
- Relevance to themselves
- Aspirations rather than limitations



# Human enhancement: from disability to superability

Advances in technology increasingly allow people to improve selected aspects of their body structure and function. At work, in sports and leisure activities, and at home, a host of drugs and devices are increasingly available to expand body and mind, while research and industry are continually exploring and developing more substances, apparatus, and these developments is meant to serve the current philosophers tend to consider endeavours to ameliorate the human characterize the project as human enhancement – temporary or permanent – to the limitations of the human body by artificial means (<https://ieet.org/index.php/humanenhancement>).

is also an apt general description of the proposed for people with impair-

normalcy and presumed fixed boundaries to typical human functioning. Management ultimately aims to optimize participation and quality of life. When facilitating functioning of individuals with impairments, even using technologies that are emblematic of human enhancement (e.g. intelligent prosthetics, neural-control interface devices, and brain stimulation techniques), the target is not to provide people with artificial body parts that enhance function embodied through use-dependent connectivity.<sup>3</sup> This is no different

It may prove useful to include a focus on an imagined cooperation between disability management. Emerging function-enhancing technologies have a great impact on pe



Lenkiewicz



Pearlstein

# Rehabilitative and therapeutic neuroarchitecture

Dan DMCN 2016

When assessing people's functioning and health we are increasingly taking account of the potential or actual influences of the physical attributes of their direct environments. In the current framework of the International Classification of Functioning, Disability and Health (ICF), such contextual factors are regarded as either facilitators of, or barriers to, a person's functioning. This development mirrors recent interest within the field of architecture and design in the effect of man-made structures on the human central nervous system. The ambition of neuroarchitecture as a field has been to promote the study of the perception of, and response to, architectural stimuli in order to provide a strong evidence base for designing places and spaces that provide a positive context for human experiences.<sup>1</sup>

Several functions have been the focus of investigation, including sensation and perception, movement, navigation, decision-making, learning and memory, and emotion. Data emerging from these studies may be used when designing private or public structures for general purpose. It may

effectiveness, and staff retention, following environmental arrangements such as appropriate lighting, direct access to daylight, noise reduction, or provision of respite areas.<sup>2</sup>

To date, the principles of therapeutic architecture have been purposefully used in only a limited number of buildings, mostly general hospitals and departments or institutions of geriatrics, psychiatry, or rehabilitation, with generic objectives such as 'enhancing well-being'. The facilities may also feature specific landmarks supporting sensory and cognitive processing, social interaction, or motor cognition, though there has been little objective evaluation of these effects.

In contrast, therapeutic gardens have been very popular.<sup>4</sup> They are now quite common in children's hospitals; oncology, mental and behavioural health or dementia care facilities; homes for the elderly; and other settings in the community. There is a growing body of evidence on the benefits of therapeutic gardens to the health of patients, staff, and visitors.<sup>4</sup> Yet, many of the designated therapeutic

# Postmodern family-centred care for disability

Dan DMCN 2021

Family-centred care has emerged over the last few decades as an aspirational standard for good clinical practice. It has been promoted for planning, delivering health services in individuals and their unique partnership between providers, family members. The approach typically strengths rather than deficits, and emphasizes well-being and their involvement in decision-making. Family-centred care was originally conceptualized based on the recognition of the importance of family dynamics and relationships in all aspects of functioning and experiences. The family is considered constant in the child's life, providing knowledge of the child's specific needs and abilities. Family-centred care therefore posits the family rather than the individual as the focus for health services. By extension, organizing care around the whole family is increasingly relevant for almost all patient groups regardless of age.

Studies have documented a variety of practices, observed in family-centred care, and family-centred families.

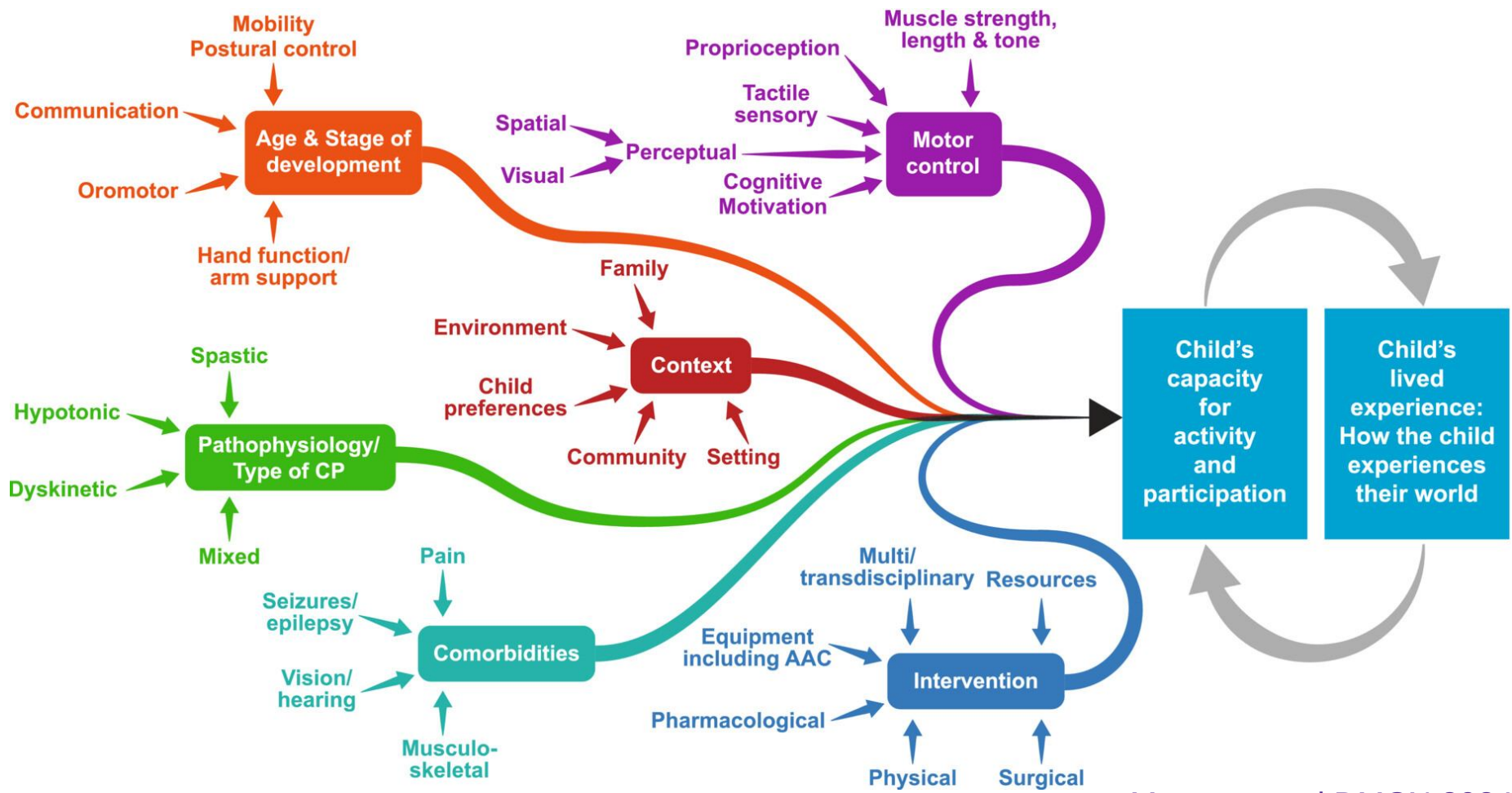
Rather, they focus on cultural meaning, role in social forms and processes, and systems of interpersonal relationships.

