

Government of **Western Australia** Department of **Health** 

Curtin Health Innovation Research Institute



Quality

Self-management

Assessment

Framework

(Q - SAF)

Packer, Tanya L. Roberts, Lauren Ghahari, Setareh Osborne, Richard Boldy, Duncan Jiwa, Moyez

Australian Better Health Initiative: A State, Territory and Australian government initiative

# © Department of Health, State of Western Australia & Curtin University of Technology 2009

The Publication was produced by the Western Australian Department of Health and the Curtin University of Technology. Copyright in this Publication belongs to the State of Western Australia and the Curtin University of Technology. Apart from any fair dealing for the purpose of private study, academic research, criticism or review or non-commercial use as permitted under the Copyright Act 1968 (Cth), no part may be reproduced without written permission of Health Network Branch, WA Department of Health. The WA Department of Health is under no obligation to grant this permission. Please acknowledge the WA Department of Health and Curtin University when reproducing or quoting material from this source.

#### Important Disclaimer:

All information and content in this Publication is provided in good faith by the WA Department of Health and the Curtin University of Technology who have made every attempt to ensure it is based on sources believed to be reliable and accurate at the tine of development. The State of Western Australia, the Western Australian Department of Health, the Curtin University of Technology and their respective officers, employees and agents, expressly disclaim liability for any act or omission occurring in reliance on the information in this Publication and any consequences of such act of omission and do not accept legal liability or responsibility for any consequences arising from its use.

# Acknowledgements

We would like to acknowledge Naomi Fulton for providing overall guidance to the WA ABHI Self-management Project. In addition, we would like to especially thank Karen Bischoff and Campbell Anderson for undertaking the 'mapping exercise' which located and documented self-management programs in Metropolitan Perth. This work provided an invaluable basis for the interviews with a sample of providers, which were a crucial stage in the development of the Q-SAF. It was their support and encouragement that ensure the involvement of many providers at every stage of development of the Q-SAF. Our thanks also go to Tanya Jones for her contribution to the interview process and testing of the Q-SAF.

**Suggested citation:** Packer, T.L., Roberts, L., Ghahari, S., Osborne, R., Boldy, D., Jiwa, M. (2009) Quality self-management assessment framework (Q-SAF). Curtin University of Technology and Western Australian Department of Health, Perth, Western Australia.

To obtain a copy contact healthpolicy@health.wa.gov.au

# Authorship

This manual was produced as part of the project "Information and Evaluation Services for the WA Self-Management Project" (WASM Project), carried out between 2008 and 2010. The project was commissioned by the Government of Western Australia Department of Health. Short biographies of each author follow.

Tanya Packer PhD, MSc, BSc (OT): Professor in the School of Occupational Therapy and Social Work at the commencement of the project, she is now Professor in the School of Occupational Therapy, Dalhousie University, Canada. She is an Adjunct Professor, Curtin Health Innovation Research Institute, Curtin University, Australia and Honorary Professor, Robert Gordon University, Scotland. She is currently the research lead for the joint Curtin - Dalhousie Self-management Research Group. With considerable experience in the development and testing of disease specific self-management interventions she initiated and directed the WASM Project during its formative stages. Her first self-management program, related to multiple sclerosis (MS) fatigue was developed in 1995, and is now used as a main MS fatigue protocol internationally. In 2006 she developed the strategic direction for the Western Australia Department of Health's State-wide Self-Management Initiative and in 2007 she served as an expert on the National Reference Group on selfmanagement competencies and curriculum development for nursing, medicine and allied health. She is the author or co-author of numerous peer reviewed journal articles and four self-management protocols.

**Lauren Roberts** BSc: Research Assistant, Silver Chain and previous Project Officer for the WASM Project. She completed her bachelor degree in Health Science at Curtin University and is just beginning her research career. In addition to her project officer role, she has gained research experience in health, community and aged care services while working as a research assistant for the Silver Chain Nursing Association, Western Australia's largest aged and community care provider.

**Setareh Ghahari** PhD, MSc, BSc (OT): Senior Research Fellow in the Centre for Research into Disability and Society, School of Occupational Therapy and Social Work, Curtin University of Technology, Perth, Western Australia. She is also an academic staff member in the Department of Occupational Therapy, University of Social Welfare and Rehabilitation Sciences, Tehran, Iran. She is the current Project Officer for the WASM Project and has been successful in securing grant funding and publishing in peer-reviewed journals in the area of self-management.

