Aquatic Therapy in post-stroke people: a scoping review

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INTRODUCTION
STROKE

- High prevalence and consequences
- Best therapeutic approaches for a good recovery
- AT: increased recently, may favor such recovery
AIMS

• Examine and map AT use as a post-stroke treatment

• Answer the question:

“What kinds of studies in AT for post stroke people have been reported?”
METHODS

SEARCH STRATEGY

- Cochrane Library
- MEDLINE
- Scopus
- Web of Science
- Dialnet
- CINAHL
- Lilacs
- PEDro
- Scholar Google
INCLUSION CRITERIA

Patients: People who have suffered a stroke

Languages: Spanish, English, Portuguese, French or Italian

Date: no limit in the date of publication

Intervention: AT or hydrotherapy (physiotherapy, exercise or physical activity)
EXCLUSION CRITERIA

- Articles with limited access
- Text and opinion papers and letters
- Fail to comply with inclusion criteria
- Other forms of hydrotherapy (balneotherapy, showers...
## RESULTS

<table>
<thead>
<tr>
<th>Year of publication</th>
<th>Country</th>
<th>Type of study</th>
<th>Sample size range</th>
<th>Type of intervention</th>
<th>Duration of intervention</th>
<th>Results</th>
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<td>Increased significantly in aquatic therapy = 19</td>
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<td>Obstacle training = 1</td>
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</table>
RESULTS

24 articles selected

- **Study type:** 18 clinical trials, 3 systematic reviews and 3 case studies
- **Year of publication:** 2011, 2014 and 2015 higher number of studies
- **Countries:** South Korea around 45% and Brazil with 25%
- **Sample size:** more usual between 15 to 30 patients
- **Intervention type:** Hydrokinesitherapy 25%, Halliwick Concept 20%
- **Duration of the intervention:** usually between 4 to 6 weeks
- **Results:** majority of the studies has shown to be effective or more effective than CG in at least one of the outcome measures
RESULTS

• Functional limitations associated with gait (b770), balance (b2351), as well as musculoskeletal structures associated with the movement (s770) improve with the use of AT in these patients.

• AT increase their capacity of changes in posture (d410) and body position, transfers (d420) and movements by the environment (d450).
CONCLUSIONS

• The growing interest, in recent years, to expand the knowledge of applications in AT and their results in patients who have suffered a stroke.

• Current evidence suggests that is a useful resource in the rehabilitation process.

• Systematic reviews, including quantitative synthesis and quality assessment, are needed.
REFERENCES


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