

Research paper

Quality of life in stroke survivors living in Kuwait: health professionals' perspectives

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What is known on this subject

- Stroke has deleterious effects on quality of life through its impact on functioning and mobility, participation in roles and community activities, mood, social relationships and, for some people, work and income.
- Health and social care professionals provide culturally competent care and better outcomes through awareness of and respect for their patients' cultures.
- Little is known about the quality of life of stroke survivors in Arabic countries, and no Kuwaiti study has been located.

What this paper adds

- In Kuwait, health professionals working with Kuwaiti stroke patients identified certain influences on post-stroke quality of life that are similar to those emerging from Western studies, including the importance of functional recovery, independence and social relationships.
- Cultural differences in family living arrangements, attitudes to disability, financial resources and expectations in relation to the purchase of a better quality of life may need consideration if the well-being of Kuwaiti patients is to be maximised after a stroke.
- Western and non-Western health professionals working in multi-professional and culturally diverse teams may have subtly different attitudes and expectations with regard to quality of life after stroke.

ABSTRACT

Quality of life after a stroke is affected by multiple factors, including the severity of impairment. There is little evidence concerning the factors that promote quality of life after stroke in Arab countries. The objective of this study was to explore the perceptions of health professionals working in stroke rehabilitation in the Gulf State of Kuwait regarding factors influencing quality of life among both Kuwaiti and non-Kuwaiti stroke survivors.

A qualitative approach, based on semi-structured interviews, was used to explore perspectives on the stroke experience among 12 health professionals who were recruited through a large rehabilitation centre and further snowballing. All of them had current or recent stroke rehabilitation experience in Kuwait and represented a range of nursing and therapy backgrounds, and various nationalities and cultures. Inductive thematic analysis identified five major

influences on the quality of life of stroke survivors, namely function and dependency, relationships, quality of treatment and rehabilitation, reconnection with personal values and meaningful activities, and finances.

In conclusion, several themes resemble those found in Western studies, although certain financial issues may be specific to Kuwaiti culture. To provide holistic, culturally sensitive care and rehabilitation that enhance the quality of life of stroke survivors, health professionals need to be aware of their own values and those of their patients. There may be cultural differences in priorities afforded to factors such as occupation, relationships and finances.

Keywords: Arabic, culture, Kuwait, quality of life, stroke

Introduction

Quality of life has been described as ‘an individual’s perceptions of their position in life in the context of the culture and value system in which they live and in relation to their goals, expectations, standards and concerns’ (Sturm *et al*, 2004, p. 2340). Quality of life is a multi-dimensional experience affected by a range of psychosocial factors that include culture and health (Bowling, 2004). Culture influences quality of life through, for example, religion, understandings of illness, social support, familial obligations, and material resources, so it is important to understand how quality of life is experienced in different cultures (King, 2008). This is particularly important for health and social care professionals (McKevitt *et al*, 2003; Balcazar *et al*, 2010). This paper considers quality of life and culture with regard to stroke in Kuwait, a country in which neither factor has been investigated to any great extent.

Kuwait is one of the Arabian Gulf States, and is ranked 13th in the world with regard to per capita income, according to World Bank data for 2010 (World Bank World Development Indicators Database, 2011). Linked to its oil resources, its native citizens benefit from generous pensions and free access to healthcare. In contrast, migrant or expatriate workers, who make up nearly two-thirds of the population (Al-Jarallah *et al*, 2010), do not receive these benefits and pay for care through private health insurance. Arabic cultures tend to be collectivist in orientation, and have hierarchical family structures, gender segregation and strong commitments to the Muslim faith (Kulwicki *et al*, 2000; Dean *et al*, 2006). The combination of traditional collective values, strong public commitment to the Muslim faith and ready access to healthcare and rehabilitation both at home and abroad seems likely to create a culturally distinctive experience for stroke survivors and their families. Also, within Kuwait, a historically illness-centred approach to healthcare and rehabilitation may limit professionals’ strategies for promoting their patients’ health and empowerment (Dean, 2008).

