Daly AE, Bialocerkowski AE. Does evidence support physiotherapy management of adult Complex Regional Pain Syndrome Type One? A systematic review. Eur J Pain. 2008 Jul 9. [Epub ahead of print] doi:10.1016/j.ejpain.2008.05.003

OBJECTIVE: To source and critically evaluate the evidence on the effectiveness of Physiotherapy to manage adult CRPS-1.

DESIGN: Systematic literature review.

METHODS: Electronic databases, conference proceedings, clinical guidelines and text books were searched for quantitative studies on CRPS-1 in adults where Physiotherapy was a sole or significant component of the intervention. Data were extracted according to predefined criteria by two independent reviewers. Methodological quality was assessed using the Critical Review Form.

RESULTS: The search strategy identified 1320 potential articles. Of these, 14 articles, representing 11 studies, met inclusion criteria. There were five randomized controlled trials, one comparative study and five case series. Methodological quality was dependent on study type, with randomised controlled trials being higher in quality. Physiotherapy treatments varied between studies and were often provided in combination with medical management. This did not allow for the 'stand-alone' value of Physiotherapy to be determined. Heterogeneity across the studies, with respect to participants, interventions evaluated and outcome measures used, prevented meta-analysis. Narrative synthesis of the results, based on effect size, found there was good to very good quality level II evidence that graded motor imagery is effective in reducing pain in adults with CRPS-1, irrespective of the outcome measure used. No evidence was found to support treatments frequently recommended in clinical quidelines, such as stress loading.

CONCLUSIONS: Graded motor imagery should be used to reduce pain in adult CRPS-1 patients. Further, the results of this review should be used to update CRPS-1 clinical guidelines.