Stroke is the third largest cause of death in the United Kingdom and causes at least 450,000 people a greater range of disabilities than any other condition (Stroke Association, 2006). Dewey et al. (2007) state that disability occurs as a result of paralysis, spasticity, depression, pain, cognitive and other deficits, which significantly interfere with the ability to perform daily activities, and reduces quality of life (QOL). The presence of these factors primarily leads to the development of contractures, abnormal limb postures and inevitable pain in addition to difficulties with dressing and hygiene for up to 40% of sufferers (Thompson et al. 2005). One of the treatment modalities used to address these factors is upper limb splinting.

The aim of this research study was to determine the current practice of occupational therapist’s (OT’s) that use splinting for upper limb rehabilitation with stroke survivors. To achieve this a survey was sent to all OT’s who belong to the Specialist section for Neurological Practice (SSNP) working with stroke survivors to determine the nature of their practice. Data collected from the group of participants will serve to determine the devices and techniques used for the assessment and treatment process as well as the nature of the clinical reasoning process and the many factors that influence their practice within the current health care climate.

**Abstract**

**Methods cont.**

A questionnaire with a cross sectional design was used to survey current practice. This was thought to be the most effective data collection method as the researcher would have access to therapists from a wide range of treatment contexts across the UK (Marsden, 2010) and with technological advances (Babbie, 2010) states that online survey research is more cost effective. The design of this questionnaire was informed by the model shown below presented in Radhakrishna (2007) to ensure that the survey was reliable and valid as a data collection tool before it was implemented.

**Methods**

**Aims:**
To analyse current splinting practice for the management of the upper limb to improve quality of life and functional independence of stroke survivors.

**Objectives:**
2. To evaluate current occupational therapy practice in the area of splinting for stroke survivors to improve functional ability and quality of life.

**Data Collection Tool:**
A questionnaire was used to collect data. The questionnaire contained questions that were designed to determine the current practice of occupational therapists with respect to splinting for upper limb stroke survivors. The questionnaire was divided into three sections: (1) Current splinting practice, (2) OT’s awareness of splinting, and (3) OT’s confidence in splinting.

1. OT’s definitely agreed that improving hygiene (80%), improving functional needs (78%), maintaining muscle length (78%), preventing deformity (76%) and preventing contractures (74%) were the most significant reasons for the use of splints in practice.
2. Only 22% of OT’s definitely agreed with ‘improving aesthetics of the hand,’ 45% for ‘preventing spasticity,’ 46% for ‘improving function’ and 48% for ‘stretching muscles’.
3. Bivariate analysis did not reveal any significant relationships.
4. The only item OT’s disagreed with was that splinting is used as a lone modality suggesting that splinting is always used in combination with other treatment modalities.

**Results**

Analysis was completed with the Statistical Package for the Social Sciences for data management and statistical analysis (SPSS) (IBM® SPSS® Statistics 20).

1. Results highlighted that 94% of stroke survivors receive splints in practice.
2. The most commonly used splints include Volar and dorsal splints. 55% of OT’s use volar splints while 11% are using dorsal Splints in practice (Figures 4 & 5).
3. There is little consensus about how soon splints should be provided, how long they should be worn or if they should be worn during the day or night!

1. For this group of participants, Bobath therapy was the most popular modality and chosen by 38% of the participants who indicated that it was frequently used as an adjunct to splinting.
2. Other modalities used frequently included Repetitive Task training (33%), Botox therapy (32%) and Motor relearning therapy (29%).

**References**