Quality of life after stroke

Several quantitative studies suggest that quality of life decreases after stroke because of functional impairments, depression and insufficient social support (King, 1996; Carod-Artal and Egido, 2009; Gunaydin *et al*, 2011), home circumstances and standard of living (King, 1996), and also gender and age, with women and older adults, as well as more dependent stroke survivors, reporting lower quality of life (Hackett *et al*,

2000). Despite the prevalence of stroke worldwide, there is little research about quality of life after stroke in non-Western societies. What evidence there is suggests some differing perspectives between Western and non-Western societies. For example, a Chinese focus group study of elderly stroke survivors linked quality of life to a wide variety of experiences, including good health, functional independence, interpersonal relationships, personal control, self-acceptance, and an ability to participate in valued activities (Lau and McKenna, 2002). Wider resources such as adequate finances and housing were also considered to be important, these views being shared with stroke survivors in the USA (King, 1996).

The way in which stroke is experienced within Arabic cultures is an issue that has been largely neglected by researchers. The incidence of stroke in Kuwait is relatively low, explained both by the low average age of the population and by the reliance on hospital admission data rather than community prevalence data (Abdul-Ghaffar *et al*, 1997; Benamer and Grosset, 2009; Tran *et al*, 2010). The proportion of Kuwaitis to non-Kuwaitis (expatriates) is about 1:2 throughout the country, including utilisation of general health services (Al-Jarallah *et al*, 2010). In 2009, a total of 2103 patients with a diagnosis of stroke were discharged from government hospitals in Kuwait (972 Kuwaitis and 1131 non-Kuwaitis) (Ministry of Health, 2009). However, estimates of the numbers of Kuwaitis and non-Kuwaitis receiving treatment for stroke specifically within private hospitals in Kuwait are lacking. Al-Shammri *et al* (2003) conducted a 5-year retrospective review of ischaemic stroke cases in one hospital and found that of 62 patients, 11 were expatriates. These tended to be younger than the Kuwaiti patients. However, these low figures for expatriates may reflect the characteristics of the workforce in the oil company that this hospital specifically served.

Aim of the study

The aim of this study was to explore the views of health professionals regarding the key factors that promote quality of life of both Kuwaiti and non-Kuwaiti stroke survivors in Kuwait. Although as professionals they offered an ‘outsider’ perspective on the stroke experience, their views were considered valuable as they were all currently familiar with treating both Kuwaiti nationals and expatriates in Kuwait. The expatriate health professionals had also worked in other cultures, further increasing their sensitivity to cross-cultural issues relating to quality of life after stroke. The Kuwaiti healthcare system has tended to rely heavily on expatriate workers, although with the introduction of medical and allied health training courses in Kuwait in

recent years this pattern is now changing. Approximately 90% of nurses have origins outside Kuwait (Al-Jarallah *et al*, 2009). According to the 2009 Kuwait Ministry of Health (MOH) statistics (Ministry of Health, 2009), of the 13 554 nurses in MOH hospitals, 1214 (9%) were Kuwaiti, and 12 340 (91%) were non-Kuwaiti. The situation for allied health professionals is different, with approximately equal numbers of Kuwaiti and non-Kuwaiti workers (Al-Jarallah and the Kuwait Institute for Medical Specialization, 2006). This was also confirmed within the 2009 manpower statistics, with a total of 7530 'medical technicians' (i.e. allied health professionals), of whom 56% were Kuwaiti and 44% were non-Kuwaiti (Ministry of Health, 2009).

Methodology

A qualitative method was justified for this study to capture unexpected issues and nuanced perspectives. A hermeneutic stance was taken, regarding both participants and researchers as making sense of culture, rather than reporting on objective 'facts' about the stroke experience in Kuwait. This approach shares the assumption made by phenomenological researchers that people 'live in an interpreted world' and that 'interview research, for example, is the record of a process by which the researcher interprets the research participants' constructions of their world' (Ashworth, 2008, p. 19). However, this study does not claim to be fully phenomenological, as the participants were not reflecting in detail upon their personal life worlds, their struggles with loss or identity issues, or their embodied experiences associated with illness, which are topics more typically explored in phenomenological studies (Smith and Osborn, 2008). Rather, participants were regarded as expert informants within the research process (following the practice of Dressler and Pils, 2009), able to construe in some detail the interplay between culture and the stroke experience, through their lengthy participation in Kuwaiti health services.

Method and data collection

The ethics committee of the researchers' host university gave formal ethical approval. Based on this ethical approval, permission to conduct interviews was also obtained from the Kuwaiti rehabilitation centre from which most participants were drawn. Informed consent was obtained from participants. Full written information about the project was provided and written consent obtained, following guidelines provided by

the host university, the British Psychological Society and the Chartered Society of Physiotherapy. Participants were assured of confidentiality and anonymity through masking of personal details where necessary. Participants were free to withdraw from the study at any time.

