

# Facilitators and barriers to undertaking a constraint induced movement therapy (CIMT) protocol in sub-acute stroke: a synthesis of the literature

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## Background

Quantitative systematic reviews indicate that, for a sub-group of stroke survivors, constraint induced movement therapy (CIMT) is effective in increasing function in the contralesional upper limb<sup>1</sup>; however, CIMT is not routinely provided<sup>2</sup>. There is a need to understand the issues that might facilitate or deter use of CIMT. Previous research<sup>3</sup> has considered some qualitative aspects of CIMT for stroke survivors more than one year post-stroke; it is unclear if the findings are generalisable to stroke survivors who have experienced a stroke more recently.

**Objective:** To synthesise the perceived facilitators and barriers to undertaking CIMT in sub-acute stroke, as reported by therapists and stroke survivors.

## Method

A systematic review of the literature was undertaken following established guidelines<sup>4</sup>.

**Key words:** stroke, cerebrovascular accident, constraint induced movement therapy, constraint induced therapy, forced use, upper limb, and upper extremity.

**Databases:** AMED, MEDLINE, CINAHL, Cochrane, PsycINFO and SCOPUS  
A final search was completed on 7<sup>th</sup> March 2013.

### Inclusion criteria:

- Participants were at least 14 days, but less than 12 months post-stroke and had experienced CIMT
- Qualitative data were reported
- Studies were published in English language

Two researchers independently selected studies and assessed methodological quality of the included studies. Qualitative data were analysed using thematic content analysis.

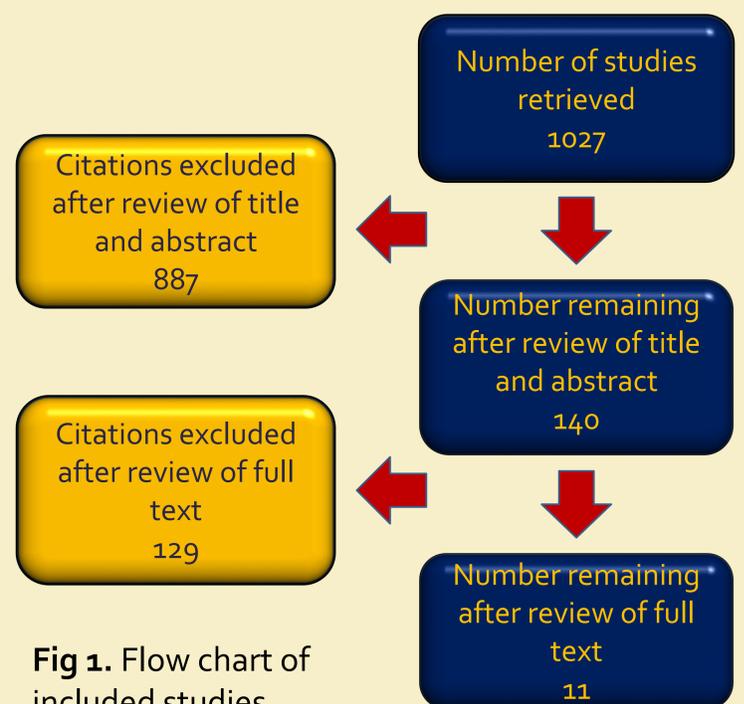


Fig 1. Flow chart of included studies

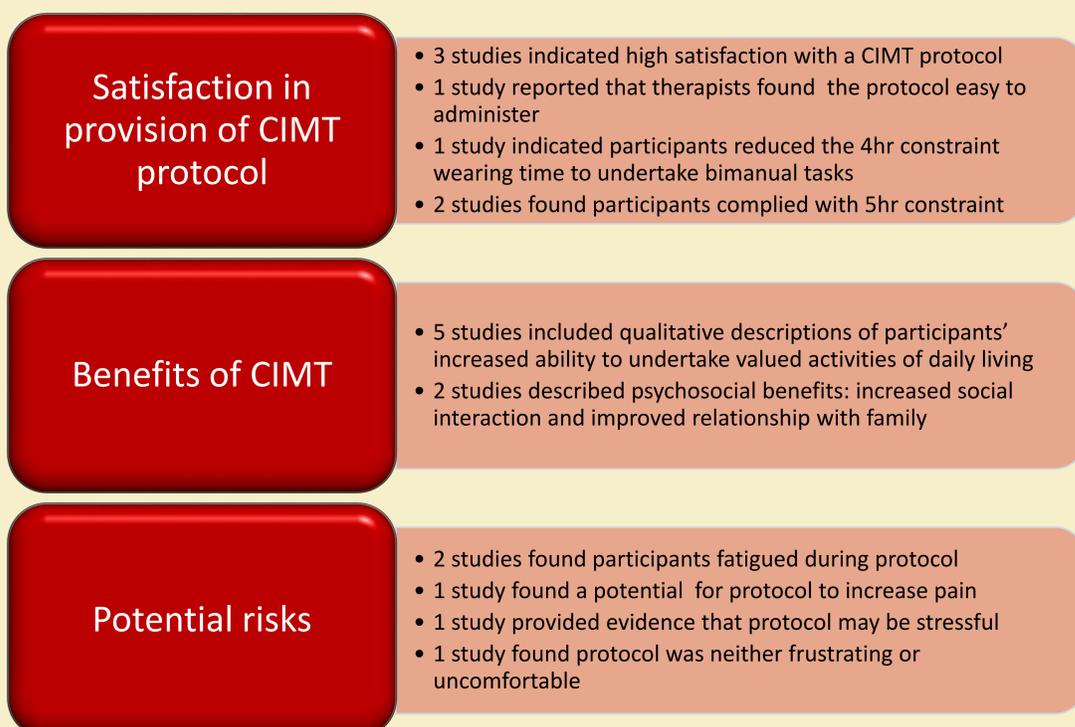


Fig 2. Summary of findings

## Conclusion

There is very limited qualitative evidence about this complex and intensive intervention. To establish the facilitators of, and barriers to implementing CIMT in a clinical setting, additional qualitative research is required. A previous study<sup>5</sup> successfully identified the facilitators and barriers of an intensive mobility intervention using a phenomenological approach; this approach could be utilised to underpin future CIMT qualitative research. Future qualitative studies should:

- have a clear theoretical perspective
- follow an established qualitative study design
- take measures to ensure overall rigour and trustworthiness.

## Results

- Eleven studies were included. All studies were predominately quantitative in design; the qualitative findings were not underpinned with an appropriate theoretical perspective or study design.
- Three sparsely populated themes emerged:
  - satisfaction with the CIMT protocol
  - benefits of CIMT
  - potential risks
- Conclusions about the **facilitators and barriers** to undertaking CIMT in sub-acute stroke were not possible due to the poor methodological quality, and the limited amount of qualitative evidence.

## References

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