**Richard Osborne** PhD, BSc: Professor and Director of Public Health Innovation at Deakin University, Australia. He holds a NH & MRC Population Health Fellowship and his research covers clinical trials, generation and introduction of healthcare reforms, development of models of care grounded in practice, and impact and outcomes measurement. He led the Victorian orthopaedic waiting list reform initiative and developed the heiQ for the national quality and monitoring system for chronic disease self-management (CDSM), now used in many countries. For the Council of

Australian Governments, he recently completed the National Workplace Health Initiatives Survey of opportunities, barriers and enablers for diabetes control. He is convener of the International Conference on CDSM, and co-convener of the 2009 International Roundtable on CDSM. He sits on several state and commonwealth government committees, has published over 100 peer reviewed papers, chapters and reports, and provides advice to a range of international agencies on CDSM.

**Duncan Boldy** PhD, MSc, BSc(Hons), CertEd, FACHSE, AAGF: Professor in the Centre for Research into Disability and Society and in the Centre for Research on Ageing, within the Curtin Health Innovation Research Institute, Curtin University of Technology, Perth, Western Australia. Currently directs the WASM Project. He is also an Adjunct Professor at the University of Queensland and has worked in universities in the UK and the USA. He has over 30 years experience in health and social services research and many of his over 150 refereed publications relate to aspects of ageing and aged care. He is the author, co-author or editor of nine books, one of which has been translated into Spanish and another into Japanese. In addition to undertaking consultancies within Australia for state and commonwealth governments, he has served as a consultant to projects in Thailand, Iran, Hong Kong and Singapore. He recently directed an evaluation of one of the Australian Government's Sharing Health Care demonstration projects related to self-management.

**Moyez Jiwa** MA, MD, MRCGP, FRACGP: General practitioner, Professor of Health Innovation and Director of the Curtin Health Innovation Research Institute, Curtin University of Technology, Perth, Western Australia. He has 20 years of experience in general practice and has worked at Universities in the UK until 2005. He chairs the primary care, prevention and screening collaborative on behalf of the State Cancer Network of Western Australia. He has a number of roles including editorship of a number of peer reviewed journals and membership of national committees including Cancer Australia, the Royal Australian College of General Practitioners and the National Breast and Ovarian Cancer Centre. He has an established international track record in primary care research and has published widely on the determinants of help seeking behaviours, access to primary care and the development and testing of complex interventions in primary health care.

# **Table of Contents**

Background and Context	6
Chronic Conditions	6
Health Care Reform	7
Self-management	7
Self-management in Australia and Western Australia	8
Purpose of the Q-SAF	7
Constructs and Frameworks Informing Q-SAF Development	8
Chronic Care Model	9
Assessment of Chronic Illness Care (ACIC)	9
Fidelity	9
The RE-AIM Framework	10
Equity of Access	10
Development of the Q-SAF	11
Q-SAF Domains	11
Using the Q-SAF	12
Target Programs	12
User Qualifications	12
Scoring and Interpretation	12
Use in Practice and Research	15
References	18
Quality Self-management Assessment Framework (Q-SAF)	20

# **Background and Context**

The incidence and prevalence of chronic disease, coupled with the associated costs, is starting to influence health system reform. Chronic disease/condition management models, including client self-management, are being implemented. Despite a multitude of randomised control trials examining effectiveness, there is no systematic or uniform way to describe the components of self-management programs or to guide quality improvement. The Q-SAF was developed to fill this gap.

#### **Chronic Conditions**

A chronic health condition is "any condition that presents itself for longer than six months, involves slow changes and may be controlled but is often not curable" (The Royal Australian Colledge of General Practitioners, 2004, p.3). The World Health Organization (2005) has estimated that 41 million people will die from chronic conditions in the year 2015, 20% of which will occur in high income countries, including Australia; over three quarters of Australian people living in private dwellings are estimated to have at least one chronic condition. The proportion increases with age with almost all of those people aged 65 years and over living with at least one chronic condition (Australian Bureau of Statistics, 2006).

