

Figure 1. Occupational profiles for both patients

Pt. 1	Pt. 2
ADLs: Difficulty washing hair/back and pulling up tighter pants IADLs: Difficulty with meal preparation and bilateral home management tasks including cleaning, moving furniture, painting, gardening, and making a bed Work: Currently unemployed, interested in furniture refurbishing Leisure: Enjoys spending time with her dog and home management tasks; difficulty typing for Internet/email Roles: Helps out family members (brother and mother) with cleaning and caregiving for her father with a neurodegenerative disease; sole caregiver for her dog Beliefs: Anxiety about medical appointments and the possibility of surgical operation	ADLs: Difficulty donning bra and pulling up tighter pants IADLs: Currently unable to drive manual-transmission vehicle, or cut/load wood for stove. Difficulty with bilateral home management tasks including sweeping and multi-step meal preparation Work: Kitchen staff at middle school; difficulty with heavy, repetitive work tasks including dish washing, lifting trays in/out of the oven, putting away boxes (30lbs) Leisure: Enjoys reading, playing games, and spending time with family/friends; has given up bowling since onset of pain Roles: Primary caregiver for high-school age grandson; close with 6 children Values: Strongly values independence and is highly motivated to return to prior level of functioning

Table 1
Functional outcomes measures

	Pt. 1	Pt. 2
DASH ^a		
Initial Evaluation	61.67	40.00
Midpoint	17.50	28.33
Change	*44.17	*11.67
Work DASH		
Initial Evaluation	-	81.25
Midpoint	-	50.00
Change	-	*31.25
Work Ability ^b		
Initial Evaluation	2	3
Midpoint	9	7
Change	7	4
PROMIS Global Health:		
Physical Health ^c		
Initial Evaluation	39.8	47.7
Midpoint	50.8	47.7
Change	11.0	0
PROMIS Global Health:		
Mental Health ^c		
Initial Evaluation	48.3	48.3
Midpoint	56.0	50.8
Change	7.7	2.5
Average Pain Rating ^d		
Initial Evaluation	6	7
Midpoint	2	5
Change	4	2
PSFS (Composite Scores) ^e		
Initial Evaluation	4	3.3
Midpoint	9.3	5.5
Change	*5.3	*2.2

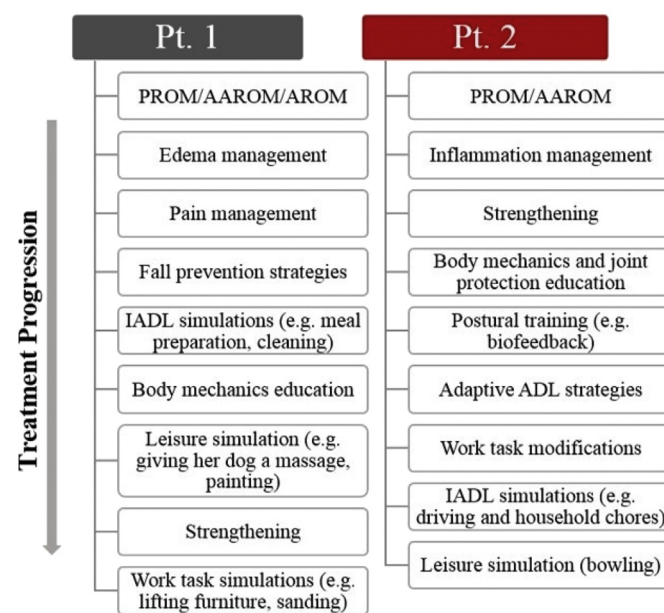
Note.