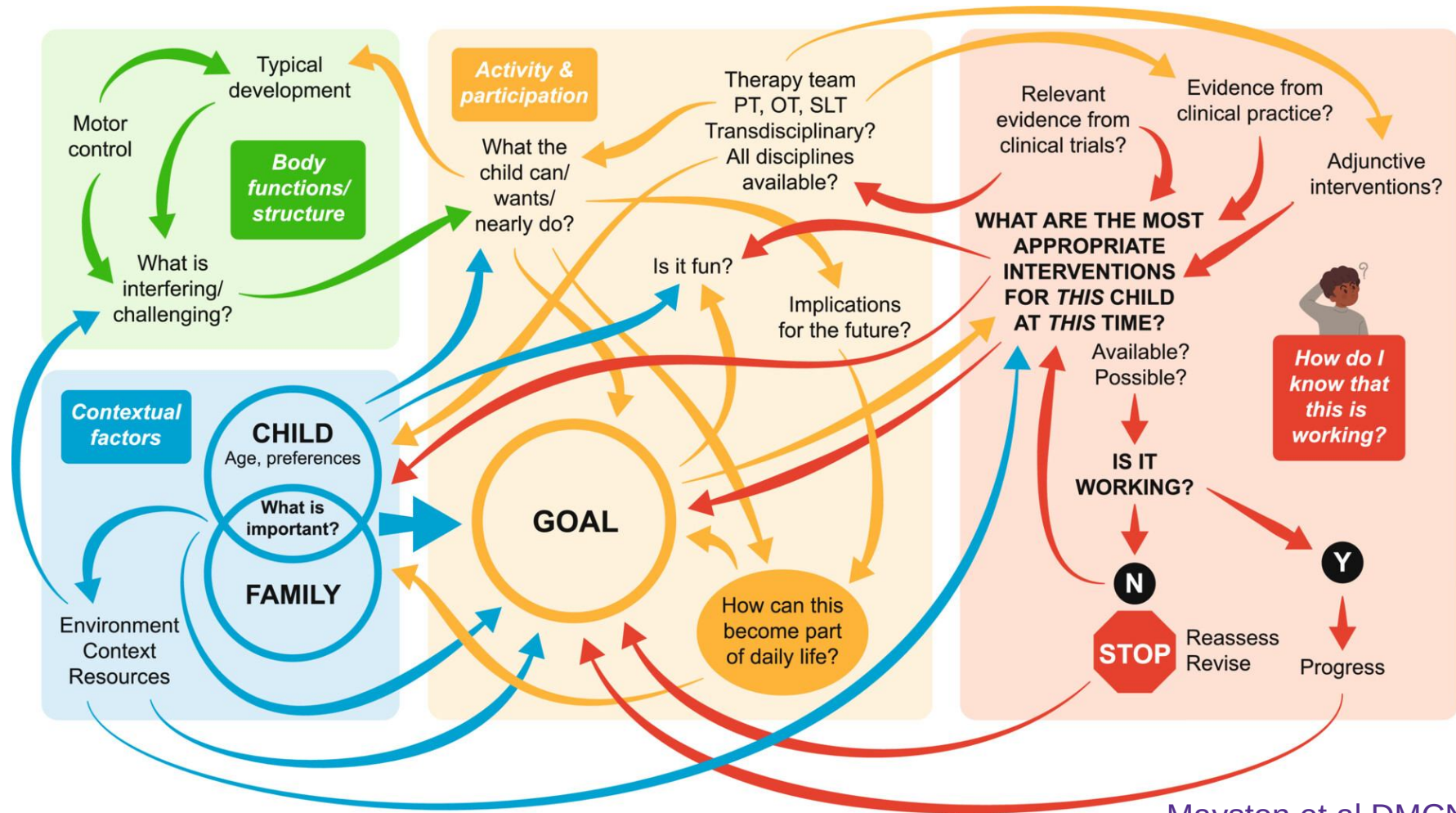


Family dissociates biological from the continuation of social relationships, emphasizing psychosocial rather than biological aspects, along with the fact that the heterosexually married couple is now in the minority in many societies. There have been profound changes in the family. There are now many families that did not exist previously (or were rare) and successive shifts and spread of family types through relationship breakdown and the formation of new families that seem to have the same function but are organized differently.

In order not to overlook the importance of wider, meaningful social connections when providing family-centred care, it is important not to focus solely on a self-contained unit, as though families were private realms.







# Complex developmental disability: a case of 'simplicity'?

Dan DMCN 2021

Clinical complexity is common in developmental medicine. It involves diagnosis, management, and a range of challenges in carrying out procedures and interventions. Diagnosis may be hampered by difficulties in recognizing and interpreting symptoms, such as subtle psychological manifestations, as well as by the aspects. Making diagnoses may also be challenging within the framework of current nosology, due to the distinction between generic and more specific diagnoses. A vexed question of whether comorbidity is independent or related conditions.

The medical aspects are used to characterize 'complexity'.<sup>1</sup> These children have medical frailty and difficult-to-meet care needs, often a multisystem disease, a neurological condition, functional impairment, or dependence on technology. Additional important factors contribute to complexity, including developmental, psychological, cultural, and social determinants, as well as those relating to caregivers and soci-