The impact of a chronic condition(s) is immense. Although often not immediately lifethreatening, chronic conditions place a substantial burden on the health, economic status, and quality of life of individuals, carers, families and communities. In Australia, chronic conditions contribute to around 80% of the total burden of disease and health problems as measured by disability-adjusted life years (DALYs) (National Health Priority Action Council, 2006).

The costs to the health care system of chronic conditions are also high. The annual direct cost in Australia, estimated based on the 2001 National Health Survey, included \$5.4 billion for cardiovascular disease, \$615 million for asthma, \$836 million for diabetes, and \$4.7 billion for arthritis and musculoskeletal conditions. Including costs other than direct costs, estimates soar. For example, the total cost for arthritis (16.5% of the population, equal to 3.1 million people in 2001) was \$8.96 billion (Access Economics Pty Limited, 2005). Other than national health priority areas, costs are also high. In 2005 while only 14900 people across Australia were reported to have multiple sclerosis (prevalence of .08%) the total financial cost to the health care system was \$601 million per annum (Access Economics Pty Limited, 2001).

The WHO recommends reducing the high impact of chronic conditions by using accurate information, scientific knowledge and effective interventions (WHO, 2005). Because of the nature of chronic conditions, management varies over time, with treatments adjusted according to changes in individuals' symptoms and fluctuations as the condition progresses. A client-centred approach, with clients contributing to and driving the management process, facilitates individuals to live with their chronic condition with the least negative impact on their lives and consequently on their community.

#### Health Care Reform

Despite the overwhelming numbers of people living with chronic diseases, health care systems continue to be mainly designed to respond to acute, episodic events. Given that acute inpatient care now accounts for only 20% of the health care provided (Pincus, Esther, DeWalt, & Callahan, 1998) there is a mismatch between service delivery and current chronic disease profiles. Demands for significant health system reform are being made in response to this increasing burden of chronic disease and the realization that current health care systems are not sustainable in the longer term.

#### Self-management

Management of chronic conditions is a challenge for people living with the condition(s), health and social service providers and organisations. The self-management element of the model recognizes that many individuals wish to take an active, rather than passive role. *Self-management* is defined as "the individual's ability to manage the symptoms, treatment, physical and psychosocial consequences and lifestyle changes inherent in living with a long term disorder" (Department of Health, 2005). *Self-management support* can be defined as "the actions taken by health and other providers to assist individuals to self-manage". Corbin and Strauss (1988) identified that people with chronic conditions must undertake three key management tasks: management of the symptoms and condition; management of the associated emotional consequences; and management of the impact upon daily life, activities and routines. This work has dramatically influenced the focus of self-management interventions.

Research shows that people with effective self-management skills not only have better health outcomes, but are also able to make better use of time with health care professionals (Barlow, Turner, & Wright, 2000; Lorig et al., 1999). People live with their chronic condition on a daily basis over a long period of time, therefore their ideas and behaviours are important. Changing attitude and behaviour can influence the way people manage their condition (The Royal Australian Colledge of General Practitioners, 2004). Consequently, persons with a chronic condition play an integral role in the management of the condition (Bodenheimer, Lorig, Holman, & Grumbach, 2002).

Optimal self-management support relies on a collaborative relationship between health-care professionals and the person with chronic conditions, together with their family and/or carers. The collaborative model has been proposed as an approach which enables the link between a persons' needs and health care systems (Lorig, 2003). This method of service delivery represents a shift in control, from the healthcare professional to the individual (Department of Health, 2005). Programs based on this approach see individuals as central in managing their condition, and the collaborative partnership between them and providers as the means for achieving effective care (Lorig, Sobel, Ritter, Laurent, & Hobbs, 2001). In a collaborative model, individuals accept responsibility for managing their own conditions and are encouraged to solve their own problems, with information and support, but not direction, from professionals (Bodenheimer et al., 2002). In this model the person seeks, and is actively involved in, a relationship with health professionals. This close relationship facilitates making choices in levels of support received by individuals. Although the level of support requested is likely to vary subject to the illness trajectory and an individual's circumstances, Koch et al. (2004) suggest that this approach to self-management is related to decision making and personal accountability. People with chronic conditions are recognised as having expertise of similar importance to that of professionals. While professionals are experts about diseases, individuals are experts about their own lives.

