In adults with glenohumeral joint adhesive capsulitis are mobilisation techniques in combination with exercise more effective in reducing pain and improving function compared to exercise alone?

Clinical Bottom Line

There is no high quality research evidence that directly answers the above question. Overall, there is no evidence to support or refute the use of mobilisation and exercise over and above exercise alone for patients with glenohumeral joint adhesive capsulitis.

The use of mobilisation techniques for managing adhesive capsulitis is often used as an adjunct to other interventions in physiotherapy clinical practice. The evidence reviewed for this CAT includes studies comparing mobilisation and exercise but other forms of intervention are included within the patient management such as electrotherapy. Available trials are small, some are on other shoulder populations (such as shoulder impingement or mixed shoulder problems), and some fail to fully report the mobilisation techniques used and none reflect current NHS practice regarding exercise.

A high quality randomised trial, in the UK, is required to determine if mobilisation techniques in combination with exercise provide better pain relief and function compared to exercise alone in adults with glenohumeral joint adhesive capsulitis.

Criteria for Critically Appraised Topic

Population: Adults with glenohumeral adhesive capsulitis

Intervention: Mobilisation techniques (any joint or soft tissue) (not self-mobilisation), on their own or in combination with exercise.

Comparison: Exercise and or advice/education. This could be a course of exercise sessions e.g. 6 sessions.

Outcomes: Range of movement, pain, return to work, cost effectiveness, timing of recovery, quality of life and function

Exclusions: Participants under 18 years old, glenohumeral joint fractures, malignancy, active inflammatory conditions (such as rheumatoid arthritis flare), osteoporosis.

Data bases Searched: Cochrane, Pedro, NHS Library for Health, Medline, Cinahl, Embase, Clinical Evidence, Bandolier, Professional websites, Guidelines, NICE, sports discus, rehabdata

Search for the past 10 years i.e. 1999 – 2009

Key words searched: Adult, frozen shoulder, glenohumeral adhesive capsulitis, mobilisation, massage, manipulation, manual therapy, passive movements, muscle energy technique, joint adjustment, exercise, exercise therapy.

Types of study included: RCT, systematic reviews, cohort studies, review articles

Databases Searched and available evidence

Database (Specific to our CAT)	Number of abstracts	Number of relevant abstracts
NIAC	1	0
AMED	6	0
CINAHL	15	2
Embase	4	1
Bandolier	0	0
PEDRO	3	2
Medline	3	2
Cochrane	10	7
Total	42	14

Results

42 abstracts were initially checked and 14 articles were reviewed in detail. Only one good quality Cochrane review was identified and this was considered to be the best available evidence (Green et al, 2009). This review identifies that there is no high quality trial evidence that directly addresses our clinical question. Overall, there is no evidence to support or refute the use of mobilisation techniques in combination with exercise over and above exercise alone in managing patients with adhesive capsulitis.

The other 13 studies identified from the search strategy were either not relevant because they did not directly answer the question and/or were not of sufficient quality for consideration (eg. there were some small trials but on different shoulder populations).

Clinical bottom line

There is no evidence to support or refute the use of mobilisation techniques in combination with exercise to improve the management of adhesive capsulitis over and above exercise alone.

Implications for practice

It is common practice for physiotherapists to be involved in the management of glenohumeral joint adhesive capsulitis. Although they often use mobilisation techniques in combination with exercise in patient management, there is no high quality, NHS-relevant, clinical trial(s) to guide treatment decisions. A high quality trial is required to address this question.

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