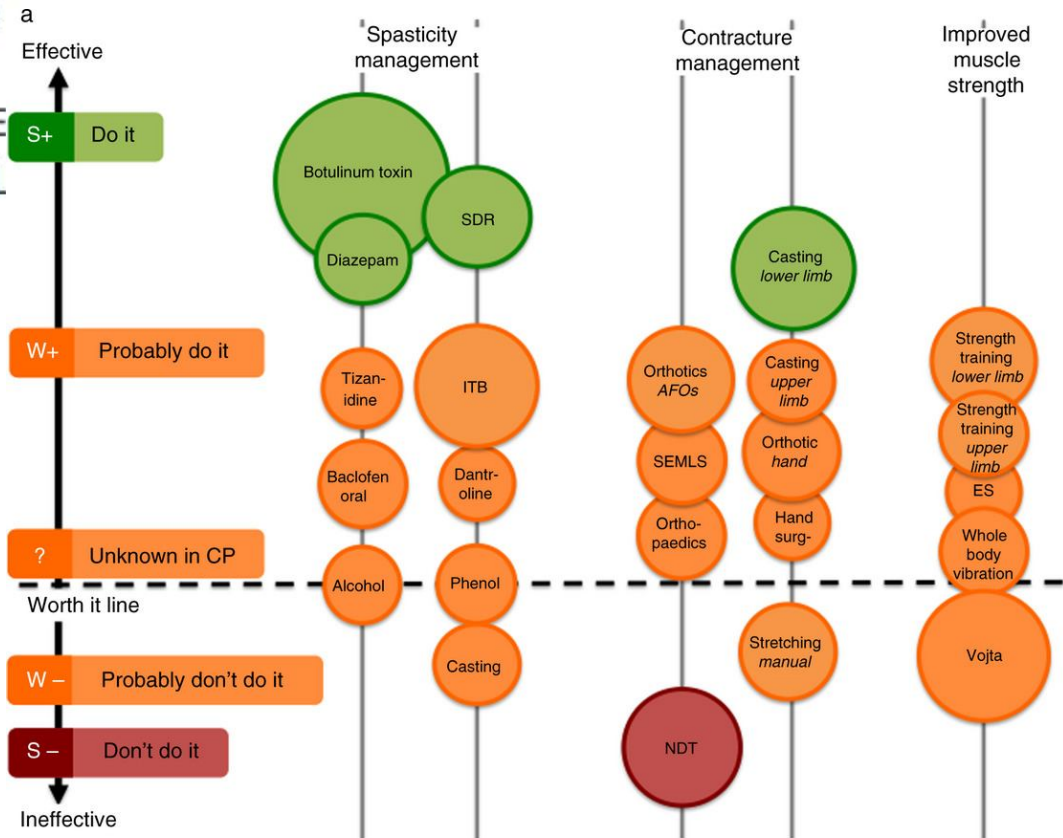
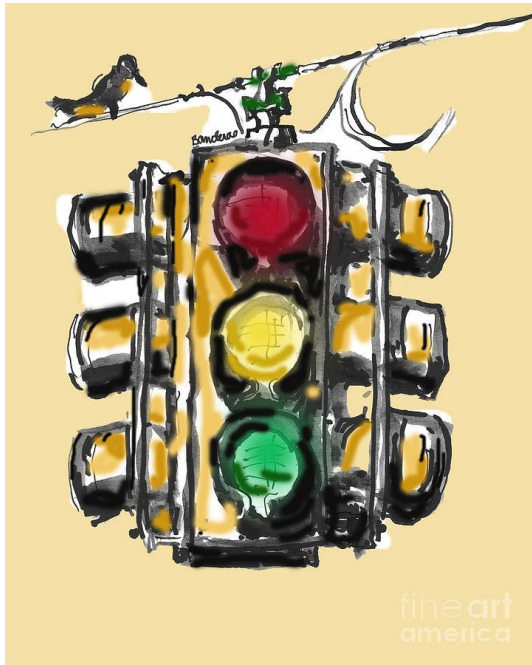
for certain activities), plan interactions (e.g. within the judgments and decisions (e.g. about), when approaching complex development might be possible not to require the elements potentially provided by clinical assessment tools. These might actually present irrelevant information that is ill-met mental uncertainty of situations and e offered. Instead, clinical situations of fostering links between organizing, indeed storytelling.<sup>3</sup> Solutions to that the context of 'simplicity', understood to relate complexity of thought with necessity. Such solutions would be 'neither summaries', but 'new ways of asking questions at the cost of occasional detours, but, more effective actions'.<sup>4</sup>

What is required to find 'simplex' solutions to improve the lives of individuals with complex developmental disability?




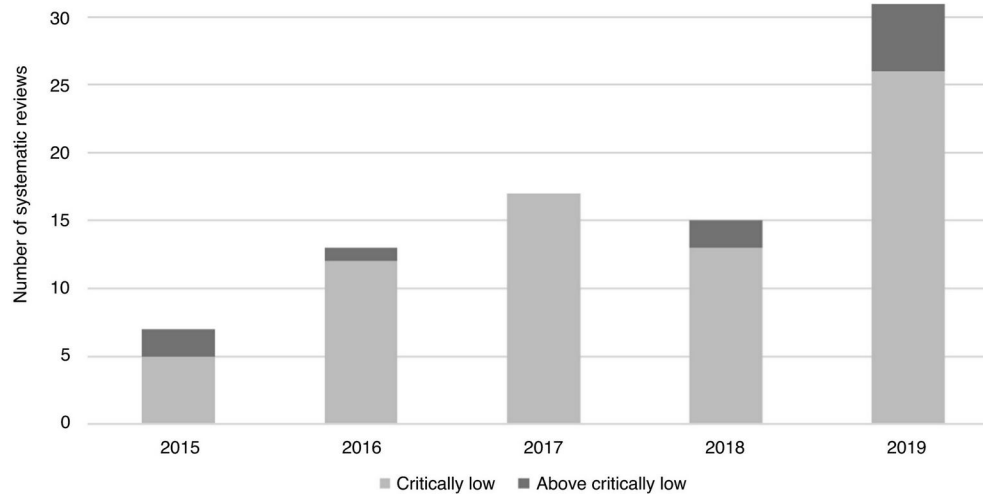
# A systematic review of interventions for children with cerebral palsy: state of the evidence

IONA NOVAK<sup>1,2</sup> | SARAH MCINTYRE<sup>1,2</sup> | CATHERINE  
 NATALIE MORTON<sup>1</sup> | ELISE STUMBLES<sup>1</sup> | SALL



# Quality appraisal of systematic reviews of interventions for children with cerebral palsy reveals critically low confidence

KAT KOLASKI<sup>1,2</sup>  | LYNNE ROMEISER LOGAN<sup>3</sup> | KATHERINE D GOSS<sup>3</sup> | CHARLENE BUTLER<sup>4</sup>