#### Self-management in Australia and Western Australia

The Australian Better Health Initiative (ABHI) was launched by the Council of Australian Governments (COAG) in July 2006 to refocus the health system to promote good health and reduce the burden of chronic disease (Department of Health, 2006). Self-management is identified as one of the four key action areas, along with prevention across the continuum, strengthening early detection and early treatment, and integration and continuity of prevention and care (National Health Priority Action Council, 2006). The budget for this package was \$250 million over 5 years.

In Western Australia, the ABHI Chronic Disease Self Management (CDSM) Project was established to address one of the five key priority areas for ABHI, namely:

#### "to encourage active patient self management of chronic conditions".

This State-wide project was established to implement the WA Self Management Strategy, to improve the reach and quality of self-management programs across WA and to embed a self management approach throughout the continuum of health care. The Q-SAF is one of many outcomes of this project and addresses the aim of improving the quality of self-management programs.

# Purpose of the Q-SAF

The Q-SAF has been developed for use by providers, managers and researchers in the field of self-management. It provides a generic framework with which to systematically examine the quality of programs, identifying program strengths and weaknesses. In combination with a quality improvement cycle, ongoing development and improvement can be documented and pursued.

Thus, the specific purposes are to provide:

- a uniform framework for describing self-management intervention programs, regardless of format of delivery, target population, geographic location etc.;
- a mechanism for identifying program strengths and weaknesses; and
- a mechanism for implementing and documenting quality improvement.

# Constructs and Frameworks Informing Q-SAF Development

The Q-SAF draws on current knowledge within the fields of chronic condition selfmanagement, health program implementation and quality assurance. Key constructs and frameworks influencing the development of the Q-SAF are provided to inform its use. These are intended to be informative rather than exhaustive.

#### Chronic Care Model

The most widely accepted model of care being adopted by governments internationally is colloquially known as the Chronic Care model. Built on a foundation of demonstrated evidence (E. E. H. Wagner, Austin, & Von Korff, 1996; E. H. Wagner, 1998), the model highlights the need for an integrated system of care that not only addresses persons' physiological and psychological recovery, but also enables them to effectively manage the impact of their chronic disease(s) on everyday life. Key elements of the model are self-management support, delivery system design (teamwork and expanded scope of practice for health professionals), decision support (integrating evidence-based guidelines with clinical practice) and clinical information systems (including use of electronic health records and surveillance systems). These key elements, when combined with appropriate community resources and policies, contribute to productive interactions between prepared and activated patients and prepared and proactive practice teams of health care professionals (E. H. Wagner, 2001). A health promotion approach acknowledging the important role of prevention of chronic conditions and secondary disabilities can be added to the Wagner Model, highlighting the importance of the social determinants of health and the role of community participation in managing chronic illness (Barr et al., 2003).

#### Assessment of Chronic Illness Care (ACIC)

Based primarily on the Wagner Model, the ACIC is a comprehensive tool focused on the organisation of care for chronic illness (Bonomi, Wagner, Glasgow, & Von Korff, 2002). The ACIC is a numeric scale, with categories defined as 0-2 (little or no support for chronic illness care), 3-5 (basic or intermediate support for chronic illness care), 6-8 (advanced support) and 9-11 (optimal, or comprehensive, integrated care for chronic illness). The items provide discussion of areas and specific improvement strategies. The teams using the ACIC can identify the area in which they need to improve.

#### Fidelity

A major appeal of evidence-based programs is their promise of effectiveness. The self-management programs have shown, through rigorous evaluations, that they can significantly affect important outcomes for participants. The best of them have demonstrated positive effects in a number of different settings. For policymakers, funders, and health practitioners, that potential for effectiveness can make an evidence-based program more attractive than an unproven program. However, we can only assume that a program will continue to have those effects if it is implemented according to the original program design. Staying true to the original program design is referred to as program fidelity. In other words, fidelity is defined as the extent to which delivery of an intervention adheres to the original protocol or program model. It assures that the treatment being studied is delivered in a way that accurately reflects the underlying intervention principles (Mowbray, Holter, Teague, & Bybee, 2003). Attention to fidelity advances the study aims (Horner, Rew, & Torres, 2006) and supports the researcher's conclusion about the association between the intervention and the study outcomes (Calsyn, 2000). To enhance the intervention

fidelity, different methods may be employed. Training the facilitators, preparing a detailed program manual and testing consistency of delivery across facilitators, are some examples of ways to ensure treatment fidelity.