Procedure

A series of single semi-structured interviews were conducted by the first author. Interviews lasted from 45 to 60 minutes. They were conducted in English, in a private room, and were audio recorded. An interview guide facilitated exploration of the participants' perceptions of culture and the stroke survivors' experience. For the aspect of the study reported here, the main topics were addressed by the following questions.

- 1 In your experience, what are the most significant challenges faced by stroke patients? (Additional questions, as needed, explored perceptions of physical/functional, psychological and social changes.)
- 2 How do you address psychosocial issues during rehabilitation?
- 3 What does quality of life after stroke mean to you?
- 4 In your experience, what factors do you feel influence quality of life among stroke patients in Kuwait? (Additional questions, as needed, explored understanding of native and expatriate stroke survivors' experiences.)

Audio recordings were transcribed verbatim. The interview data were subject to thematic analysis (Braun and Clarke, 2006). This is a process used within many types or traditions of qualitative research (Ryan and Bernard, 2000). Braun and Clarke (2006) emphasise that themes do not simply 'emerge' in a passive way, but are actively construed by the researchers, who infer patterns or shared meanings within the interview data that are deemed relevant to the research question. A bottom-up inductive approach was assisted by having only a basic literature review completed before the analysis. As suggested by Braun and Clarke (2006), the researchers began the analysis by initial familiarisation with the transcripts (through reading and re-reading) and making initial notes. Potential issues of interest that emerged from one account (such as financial support) were noted and then searched for in other transcripts to establish any patterns and commonalities. There was exploration of whether certain themes were emphasised or more prevalent in the accounts of Western and non-Western health professionals. The broader themes were again checked against the original data in order to determine their 'fit', and were named appropriately. The writing up of the report, which involved selecting illustrative

quotations with further interpretation, also contributed to refinement of the analysis. Rigour was increased as a result of the second author conducting independent analysis of a selection of the transcripts, followed by discussion in order to reach agreement. Reflective notes also informed the analysis process (Braun and Clarke, 2006).

Recruitment

Most of the participants were recruited from a rehabilitation centre in Kuwait. This centre treats a large number of patients, including those who have had a stroke. A small number of additional participants were recruited via a snowballing process through being made aware of the study by some of those who were already participating. Snowballing is an approach to recruitment that is accepted when there is no straightforward way of sampling relevant participants (Mason, 2002). As information was made available through both personal and written invitations, it is not possible to estimate how many staff became aware of the project but declined to take part.

The sample consisted of 12 rehabilitation professionals (seven physiotherapists, three nurses, one occupational therapist and one speech and language therapist). A diversity of cultural backgrounds was evident in the sample, as is typical of the health professional workforce in Kuwait (Al-Jarallah and the Kuwait Institute for Medical Specialization, 2006; Al-Jarallah *et al.*, 2009, 2010), with three Kuwaiti, two Canadian, one American, one German, two Indian, one Malaysian and two Filipino professionals.

Findings

Five themes were identified, namely function and dependency, relationships, quality of treatment and rehabilitation, reconnection with personal values and meaningful activities, and finances. These are discussed below.

Function and dependency

Function and dependency were identified by all of the interviewed health professionals as being a key influence on quality of life after stroke:

If they can help their family, they can work and then they can play their role, their function, with their family, their community ... it can improve their quality of life, [however, when they are] at home, bedridden and they cannot do anything without help, that will be a lot more trouble.

(Malaysian nurse)

In line with their focus on function, some interviewees also indicated that quality of life depended upon the severity of the stroke:

The severity [of the stroke], that's a big, that's an important factor or determinant of quality of life ... if you lose a finger, it's not like you lose a whole like hand, the whole arm or both of your feet. So I think the type and severity of the disorder will determine the quality of life.

(Kuwaiti speech and language therapist)

Some therapists expressed concerns about stigma and functional abnormality when they reflected on quality of life:

A stroke patient most probably will walk but everybody in the street will see him and they will say he has had a stroke, it will be seen directly that he has a problem and ... he can do many of his functions but in a non-appropriate way, this is not quality of life. To feel that you are nearly normal this is a good quality of life.