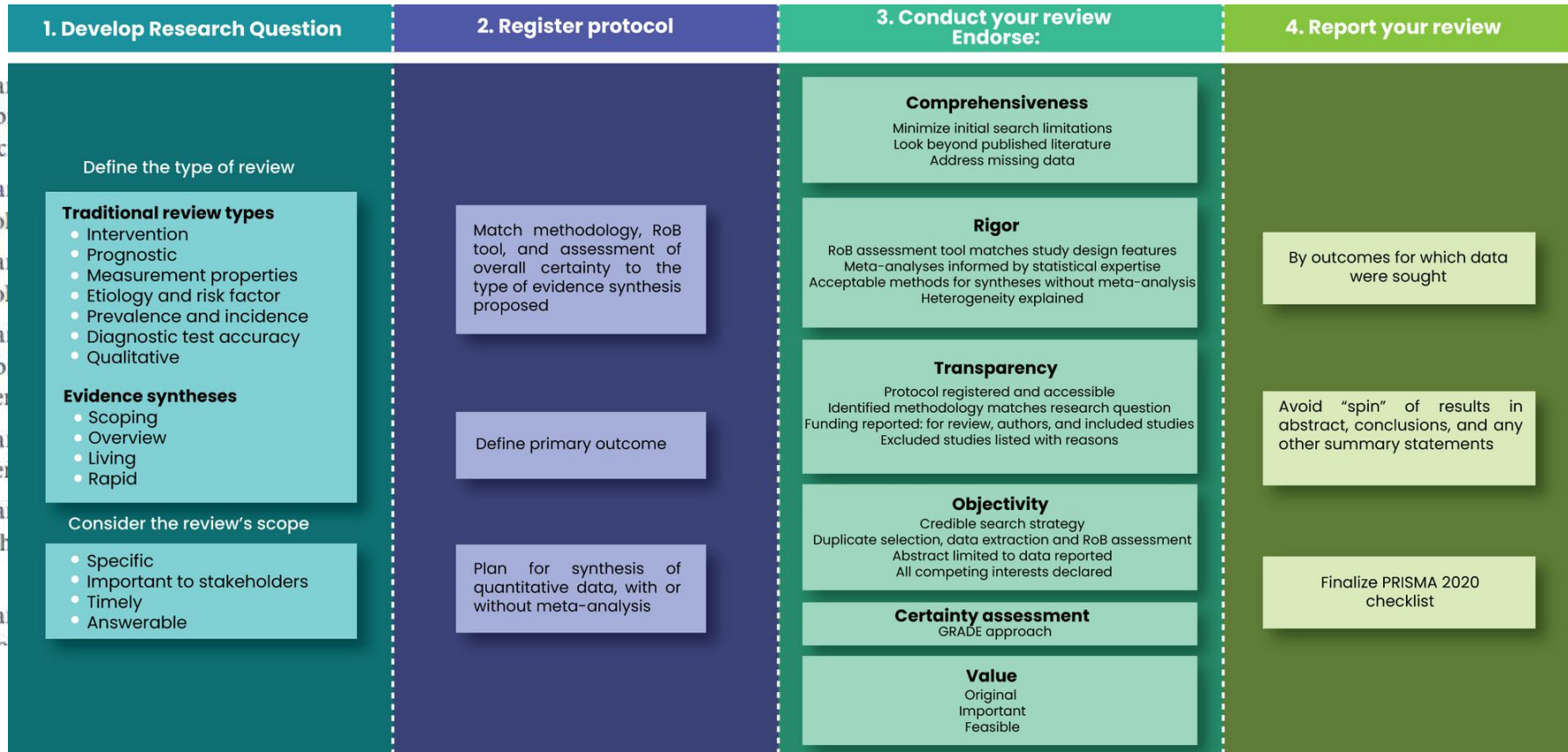


# Principles for good scholarship in systematic reviews

Kat Kolaski<sup>1,2,3</sup> 

Lynne Romeiser Logan<sup>4</sup> 

John P. A. Ioannidis<sup>5,6,7,8</sup>



<sup>1</sup>Depa Rehab Medic  
<sup>2</sup>Depa School  
<sup>3</sup>Depa School  
<sup>4</sup>Depa Rehab Univer  
<sup>5</sup>Depa Univer  
<sup>6</sup>Depa Health USA  
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# GUIDE-Rehab (GUIDeline of Interventions DESCRIPTION in Rehabilitation) reporting guideline

GUIDE-rehab is a reporting guideline developed to report in all due details interventions to optimize functioning performed in the field of rehabilitation. GUIDE-Rehab is grounded on the many years of methodological work by Cochrane Rehabilitation and the Rehabilitation Treatment Specification System

working group of the American Congress of Rehabilitation Medicine (ACRM).

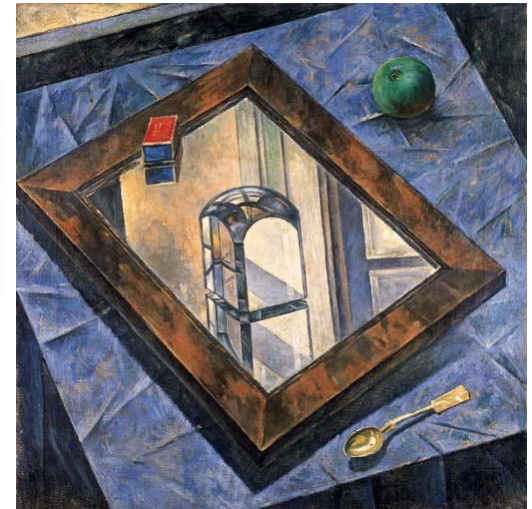
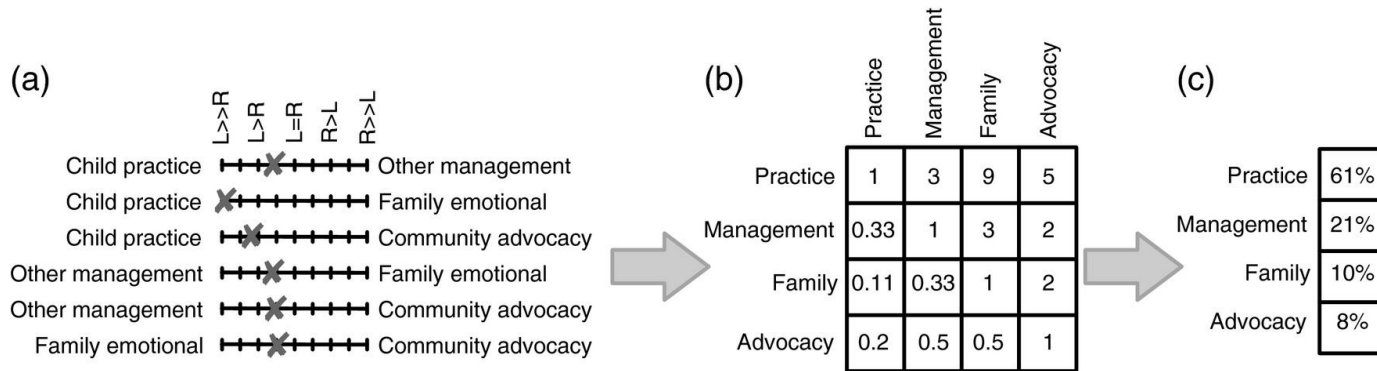
for all details about why and how the GUIDE-Rehab reporting guideline was produced, refer to the full paper.