#### The RE-AIM Framework

The RE-AIM framework is a method of systematically considering the strengths and weaknesses of chronic illness management interventions in order to guide program planning and emphasises a number of aspects related to both participants and settings (Glasgow, Klesges, Dzewaltowski, Estabrooks, & Vogt, 2006). The framework conceptualises the public health impact of an intervention as a function of 5 factors: reach, efficacy, adoption, implementation and maintenance (Glasgow, McKay, Piette, & Reynolds, 2001). Reach refers to the participation rate within the target population and the characteristics of participants versus non-participants. Factors determining reach are the size and characteristics of the potential audience and patients' barriers to participation (e.g. cost, necessary referrals, scheduling, transportation, and inconvenience). Efficacy pertains to the impact of an intervention on specified outcome criteria, when it is implemented as intended (Bodenheimer et al., 2002; Lorig et al., 1999). Adoption operates at the system level and concerns the percentage and representativeness of organizations that will adopt a given program. Factors associated with adoption include cost, level of resources and expertise required, and how similar a proposed service is to current practices of the organization. Implementation refers to intervention integrity, or the quality and consistency of delivery when the intervention is replicated in real-world settings. Finally, maintenance operates at both the individual and the system level. At the individual level, it refers to how well behaviour change efforts hold up in the long term. At the organization level, it refers to the extent to which a treatment or practice becomes institutionalized (Foster, Brown, Killen, & Brearley, 2007) as a routine part of usual care within an organization.

#### Equity of Access

The concept of equity of access to health care is a central objective of many health care systems, including the Australian health care system. 'Equity in health involves all efforts, both within and beyond the health system, aimed at improving life opportunities for those people who are most disadvantaged, so they have the best chance of achieving and maintaining good health' (NSW Department of Health, 2004). Despite many rural and remote initiatives over recent years, the health needs of many Australian communities are still not adequately met. Residents of rural and remote communities continue to show poorer health outcomes than residents in metropolitan centres, while the health of indigenous communities remains unacceptable. Many rural and remote communities experience ongoing difficulties in recruiting and retaining an appropriate and adequately trained medical and health workforce, while residents face increasing difficulties in accessing appropriate care in situations where integration and continuity of care are woefully inadequate. Health authorities and funding remains oriented to treatment and curative care services, while many of the upstream determinants of Indigenous, rural and remote health are poorly addressed.

# **Development of the Q-SAF**

The framework was developed as part of the Western Australia, State-wide Selfmanagement Initiative, which is part of the Australian Better Health Initiative: A State, Territory and Australian government initiative. As part of the State initiative, the mapping of self-management intervention programs was undertaken, locating approximately 150 programs. Program demographic data (length and format of the program, annual delivery, population served etc.) were collected. Of these 150 or so programs, 33 volunteered to participate in a more in-depth data collection process to inform the development of the Q-SAF. Interviews with providers were audio-taped and transcribed. An iterative process including research team meetings, examination and re-examination of transcripts and community consultation was undertaken, resulting in the final Q-SAF. This process included but was not limited to the following activities:

- Extensive review of international literature on self-management, health program delivery and quality assurance.
- Independent reading and re-reading by the research team.
- A one-day research team workshop to produce the first draft of the Q-SAF.
- Constant checking against additional transcripts for completeness.
- Presentation of draft Q-SAF to the WA Self-management Coordination Group
- Workshops with providers to improve completeness, clarity and understanding.

# **Q-SAF** Domains

The Q-SAF development was guided by the belief that:

Quality is demonstrated by an evidence-based, credible program that is repeatable and sustainable.

This determined the need for multiple domains and components, extending beyond the program content and delivery to the workforce and the way the programs are integrated and supported in organisations. The framework, therefore, includes four domains, each with an overall guiding statement:

#### 1. Self-management Program Content and Delivery

The program content is consistent with the management tasks related to living with a chronic condition (Corbin & Strauss, 1988) and respects the expertise of the individual who lives with the chronic condition and/or disability. It is delivered using principles of self-management.

