Towards Evidence-Based Physiotherapy
- Barriers, facilitators and interventions
Per Nilsen and Susanne Bernhardsson
Linköping University, Department of Medical and Health Sciences

Background
The evidence-based practice (EBP) movement has gained ground steadily in physiotherapy over the past decades. This paper reviews research concerning EBP barriers, facilitators, and interventions to achieve a more evidence-based physiotherapy practice.

Aim
To describe and discuss characteristics and key findings of the research conducted on EBP in physiotherapy thus far, and to highlight important research challenges and needs for improved understanding of how evidence-based physiotherapy practice can be further enhanced.

Barriers
Numerous barriers to developing a more evidence-based physiotherapy practice, such as time restrictions, limited access to research, poor confidence in EBP skills, and inadequate support from managers, have been identified.

Research on EBP in physiotherapy has largely been observational, and mostly quantitative. Qualitative research is needed for better understanding of barriers to EBP in physiotherapy.

Barriers to EBP in physiotherapy exist at different levels, from the individual to the organisation. Research on organisational barriers in physiotherapy is limited.

Facilitators
Some facilitators of EBP in physiotherapy have also been identified, notably a post-graduate degree, continued education, positive attitudes to EBP and guidelines, and online access to research summaries, systematic reviews and guidelines.

Interventions
Few studies on implementation of EBP in physiotherapy exist and effects have generally been modest. Two types of implementation interventions to achieve increased EBP in physiotherapy were identified:

- Educational measures (n=2). One RCT and one before-after study showed very modest impact on clinical practice. This is consistent with educational measures in other areas of health care.
- Clinical guidelines (n=4). Two RCTs showed that active, multifaceted implementation strategies improved knowledge and changed behaviour, but did not affect patient health or costs. However, two observational studies showed positive effects on patient health and costs, which is promising but not conclusive.

Multicomponent implementation interventions seem to be more effective. Using theory in implementation is recommended but is rare in physiotherapy research.

Limitations
This review was not systematic and does not claim to have identified all relevant research. No quantitative or qualitative synthesis of research findings was made.

Conclusions
Future research on EBP in physiotherapy should expand beyond its current parameters and address several issues to improve understanding of how a more evidence-based physiotherapy practice can be attained.

- More studies on facilitators, rather than barriers, are needed.
- More qualitative research is needed.
- Patient outcomes and costs need to be examined to a greater extent.
- In addition to individual barriers, organisational barriers need to be examined.
- More implementation studies using rigorous designs, ie RCTs, are needed.

Contact information:
susanne.bernhardsson@vgregion.se

Methods
A narrative review was undertaken of physiotherapy research on EBP barriers, facilitators, and implementation interventions. Research challenges and future needs were identified.