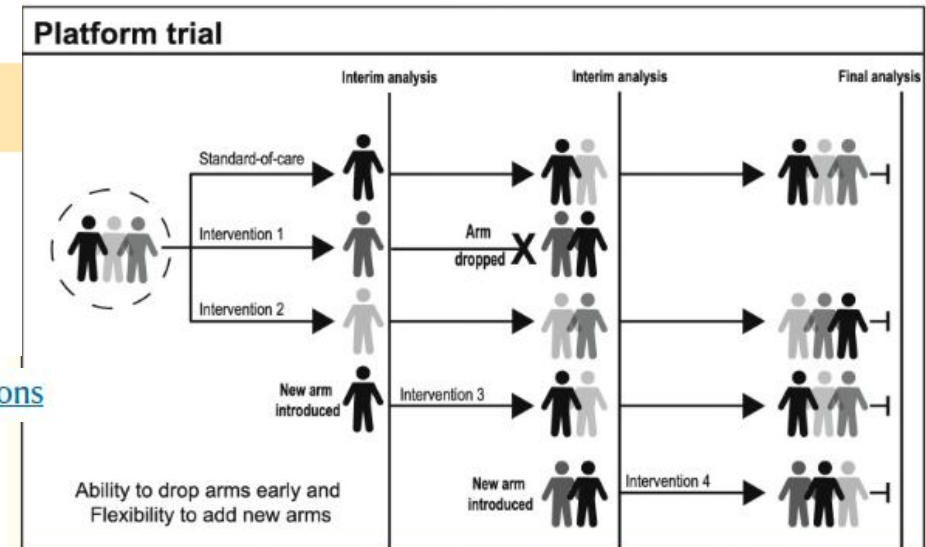
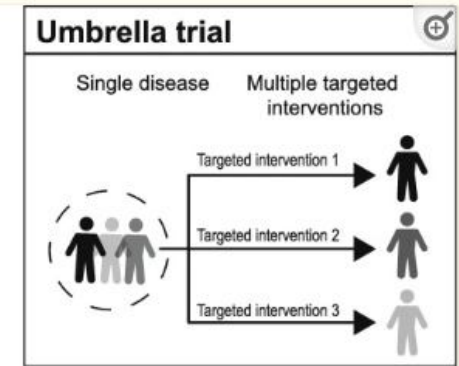
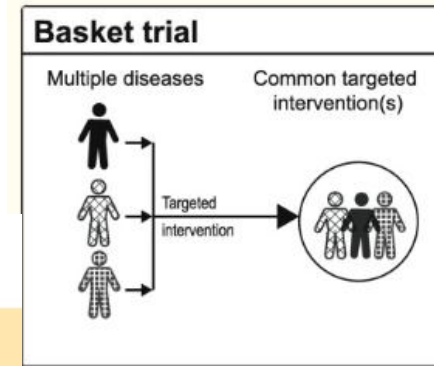
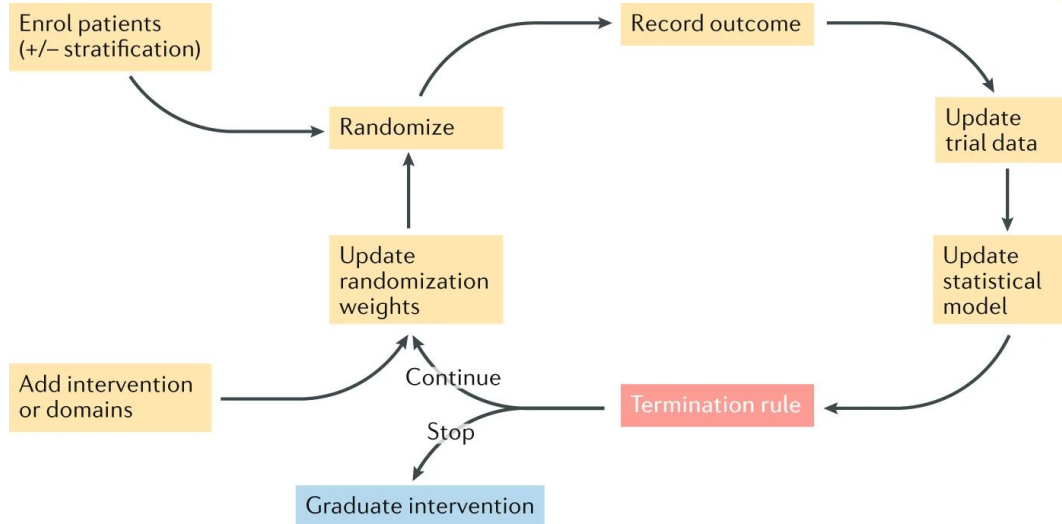
**Cochrane**  
**Rehabilitation**

# Paediatric Rehabilitation Ingredients Measure: a new tool for identifying paediatric neurorehabilitation content

ROB FORSYTH<sup>1,2</sup>  | DAVID YOUNG<sup>3</sup> | GEMMA KELLY<sup>4</sup> | KATHY DAVIS<sup>4</sup> | CAROLYN DUNFORD<sup>4</sup> | ANDREW GOLIGHTLY<sup>5</sup> | LINDSAY MARSHALL<sup>6</sup> | LORNA WALES<sup>4</sup>



# What research methodologies could make a difference in disability?



[Adaptive platform trials: definition, design, conduct and reporting considerations](#)

nature reviews drug discovery

# Individuals with lived experience of disability should participate in every stage of research

Individuals with impairments involved in disability research have historically been treated as passive subjects; their

including research and scientific publishing.<sup>4</sup> It may be unclear, however, who the 'Us' refers to. In other words,

## Relational ethics, informed consent, and informed assent in participatory research with children with complex communication needs

Leni Van Goidsenhoven<sup>1</sup>  | Elisabeth De Schauwer<sup>2</sup>

<sup>1</sup>Department of Philosophy, University of Antwerp, Antwerp, Belgium

<sup>2</sup>Department of Special Needs Education/ Disability Studies, Ghent University, Ghent, Belgium

### Abstract

There is a need for qualitative participatory research involving children with intellectual disability and complex communication needs (CCNs), but procedural ethics

# Ableism's pervasive impact in healthcare: A time for action

Kristie Patten 




New York University, Office of the President, New York, NY, USA



The study by Ames et al.<sup>1</sup> highlights the pervasiveness of systemic ableism in healthcare systems. Disability-related discrimination

and impairments to practices.<sup>4</sup> Lawrence

## Impact of disability-based discrimination in healthcare on parents of children with medical complexity

Stefanie G. Ames<sup>1</sup>  | Rebecca K. Delaney<sup>2</sup> | Claudia Delgado-Corcoran<sup>1</sup> |  
Amy J. Houtrow<sup>3</sup>  | Justin Alvey<sup>1</sup> | Melissa H. Watt<sup>2</sup> | Nancy Murphy<sup>1</sup> 

<sup>1</sup>Department of Pediatrics, University of Utah School of Medicine, Salt Lake City, UT, USA

<sup>2</sup>Department of Population Health Sciences,

### Abstract

**Aim:** To qualitatively assess the impact of disability-based discrimination in health



# From paediatrics to geriatrics: ageing with a neurodevelopmental disability

Dan DMCN 2018

Like everyone else, people with neurodevelopmental disorders experience continuous, complex anatomical changes in the developing nervous system and other body systems, with substantive implications for clinical expression, outcomes, and management. Compared to early childhood, these changes are dramatically reduced in adulthood. However, various complications may occur, including motor and cognitive disorders. Some progressive problems are associated with chronic disease, such as hip dysplasia and osteoarthritis in cerebral palsy. Adults with neurodevelopmental disabilities require specific expertise and there is an urgent need to promote this expertise among a variety of healthcare professionals.<sup>1</sup> Paraphrasing the paediatric motto 'children are adults', adults with neurodevelopmental impairments should be treated as big children with developmental impairments.