^a indicates MCTD^a The DASH is reported on a 0–100 scale, with 0 indicating no disability and 100 indicating maximal disability.^b The Work Ability Score consists of the worker's self-assessment of his/her current ability compared to the lifetime best, which ranges from 0 to 10.^c The PROMIS Physical and Mental Health scores are interpreted as WNL for scores above 45, mild symptoms or impairment for scores between 40–45, moderate symptoms or impairment for scores between 30–40, moderate symptoms or impairment, and severe symptoms or impairment for scores under 30.^d Average pain over the last week was rated on a scale from 0–10.^e The PSFS composite score consists of the mean scores on a from 0–10 with 0 being unable to perform and 10 being able to perform same as before injury.Table 2
Biomechanical outcome measures

	Pt. 1 L (affected side) ^a	Pt. 2 R (affected side) ^a
AROM: Wrist		
Extension/Flexion		
Initial Evaluation	28/0/33	-
Midpoint	58/0/47	-
Change	30/0/14	-
AROM: Forearm		
Supination/Pronation		
Initial Evaluation	35/61	-
Midpoint	82/86	-
Change	47/25	-
AROM: Shoulder		
Extension/Flexion		
Initial Evaluation	-	20/0/79
Midpoint	-	60/0/170
Change	-	40/0/91
Abduction		
Initial Evaluation	-	58
Midpoint	-	90
Change	-	32
Internal/External Rotation		T2/Sacral Region
Initial Evaluation	-	T3/L2
Midpoint	-	1/5
Change	-	

Note. a. Unaffected side was WNL for ROM measurements.

Figure 2. Progression of treatments for both patients



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A Self-Management Program for Lateral Epicondyle Tendinopathy

R.L. WHALLEY¹, K. MCQUEEN^{1,2}, R. POWELL^{1,2}¹ Occupational Therapy, Washington University in St. Louis, Saint Louis, MO, United States² Occupational Therapy, Milliken Hand Rehabilitation Center, St. Louis, MO, United States

Purpose: Lateral Epicondyle Tendinopathy (LET) is the most common cause of lateral elbow pain. Previous studies indicate LET treatment may require ten or more therapy visits. Current trends in

medicine to address musculoskeletal conditions focus on self-management, building self-efficacy and empowering patients to manage their condition through education. If administered well, a self-management approach can simultaneously address many important factors that contribute to daily performance. The World Health Organizations' International Classification of Functioning, Disability and Health (ICF) is accepted as the international standard to describe and measure health and disability. Previous calls in hand therapy literature have urged therapists to apply the ICF in treatment and research. Utilizing an education-based self-management approach increases parity across many ICF domains. A LET therapy program completed in 4-6 visits that demonstrates improvements in pain and function while simultaneously addressing patients' needs, mitigates rising health care costs and would benefit therapists, patients and payors. The purpose of this study is to identify if a reproducible education-based self-management program completed over 4-6 therapy visits will decrease disability and pain ratings and track these outcomes over one year.

Methods: 94 participants diagnosed with LET were consented to this long-term cohort study. Participants were provided with 4-6 education based self-management intervention sessions and a concurrent home exercise program which was progressed every 2-3 weeks. The primary outcomes measures were the Quick Disabilities of the Arm, Shoulder and Hand (QuickDASH), and the 11-point Numeric Pain Rating Scale (0-10) used to rate pain with activity and at rest. Data was collected at 6, 12, 24 and 52 weeks. After one year 57 participants were retained. Participants were excluded due to, lost to follow up ($n=12$), comorbidities ($n=8$), injection for LET ($n=6$), not completing therapy sessions ($n=6$), receiving therapy elsewhere ($n=2$), withdrawing ($n=2$), and surgery ($n=1$). Outcome analyses were performed using IBM SPSS Statistics.

Results: Pain at rest and with activity significantly decreased when compared to initial visit and 6 week follow up (pain rest: $p=0.01$, pain activity: $p=0.00$). Pain at rest did not significantly change while pain with activity continued to decrease significantly at 12 (pain rest: $p=0.63$, pain activity: $p=0.00$), 24 (pain rest: $p=0.77$, pain activity: $p=0.00$) and 52 (pain rest: $p=0.81$, pain activity: $p=0.03$) week follow up. By week 12 pain at rest was near zero (0.2). QuickDASH scores demonstrated a significant decrease at 6 ($p=0.00$), 12 ($p=0.01$), and 24 ($p=0.00$) weeks. The improvement in QuickDASH scores from initiation of therapy to one year later was 19 points, meeting the criteria for MCID of 16 points.

