

# The Bobath-Concept

## A case series report

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### Introduction

The Bobath Concept is practiced worldwide to treat people with neurological disorders. It is inclusive and used for various diagnoses and disorders of the central nervous system [1]. Despite the lack of evidence the experience of working with patients according to the Bobath Concept is very positive. We want to investigate whether the Bobath Concept used with six patients over a period of one week, brings the patients nearer to their individual goal.

### Methods

This case series report included patients within an inpatient rehabilitation setting. During an eight day Bobath basic course, patients received one hour treatment daily over 6 days according to the Bobath concept, which is part of the usual care in our rehabilitation center. The design of this case report was carefully chosen to ensure that the therapists work within the frame of Bobath concept under the supervision of a Bobath instructor.

The therapists formulated a goal orientated treatment hypothesis following the Model of Bobath Clinical Practice [Figure 1]. The treatment hypotheses was validated with quantitative assessments [5]. The Goal attainment scaling was used to assess the level of activation according to the ICF model [2]. The sampling procedure had taken into consideration the patients resilience and the different diagnoses and severity of impairment [Table 1]. Assessments were made on day two and six.

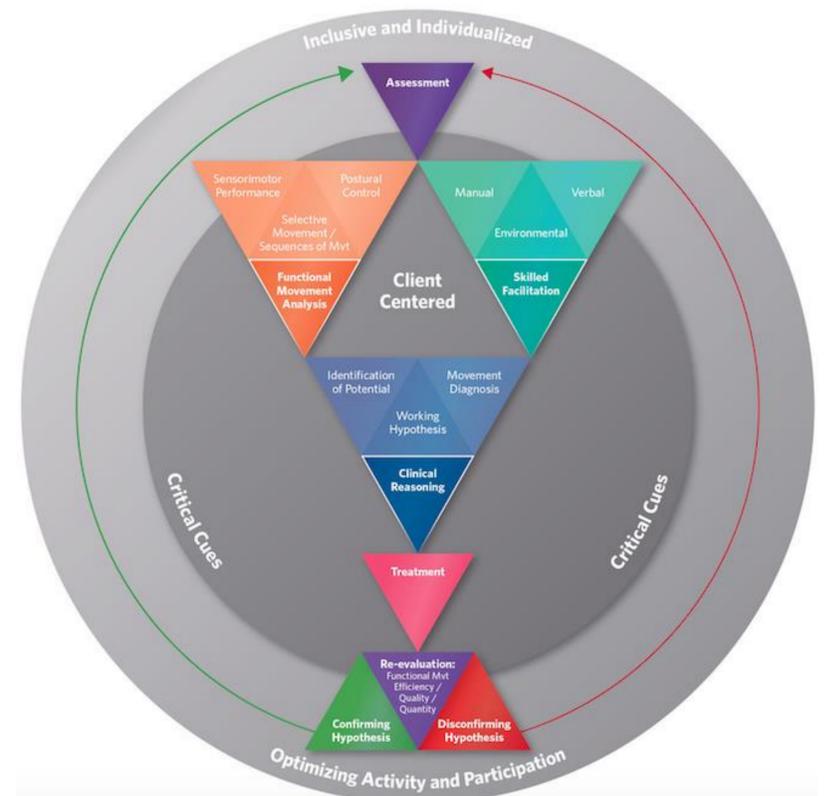


Figure 1: Model of Bobath Clinical Practice [1]

### Patients presentation

Patient	1	2	3	4	5	6
Sex	m	f	f	f	m	m
Age	46	43	29	78	54	65
Diagnosis	PPMS	PPMS	RRMS	stroke, basal ganglia	PPMS	Pontine infarction
Disease duration	7 years	11 years	8 years	1 year	8 years	1 month
EDSS	5.5	7.0	7.5	-	6.0	-
Barthel-Index	85	75	60	60	90	25

Table 1: Patient presentation

PPMS: primary progressive MS; RRMS: relapsing-remitting MS; SPMS: secondary progressive MS; EDSS: Expanded disability status scale (Kurtzke).

### Results

There were no drop outs. All patients showed a clinically relevant improvement in regard to the assessments measured on day 2 and day 6 independent of their diagnosis and degree of disability. [Table 2-8]

Patient 1	
10MW St T1	10MWSt T2
20	18
10 MW sec T1	10 MW sec T2
13,0	10,5
TuG T1	TuG T2
12,1	11,2

Table 2

Patient 2	
POMA T1	POMA T2
10	13
10MWSt T1	10MWSt T2
30	26
10 MW sec T1	10 MW sec T2
37	27

Table 3

Patient 3	
10MW St T1	10MWSt T2
20	18
10 MW sec T1	10 MW sec T2
23,5	13,1
POMA T1	POMA T2
19	24

Table 4

Patient 4	
POMA T1	POMA T2
19	24
5 STS T1	5 STS T2
28,5	28

Table 5

Patient 5	
ARAT T1	ARAT T2
19	27
SLS r sec T1	SLS r sec T2
0	1
SLS l sec T1	SLS l sec T2
5	9

Table 6

Patient 6	
POMA T1	POMA T2
21	26
ARAT T1	ARAT T2
22	32

Table 7

10MW St	10 m Walk Steps
ARAT	Action Research Arm Test
POMA	Performance Orientated Mobility Measure

10MW sec	10 m Walk Seconds
SLS r	Single Leg Stance right
SLS l	Single Leg Stance left
5STS	5 Times Sit To Stance

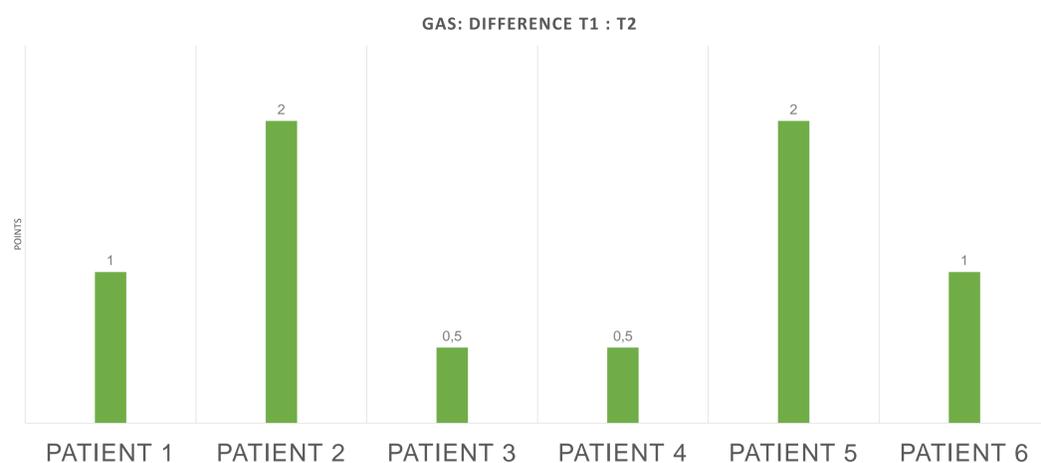


Table 8 Goal Attainment Scaling

### Conclusion

The contemporary Bobath Concept provides current theoretical and practical knowledge and enables physiotherapists and occupational therapists to work effectively and goal-oriented with patients with neurological disorders. The changes in function obtained herein are measurable [3,4]. This case series report may be one step to construct and conduct a controlled study to investigate the effects of the Bobath Concept on patients with neurological disorders.

(Disclosures: No conflicts of interest)

#### References:

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