Changes in adults' lives have been reported with advancing age, e.g. increasing fatigue.<sup>2</sup>

of childhood disability.<sup>4</sup> Non-specific clinical presentations of incurring diseases are also common from early childhood; so too are issues related to multiple medications (polypharmacy) with increased risk of drug interactions or adverse effects taking



liver functions, necessarily so-called 'geriatric giants' (osteoporosis, dementia, instability, incontinence) as well as the 'modern' geriatric syndromes (anorexia, and cognitive decline). However, in neurodevelopmental disability, these conditions may never be identified and treated. Institutionalization, if necessary, ageing need not be an

basic science evidence of neurodevelopmental disability in young adults and the

# Childhood-onset disability: Lifelong realities require lifespan training

Dan DMCN 2024

‘Children are not small adults!’ This aphorism guides much of the thinking, clinical practice, and research in our field. The corollary is that ‘adults with neurodevelopmental impairments are not big children with neurodevelopmental impairments’. This idea should serve as an equally strong principle to provide specialized appropriate care to ‘former children’, as their needs and challenges differ significantly, and require a tailored approach that considers the complexities of chronic disorders that persist into adulthood. However, young people transitioning to adulthood often face a major gap in expertise within health disciplines and service organization to address those unique needs.<sup>1</sup> For want of more suitable options, a small proportion of these adults continue to be followed by their paediatric specialists; more often, the necessary multidisciplinary experience and

Building on a few successful initiatives, specific teaching



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- Goal-setting – Child/family-centred
- Intervention ingredients/Methodologies/Clinician
- New categories – AI
- Functioning/Context/Prevention
- Lifelong – Worldwide
- Social identity – ableism

 @ProfBernardDan

*Bernard Dan*



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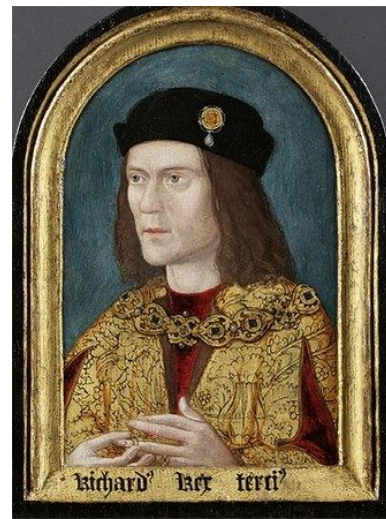
[www.eacd2024.org](http://www.eacd2024.org)



European Academy of  
Childhood Disability

 @ProfBernardDan

*Cheated of feature by dissembling nature  
Deformed, unfinish'd, sent before my time  
Into this breathing world, scarce half made up  
And that so lamely and unfashionable  
That dogs bark at me as I halt by them*



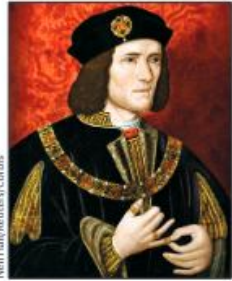
Shakespeare, King Richard III (I, 1)

## Case Report



# The scoliosis of Richard III, last Plantagenet King of England: diagnosis and clinical significance

Jo Appleby, Piers D Mitchell, Claire Robinson, Alison Brough, Guy Rutty, Russell A Harris, David Thompson, Bruno Morgan



Lancet 2014; 383: 1944



3D model of spine with replica polymer vertebrae created by laser sintering

Richard III was king of England from 1483 to 1485, after declaring his nephew, Edward V, illegitimate. On Aug 20, 1485, Richard was killed in battle with the rebel Tudor at Bosworth. His body was buried in the Greyfriars church until its excavation in 2012, which revealed a severe scoliosis.<sup>1</sup> The 1593 play *Richard III* ascribed Richard III as a hunchback, but the recent excavation of his remains has led to the question of whether this was the invention of his enemies

or a real physical disfigurement. The physical disfigurement from Richard's scoliosis was not present, and a normal foramen magnum makes a Chiari malformation unlikely. The subtle nature of the changes in vertebral anatomy suggest onset in the last few years of growth, which is compatible with adolescent onset idiopathic scoliosis, probably starting after 10 years of age.

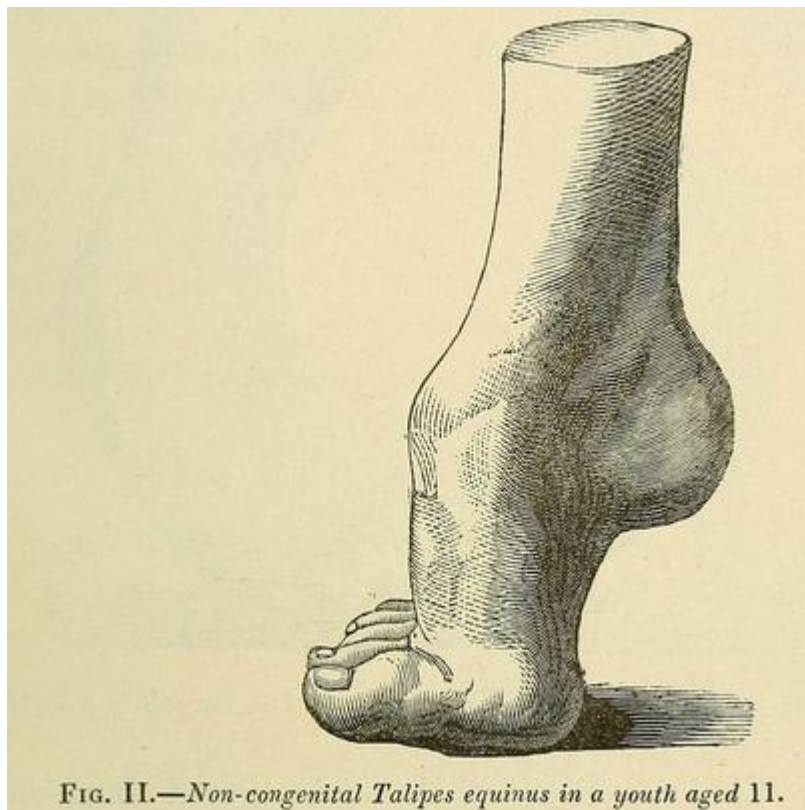
The physical disfigurement from Richard's scoliosis



## PERINATAL LESSONS FROM THE PAST

## Dr William Little (1810-1894) of London and cerebral palsy

Peter M Dunn

FIG. II.—Non-congenital *Talipes equinus* in a youth aged 11.

William Little was born in 1810 in Whitechapel where his father kept the Red Lion Inn. He was educated at a school near Dover and at the Jesuit College of St Omer in France. A left club-foot following poliomyelitis prevented sporting activities but he excelled academically, especially in languages.

In 1825 he was apprenticed to an apothecary, after which he studied medicine at the London Hospital, qualifying at the age of 20 and then entering general practice in London. However, after attending lectures at Guy's Hospital and University College, he decided to become a physician, visited Leyden, Leipzig, and Dresden and studied in Berlin, graduating MD in 1837. While in Germany, Stromeyer of Hanover had in 1836 successfully corrected his club-foot using subcutaneous tenotomy, and on returning to London, Little introduced this new technique, operating on a 15 year old boy in February 1837. Thus the treatment of deformities was brought into the province of surgery. Little was elected to the staff of the London Hospital in 1839 and the same year published a treatise on club-foot.<sup>1</sup> In 1840 he founded the Orthopaedic Institution which through amalgamation became the Royal National Orthopaedic Hospital in Great Portland Street. He also had appointments to the Royal Orphan Asylum, Wanstead, the Asylum of Idiots, Reigate, and the Royal Hospital for Incurables.

Little was a good all-round physician and

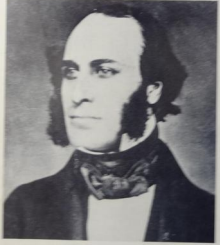


Dr William Little, 1810-1894.

or malformation of organ exists. These may be termed congenital malformations.<sup>7</sup> Another extract from the same text illus-

## “THE SOMETIME PHYSICIAN”

William John Little – Pioneer In Treatment  
of Cerebral Palsy and Orthopedic Surgery  
(1810-1894)



William John Little, M.D.  
about 1845

By  
JAY SCHLESINGER, Ph.D.