(Kuwaiti physiotherapist)

This particular therapist associated quality of life directly with quality of movement. He implied that a person who was walking in a 'non-appropriate way' was likely to have a poor quality of life. The idea that 'normal' functioning promotes a better quality of life could be related to cultural influences that stigmatise disability, a culturally embedded view that is even implied by the therapist himself. The idea that people in the community will view the functional difficulty negatively also adds to the perception of a poorer quality of life. Two other therapists (a Kuwaiti and a Canadian) also reflected on the negative influence of stigma.

An occupational therapist explicitly linked severe loss of function with loss of roles, viewing the latter experience as a key influence on adjustment and thus quality of life:

Quality of life ... it's pretty much your functional role in the world and how you interact with it, and to a greater or lesser degree that has suddenly been altered [by the stroke] and that takes some adjustments.

(American occupational therapist)

Irrespective of cultural background, participants associated poor quality of life with increased dependency and severe disability. Some linked these problems with loss of roles, and stigma.

Relationships

Relationships with family members and others within the community were also widely discussed, in terms both of alleviating loneliness and of reducing the risk of depression.

Human beings depend on other human beings ... this is the only psychological [influence on quality of life] apart from our therapy.

(Indian physiotherapist)

Moreover, the family was thought to play a role in motivating good self-care and participation in rehabilitation:

If you have a good family that can support you and then you are feeling that you are not alone or you are not struggling alone with what you are having. ... If you don't have a good support from the family, then you feel very depressed and de-motivated.

(Malaysian nurse)

Criticisms by relatives, including suggestions that the stroke survivor was a burden, were also thought to influence stroke survivors' quality of life:

If the relatives are really very bad and they keep on telling 'You are a problem to us', it makes him depressed.

(Indian physiotherapist)

A feature of Kuwaiti culture, noted by several participants and similar to many collectivist-oriented societies, concerned the nature of family support. Several of the professionals cited the widespread practice of extended family living arrangements, which potentially increased the quality of life of stroke survivors as they typically returned home to multi-generational families. Living alone was described as rare.

Quality of treatment and rehabilitation

Participants regarded access to good treatment and rehabilitation services as another important influence on quality of life after stroke.

Usually with good treatment ... we can improve our [patients'] quality of life ... if the patient can get all the facilities, the treatment and also [if] the patient is willing to do it.

(Malaysian nurse)

The skills, attitudes and standards of care of the physiotherapist were related to effective treatment, which was thought to increase quality of life by enhancing functional abilities:

I think it will depend most of the times on us as physiotherapists, if we work with them in a good way that will give them good quality of function. ... If it's just to do the [basic] function we can do our job fast and finish, but if we concentrate, he will walk with good hip flexion and with heel strike, without deformities.

(Kuwaiti physiotherapist)

Resources in Kuwait and access to good multi-disciplinary treatment were thought to increase stroke survivors' quality of life. Nonetheless, some participants commented that patients needed motivation to follow professional recommendations:

And he has to take care ... he has to follow our treatments like one hour we are doing [exercise] and [then] he has to do it by himself in home ... so these things also give him a better quality in life.

(Indian physiotherapist)

Although many of the participants linked motivation with adherence to treatment and thus quality of life, some thought that Kuwaiti stroke survivors could be more difficult to motivate than those in Western cultures because of their affluent lifestyle, access to paid domestic assistance and other factors.

Some of the health professionals thought that Kuwaiti patients had access to better treatment and rehabilitation than non-Kuwaitis, as they were funded by the government to go abroad for treatment. As well as learning skills, they returned home with better adaptive equipment which could increase their quality of life:

Yes everybody goes abroad ... [for] better treatment ... but, and comparatively, I am comparing between India and these Kuwait people, of course, they are having money. [In the] initial stage when they found out this is a stroke, they immediately go to London, of course the government is helping them. So their quality of life is really very good because they have some [professional] braces in a proper manner, not like just what we hand-make like that, no, but they are getting very proper braces, and other things, and they are getting a good treatment with some great training.

(Indian physiotherapist)

Financial help from the government was a resource considered likely to increase quality of life after stroke when comparing native Kuwaitis with other nationals within and outside Kuwait.