Importantly the MCID was reached and sustained by week 12. Interestingly, there was a significant increase in QuickDASH scores at 52 weeks when compared to week 24 ($p=0.00$).

Conclusion: This study demonstrates that an education-based self-management program including 4-6 visits with a concurrent home exercise program for LET, can help individuals return to work, sports, and other daily interests with little to no lateral elbow pain. The increase in QuickDASH scores from week 24 to one year may be due to participants returning to activities that were not previously anticipated when completing previous QuickDASH self-assessments.

Previous hand therapy literature has demonstrated the utility of the ICF to consider multiple domains in intervention, achieve desired outcomes for elbow conditions, as well as the need for hand therapists to consider a variety of factors such as life style, health status, pain and daily activities to guide intervention. Therapy programs which empower patients to take control of their wellness and become self-managers can be helpful in returning them to normal pain-free functional activities and reduce health care costs.

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Perceptions of Adaptive Devices by Users: A Scoping Review N. KROLIKOWSKI^{1,2}

¹ OTA Program Director, South University, Norfolk, VA, United States

² Outpatient Rehabilitation Therapy, Sentara, Virginia Beach, VA, United States

Purpose: The purpose of this study was to identify the perceptions of clients' acceptance of adaptive devices as treatment strategies for use in hand therapy. Therapists select interventions that are client specific with the goal to meet the client's functional needs. Time constraints and productivity requirements limit the time needed to explore and construct custom fit adaptive devices that could increase use of the client's affected extremity. Clients' perceptions of adaptive devices further limit the acceptance and use of the device.

Methods: A scoping review was performed to examine literature on the clients' use of adaptive devices outside the therapy clinic. Articles that appeared in peer-reviewed journals were included in the study. Articles that were included in this review met the following criteria: a) device did not have electronic components, b) the device was issued by a health care provider, and c) the device was issued to address a functional deficit that incorporated use of the upper extremities.

Results: The majority of articles reviewed involved the use of surveys, questionnaires, interviews, and focus groups for data collection. The results of these studies showed that a majority of clients did not use adaptive devices for extended periods. Reasons for not using the devices included improved health, social stigmas, prescriptive approach to care, lack of involvement in the evaluation and design of the device, and a lack of involvement in the decision making process.

Those who continued to use the devices perceived a need for the device, felt the benefit for the device was explained, and felt included in decision making. The literature was lacking in adaptive devices provided specifically for use with upper extremity functional deficits.

Conclusion: Prospective studies are needed to explore the use of adaptive devices as a treatment strategy for clients treated by hand therapists and the benefits derived from their use as perceived by the clients.

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Interdisciplinary Instruction of Best-Practice Rehabilitation Protocols in the Burn Population L.C. WARE^{1,2}

¹ Hand Therapy Department, The Curtis National Hand Center, Middle River, MD, United States

² Rehabilitation, Johns Hopkins Burn Center, Baltimore, MD, United States

Purpose: Proper splinting and positioning of burn patients is essential to promote healing, prevent contracture formation, decrease swelling and to increase functional range of motion. Initial splinting and positioning plans are developed by the rehabilitation staff. However, all members of the burn team assist in carrying out the plan. It is vital for interdisciplinary communication between rehabilitation services and other members of the burn team for the splinting and positioning plan to be successful.

The purpose of this study is to investigate the effectiveness of using a self-guided learning module as an education tool for hospital staff to learn proper positioning and splinting when caring for acute burn patients.

Methods: A multi-disciplinary team of a regional burn center conducted a 3-month long study. The participants included nurses