SIGMUND  
FREUD

INFANTILE  
CEREBRAL  
PARALYSIS

Translated by  
LESTER A. RUSSIN, M. D.

- Little, 1862 "Forstyrrelse som ser ut til å ramme barn i løpet av det første leveåret, og som påvirker progresjonen i utviklingsmessige ferdigheter og ikke bedres med tiden"
- Freud, 1868 "Infantil cerebral parese ville dermed bli definert som det generelle begrepet for alle hjernesykdommer i spedbarnsalderen forårsaket av en direkte effekt av en direkte effekt av cerebral parese på hjernen. cerebral parese i spedbarnsalder forårsaket av en direkte effekt av tilfeldig etiologi, enten i fosterlivet eller etter fødselen, og som påvirker enten ett eller flere nervesystemer"



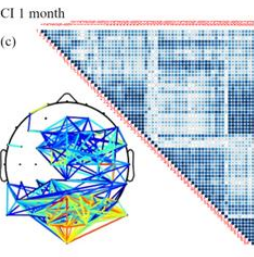
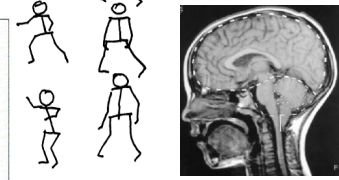
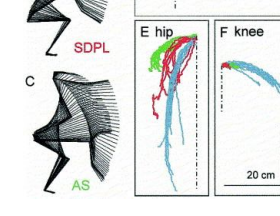
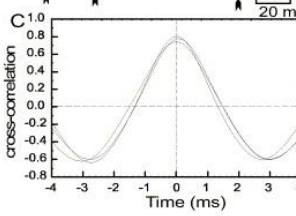
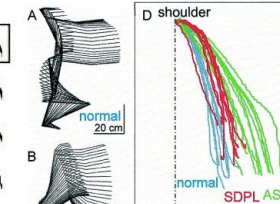
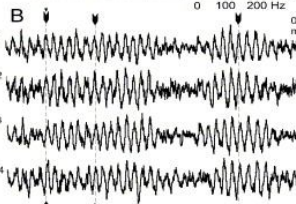
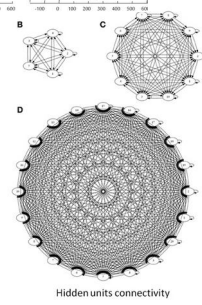
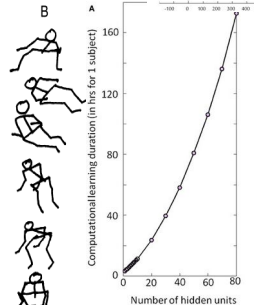
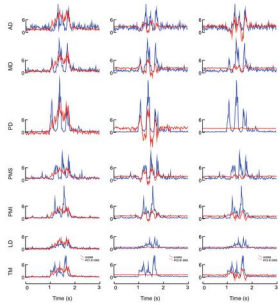
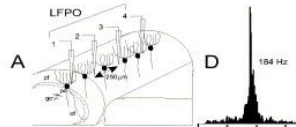
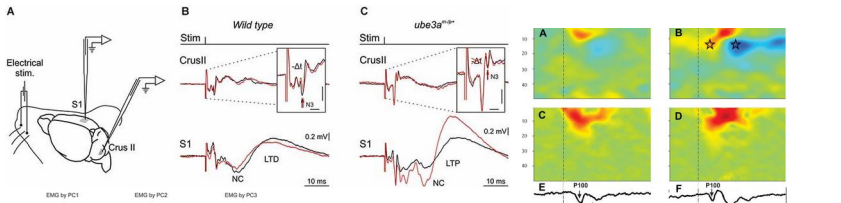
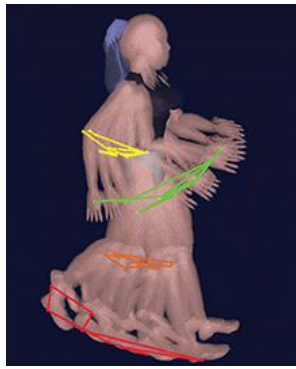
Perlstein, 1952 "Cerebral parese kan defineres som en tilstand som kjennetegnes av lammelse, parese, inkoordinasjon, dyskinesi eller en hvilken som helst avvikende motorisk funksjon som skyldes at hjernens motoriske kontrollsentre er involvert. motoriske kontrollsentre i hjernen"

- Little's Club, 1957 "Vedvarende, men uforanderlig, forstyrrelse av bevegelse og kroppsholdning, som opptrer i de første leveårene, og som skyldes en ikke-progressiv forstyrrelse i hjernen som fører til forstyrrelser under utviklingen"
- Bax, 1964 "Cerebral parese er en forstyrrelse av bevegelse og holdning som skyldes en defekt eller lesjon i den umodne hjernen"



- Mutch et al, 1992 "Cerebral parese er en samlebetegnelse for en gruppe ikke-progressive, men ofte skiftende, motoriske funksjonsnedsettelse som skyldes lesjoner eller abnormiteter i hjernen som oppstår tidlig i utviklingen".
- SCPE, 2000 "Cerebral parese er en gruppe lidelser, dvs. det er et generelt paraplybegrep; det er permanent, men ikke uforanderlig; det innebærer en forstyrrelse av bevegelse og/eller holdning og motorisk funksjon; det skyldes en ikke-progressiv forstyrrelse/skade/avvik; denne forstyrrelsen/skaden/avviket oppstår i den utviklede/umodne hjernen".





# Developmental Medicine & Child Neurology



@ProfBernardDan

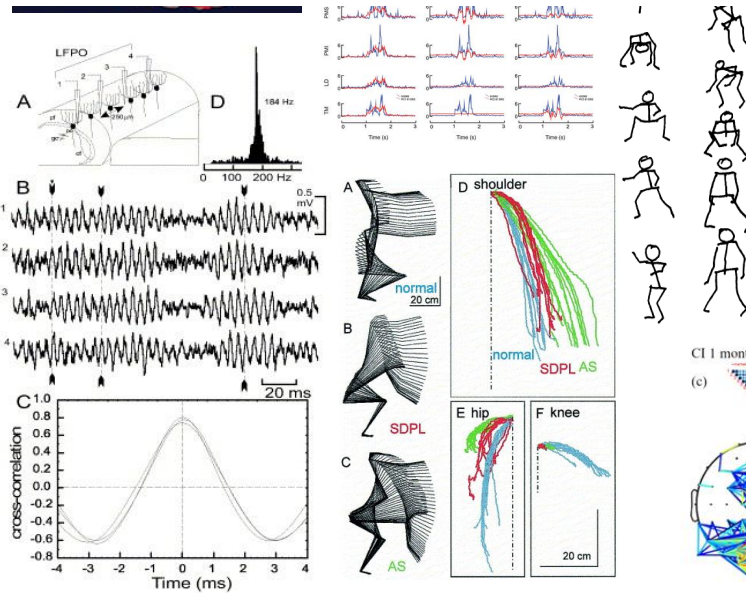
*Bernard Dan*



REVIEW ARTICLE

# Reconstructing cerebral palsy

Bernard Dan



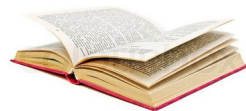
Perhaps individuals who are now diagnosed as having CP are different from individuals to whom this term has been applied over the course of the last 40 years. This might be due in part to epidemiological reasons, that have been termed the ‘changing panorama’ of CP (51). In addition, it might be because of the theories held about these individuals and the remedies that have been put in place around their abnormal behaviors, leading to the emergence of so-called ‘classical’ and ‘modern’ forms (52). Conversely, the resulting changes in the individuals have significantly contributed to the evolution of ideas about physiological and pathological motor development.