The therapist's skills, the patient's access to comprehensive rehabilitation, and the purchase of specialist rehabilitation abroad were all identified as important in determining quality of life in stroke survivors living in Kuwait. Access to good-quality therapy was viewed as being dependent on the available resources, either in the country itself or when accessing care abroad. Expatriate therapists perceived that Kuwaiti stroke survivors typically regained a better quality of life than non-Kuwaiti survivors living in Kuwait, because of their access to well-resourced healthcare and rehabilitation abroad.

This theme was much more prominent among the non-Western health professionals. This may reflect their greater acceptance of the biomedical model and the primacy given to treatment. Western therapists appeared to place more emphasis on recovery of

lifestyle and living in ways congruent with pre-stroke values.

Reconnection with personal values and meaningful activities

Quality of life was also linked with stroke survivors reconnecting with what they had experienced as important or meaningful prior to the stroke in terms of values, beliefs and occupation:

It goes back to the values and the belief systems and what's important to them. Yeah, it's something so personal ... you have to ask them ... you have to probably ask the family since you don't know what's important to that person. Again, the language barrier is huge ... what's important to them?

(Canadian physiotherapist)

Participation in valued activities was also linked with quality of life after stroke:

If they can still hear, talk, and see, and will cherish a kind of fun ... their quality of life won't suffer that much.

(Canadian physiotherapist)

It was mainly the Western health professionals who saw personal values and a return to meaningful activities as important determinants of quality of life in stroke survivors. They observed that language barriers created difficulties in obtaining information about these factors from survivors and their families, but considered that they needed this information in order to identify solutions or replacements for losses experienced following the stroke. It is possible that Western therapists are more attuned to the concept of survivors' personal values and beliefs. One physiotherapist mentioned 'fun' associated with personal values as being important in quality of life. This may reflect a patient-centred view of illness, quality of life and rehabilitation that is particularly associated with a Western world view.

Both Western and non-Western therapists reflected on the ability of survivors to reconnect with activities that were meaningful prior to stroke:

For me, in a very basic sense, quality of life is being able to freely interact with your world and do the things you like and want to do that after stroke are significantly inhibited. ... So quality of life, for me, is enhancing the way a person interacts with the world ... to make it a little bit more like the way it used to be or even better in some respects.

(American occupational therapist)

Other therapists also mentioned the need to return to pre-stroke lifestyle, to perform usual roles within the family and to interact with the world:

How well they can come back and perform their roles again ... and lead the normal life again ... being able to do all other activities normally.

(Indian nurse)

A similar view about returning to pre-stroke life and roles was expressed by another nurse:

The interesting thing about stroke is as long as they can return to their life, maybe not fully as before, but at least they can help themselves – if they can help their family, they can work and then they can play their role, their function, with their family, their community, then I think all these things can help, it can improve their quality of life.

(Malaysian nurse)

The ability to interact with wider society and deal with obstacles such as social stigma was perceived as a further significant issue:

If ... these patients are not able to interact with their society, people around them, this is not a very good quality of life, and sometimes some of these patients they will avoid interacting with other individuals because they are having these problems, this is not a quality of life.

(Kuwaiti physiotherapist)

Finances

Having sufficient personal funds was considered to be an important determinant of quality of life by three participants, all from non-Western backgrounds:

I mean it is like totally the economical position of the patient [that influences quality of life].

(Indian physiotherapist)

If they are in a difficult situation, like financially, they may feel that they are a burden to their family and they may undergo more depression.

(Filipino nurse)

A Kuwaiti therapist suggested that some Kuwaiti stroke survivors thought that it was possible to purchase a comfortable lifestyle, and he was concerned that this view might discourage the personal effort required to engage in rehabilitation. A Canadian physiotherapist described challenging the assumption among some of her clients that their affluence itself would restore quality of life. Other Western health professionals did not mention the influences of finances on quality of life except with regard to accessing better treatment abroad.

Discussion

Health professionals described stroke survivors' quality of life in Kuwait as influenced by their levels of function and dependency, social relationships, quality of treatment and rehabilitation, reconnection with personal values and meaningful activities, and finances. The implications of these findings are discussed below.