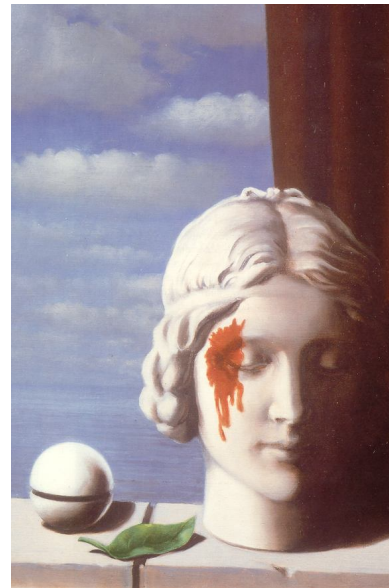
National Institute of  
Neurological Disorders  
and Stroke

**Cerebral palsy** describes a group of permanent disorders of the development of movement and posture, causing activity limitation, that are attributed to non-progressive disturbances that occurred in the developing fetal or infant brain. The motor disorders of cerebral palsy are often accompanied by disturbances of sensation, perception, cognition, communication, behaviour, epilepsy, and by secondary musculoskeletal problems.

Rosenbaum et al DMCN 2007



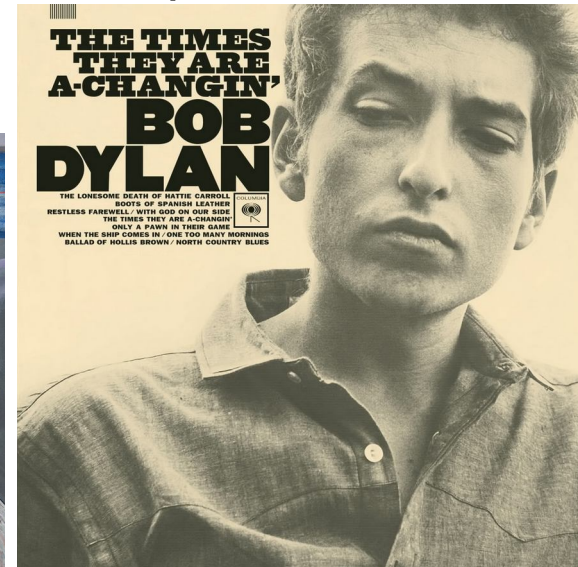
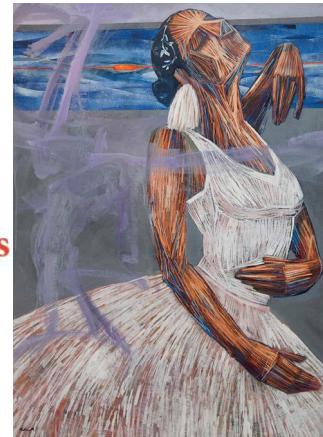
Rosenbaum & Dan. The continuing evolution  
of 'cerebral palsy' APRM 2020



- **aetiological understanding**: genetics, inflammation, metabolism
- **clinical documentation worldwide**: manifestations, LMIC
- **adults with CP**, adult services, lifelong
- **societal and cultural** understanding, self-ownership
- **concepts** and language of disability, ableism

EDITORIAL

**Advancing definitions of paediatric neurological disorders: Lessons from adult neurology**



# Naming cerebral palsy 'CP': Physiology and service provision

Clinical presentations consistent with what we now call cerebral palsy, reported in the 19th century, gave rise to the clinical construct and opened discussion about risk factors, pathophysiology, classification, and the significance of features associated with the described motor disorders. Following the arguments of Freud and Osler supporting a brain origin, even for the bilateral presentations thought by Erb and Charcot to originate in the spinal cord, the group of conditions came to be known as cerebral palsy. Over the years, successive definitions have been proposed to match the evolution of knowledge, of concepts relating to development, medicine, disability, and of health-related terminology. Some of the more influential of these definitions were published in this journal in 1959, 1964, 1992, 2000, 2005, and 2007. The authors of the latest of these iterations questioned whether to retain the word 'palsy', which had long been obsolete in medical nosography.<sup>1,2</sup> They agreed that the term 'cerebral palsy' was still helpful to ensure continuity with data accumulated over many decades, provided it was clarified within the current state of understanding, research, and service organization, including highlighting extra-motor developmental and secondary features. Moreover, the group hoped to avoid jeopardizing funding of services and research that relied on this diagnostic label.<sup>3</sup>

Use of this descriptive diagnosis in many languages corresponds to quite literal translations of 'cerebral palsy', some of

showed no obvious cognitive impairment. Recently, there has been a move to combine both entities under 'paralysie cérébrale', a closer translation of 'cerebral palsy', to reflect the obligation to meet all functional (including educational and other participation) needs in all individuals.

In some other settings, more generic or programmatic terms might help develop strategies to meet the needs of individuals and improve their lifelong outlook,<sup>4</sup> bearing in mind, for example, that some languages have no equivalent word for 'movement'. The current Māori term for cerebral palsy ('hōkai nukurangi') literally means to traverse the earth and metaphorically achieve what is important to the person.<sup>5</sup>

Whatever the term, what matters at this stage is that it can be used to develop and share relevant and impactful knowledge to optimize the current situation and future prospects of individuals with cerebral palsy by lifting barriers, empowering

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SMARTER GOALS FOR BETTER FUTURE

35<sup>th</sup> Annual Meeting  
European Academy of Childhood Disability

Ljubljana, Slovenia, 24 - 27 May, 2023

# Suggested update

Cerebral Palsy (CP) is the term used to describe<sup>1</sup> a spectrum<sup>2</sup> of life-long clinical conditions<sup>3</sup> in which the impaired development<sup>4</sup> of movement and posture causes limitation in activity and may impact participation<sup>5</sup>. These conditions<sup>6</sup> are attributed to non-degenerative changes (injury or malformation)<sup>7</sup> that occurred in the fetal or infant brain<sup>8</sup>. In addition to the motor features<sup>9</sup>, people with CP<sup>10</sup> often experience impairments of development of other functions<sup>11</sup> (e.g. sensation, feeding, sleep, communication, cognition, and mental health<sup>12</sup>) as well as epilepsy and secondary musculoskeletal impairments. These conditions are experienced<sup>13</sup> individually by persons with CP, resulting in a unique experience of their world<sup>14</sup>.



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European Academy of  
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