Function and dependency

The reported influence of function and dependency on quality of life is consistent with the findings of other studies, in both Arabic and Western cultures, that draw on accounts from patients, caregivers and health professionals (Pound *et al*, 1998; Dowswell *et al*, 2000; Al-Oraibi, 2002; Murray and Harrison, 2004). However, the concerns of stroke survivors reported by Pound *et al* (1998) appeared to relate to their walking ability per se rather than negative reactions from the public, such as any perceived social stigma associated with an altered walking pattern. This is somewhat different from the findings of the present study, in which social stigma associated with an altered walking pattern was linked to poorer quality of life by some of the health professionals who were interviewed. These were predominantly the Kuwaiti participants, which may suggest some prevailing negative views about disability in Kuwaiti wider society. Western stroke survivors have also highlighted dependency, leading to low mood, as a problem (White *et al*, 2008). Loss of physical abilities and consequent loss of social roles and meaningful occupation were deeply mourned by stroke survivors in a UK study (Dowswell *et al*, 2000). It appears that such losses may be perceived as detrimental to quality of life across cultures.

Social relationships

In this study, the health professionals portrayed social relationships, especially within the family, as having a positive influence on quality of life after stroke, providing not only emotional support but encouragement during the process of recovery. Similar findings have been reported among stroke survivors in Jordan (Al-Oraibi, 2002). Social support and relationships have been well documented as influencing stroke survivors' well-being in recent studies conducted in such diverse cultures as China (Chau *et al*, 2010), Spain (Carod-Artal *et al*, 2000), rural Canada (Doble *et al*, 2009), Greece (Tsouna-Hadjis *et al*, 2000) and Australia (Teoh *et al*, 2009). In Arabic countries other than Kuwait, family support and good social relationships have been linked with quality of life among patients undergoing haemodialysis in Iran (Rambod

and Rafii, 2010), and among those affected by HIV/AIDS in Lebanon (Abboud *et al*, 2010). Taken together, these studies suggest that family support enhances quality of life across cultures. The participants commented on the widespread nature of extended family living arrangements in Kuwait, so that it was uncommon to see a stroke survivor living alone or in residential care. Al-Jarallah *et al* (2010) point out that in Kuwait most families perceive it to be culturally inappropriate to transfer frail older relatives into nursing homes.

Disability-related stigma

Kuwaiti health professionals placed more emphasis on disability-related stigma and its impact on quality of life after stroke. Reasons given for social withdrawal included stroke survivors being dependent on family members to take them out, and personal as well as family embarrassment about their disabilities. A reduction in social activities after stroke is consistent with the results of other studies conducted in Western countries, such as the UK (Dowswell *et al*, 2000; Murray and Harrison, 2004). Reasons for social withdrawal cited in these previous studies included not only feelings of shame but mobility limitations, fear of falling, and personality changes. The theme of shame and social stigma was also prevalent in the accounts of Lebanese, Italian and Vietnamese survivors of traumatic brain injury (TBI) and their families (Simpson *et al*, 2000). People affected by HIV/AIDS in Lebanon have also cited stigma as a major negative influence on quality of life (Abboud *et al*, 2010).

Quality of treatment and facilities

The health professionals perceived good-quality treatment and access to facilities abroad as important influences on quality of life among stroke survivors living in Kuwait. However, this emphasis on treatment was predominantly noted among non-Western therapists. Such an emphasis could reflect health professionals' own priorities and needs for self-efficacy. However, good medical care has previously been reported to make a major contribution to quality of life by HIV patients in Lebanon (Abboud *et al*, 2010). Al-Oraibi *et al* (2011) described stroke services in Jordan as limited in availability, as is the case in many other less developed countries. Whether health professionals who are more familiar with restricted health and social care services in their culture of origin place more value on them and are less likely to take them for granted is unclear, and warrants further exploration.

Regaining of pre-stroke values and roles

Quality of life was linked to regaining a lifestyle congruent with pre-stroke values, especially by the Western health professionals. The desirability of resuming former roles and activities (such as valued leisure activities) has been expressed by stroke survivors in a number of Western cultures, including metropolitan and rural Canada (Barker *et al*, 2004; Doble *et al*, 2009), Ireland (O'Sullivan and Chard, 2010) and Norway (Sveen *et al*, 2004). However, there is a need for better understanding of the processes that support the resumption of former roles and discovery of new meaningful activities, including the contributions of social support and personal reprioritising (Kessler *et al*, 2009). Further exploration of this area with Arab stroke survivors is also needed.

Financial resources

Financial resources were cited by a few health professionals, largely from non-Western backgrounds, as contributing to the quality of life of native Kuwaiti stroke survivors. Finances and returning to work, especially for younger stroke survivors, have been recognised in Western literature as increasing life satisfaction after stroke (Vestling *et al*, 2003, 2005). An adequate personal income/standard of living and appropriate housing have also been linked to quality of life by American (King, 1996) and Chinese (Lau and McKenna, 2002) stroke survivors. Many native Kuwaitis are affluent. Furthermore, as a result of generous government financial support, native Kuwaiti stroke survivors were perceived to have access to better rehabilitation and specialist equipment abroad, which thus potentially enhanced their quality of life. The financial security of native Kuwaitis was presented as increasing recovery opportunities, optimism about the future and personal comfort. However, this resource was also perceived as carrying some risks in that patients might assume that quality of life could be purchased, leading ultimately to disappointment in the rehabilitation and recovery process. Further research is required to explore this issue in more depth and to discover what happens to migrant workers who suffer stroke, as most of these individuals work in the private sector, where there is much less financial security.

Critical evaluation

A major strength of the study was that the findings were informed by the diverse experiences of the participants, who were able to draw on a rich array of

personal and professional experiences within and beyond the culture of Kuwait, and their own work with both native and expatriate stroke patients in Kuwait. The interviewer shared this professional background, which may have increased rapport. The participants were able to express themselves quite fluently in English, enabling not only the collection of rich data, but also joint analysis of transcripts by the researchers, which increased the rigour of the study. Nevertheless, the views collected were those of outsiders to the stroke experience, and further research is needed to explore Kuwaiti and non-Kuwaiti survivors' own experiences of quality of life after stroke, which may not be identical. For example, the health professionals' focus on the role of good-quality rehabilitation may have reflected their own needs for efficacy and esteem, and it is not known whether stroke survivors give their medical and rehabilitation care similar emphasis. The possibility that affluent Kuwaitis might believe that they can purchase a good quality of life after stroke, without necessarily committing themselves to effortful engagement in rehabilitation, also merits investigation. Some topics, such as gender and depression, were not considered by the participants, yet both of these factors influence stroke survivors' quality of life according to previous research, and seem likely to influence the experience of stroke in an Arab country where gender segregation is widespread (as has also been found in Jordan by Al-Oraibi *et al*, 2011). It is uncertain whether there were any cultural taboos surrounding these particular topics which made them difficult to discuss, or whether these issues were taken for granted, so the participants did not see any need to elaborate on them.

Conclusions and recommendations

Enhancing quality of life for stroke survivors should be one of the primary aims of health and social care, but achieving this requires sensitive appreciation of each patient's cultural context. The findings of this study have identified five main themes which were perceived as influencing quality of life after stroke in Kuwait, namely *recovery of function and reduced dependency, supportive relationships, access to quality treatment and rehabilitation, reconnecting with pre-stroke personal values and activities, and access to adequate financial resources*. These are themes that resonate with other studies both in Western countries and in other Arab countries, although the widespread access to expert treatment abroad and the presence of substantial financial resources for the native Kuwaiti stroke survivor may have a significant influence on quality of life

after stroke. Western therapists placed more emphasis than non-Western participants on patients reconnecting with their pre-stroke personal values. This may be indicative of a somewhat distinctive world view based on their educational and professional backgrounds, their education in the biopsychosocial approach to healthcare, and their exposure to individualistic Western cultures. The impact of stigmatisation on the quality of life of stroke survivors was particularly salient to Kuwaiti therapists. Further research is needed to explore the experiences of life after stroke among stroke survivors in Kuwait. Such research would require Arabic interviewers to enable fluent discussion of personal experiences, and would probably involve liaison with the whole family, given the degree of family involvement in stroke survivors' lives.

On the basis of this study, it is suggested that clinical specialists may better address quality of life issues in rehabilitation by not only focusing on typical objectives, such as recovery of function and restoration of roles, but also liaising with the extended family about their active contributions to the stroke survivor's well-being and their continuing rehabilitation after discharge. It also seems potentially helpful to have open discussion with the Kuwaiti stroke patient about the benefits of active engagement in goal setting and rehabilitation, as recovery depends upon much more than expert medical intervention. Previous research (Kamran *et al*, 2007) has shown only limited understanding of stroke among the Kuwaiti population. One implication of the present study is that stroke patients in Kuwait may also benefit from more education about their active contribution to the rehabilitation process.

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CONFLICTS OF INTEREST

None.

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