#### 2. Program Reach, Consistency and Sustainability

A quality program is based on evidence, maintains fidelity and is judged by others to be credible and of value to people with chronic conditions.

#### 3. Workforce

Self-management support competencies are essential for all staff (professional and peer) who deliver programs.

#### 4. Organisational Support

A quality self-management program is embedded in systems and organisations

Each domain contains components with representative items that are scored using a four point (0-3) Likert scale.

# Using the Q-SAF

#### **Target Programs**

The Q-SAF is designed to examine the quality of self-management intervention programs. It is applicable to both generic and disease specific programs, of varying durations, frequency, and general instructional style. Programs may be individual or group, face-to-face, telephone or internet based. It is, however, important that the scope and intent of the program is definable. A typical example is a six week structured group program for people with diabetes. Other ways to define programs can also be used. For example, individual programs could be described as a standard initial interview/assessment resulting in a care plan or action plan, referral to up to three of five health professionals and a peer support group and concluded with a follow-up interview/assessment within three months.

Depending on the size and type of organisation, it may also be important to define the organisation. For example, an organisation may be defined in terms of a specific unit, department or the whole organisation, influencing assessment of strengths and weaknesses as well as subsequent quality improvement initiatives.

#### **User Qualifications**

Q-SAF is designed to be completed by providers of services, managers and/or researchers. Whichever is the case, it is recommended that the user has specific training and/or experience in the field of self-management.

#### Scoring and Interpretation

A rating system, using a 4 point (0 to 3) Likert scale, is provided for each domain. Domain 1: Program Content and Delivery, is organised as a matrix. Each item (content) is rated on six aspects of delivery. In the other three domains, each item is rated only once.

Once each item is rated, a score for each separate domain is calculated by summing the ratings on all items. As each domain is independent of the others, a total score holds no overall value and is not calculated. The summed score, by domain is entered on the scoring sheet provided. Percentage scores are then calculated and entered to create a Program Profile diagram. From this, the relative scores on the four domains can be readily seen visually.



The Program Profile is indicative of strengths and weaknesses. However, further interpretation is required to gain full value from the Q-SAF and prior to undertaking any quality improvement measures. Interpretation is a qualitative process involving professional judgement and can only be undertaken with knowledge of the program context, intended audience and system constraints.

Examples follow, demonstrating the need to interpret results carefully:

#### Example 1: High Score in Domain 1 and Low Scores in Domains 2 & 4.

Programs that are being tested or are in initial stages of implementation typically score high on Domain 1: Program Content and Delivery but lower on Domains 2 (Reach, Consistency and Sustainability) and 4 (Organisational Support).



#### Example 2: Low Scores in Domain 1

A low score in Domain 1: Program Content and Delivery may occur in programs with a limited and specific focus. This can be determined by examining the pattern of responses.

A high rating in the first three components of Domain 1 and low rating on all other domains indicates that only the medical aspects of self-management are being addressed. This limited focus should warrant scrutiny.

Alternatively, a low score in Domain 1 may indicate that delivery is focused on providing information alone. In this case, scrutiny as to whether the program is an education versus a self-management program is warranted.



Example 3: High Scores in Domain 1 & 3

High score in Domains 1: Program Content and Delivery and 3: Workforce may indicate high levels of formalised training/professional development that is not supported by attention to issues of reach, consistency of delivery and organisational support. Lack of organisational support may differ depending on the way the organisation has been defined; for example the support given by units or departments may differ from that provided by the entire organisation.



# **Use in Practice and Research**

The main purpose of the Q-SAF is as a quality assurance tool. Its greatest value is in assisting providers of self-management programs to interrogate all aspects of their program content, delivery and implementation in order to develop a profile of strengths and weaknesses. As all programs exist within a specific context, knowledge of this context will inform the use of the tool, the results and the interpretation, in turn allowing quality improvement efforts to be specific and tailored. This adds value to the practice setting.

Particular care must be taken in using the Q-SAF to make comparisons between programs. Firstly, if the aims and objectives are different, e.g. comparing a self management program with a physical activity program, then a straight comparison is inappropriate. Secondly, where self-assessments by program staff are made, there is an obvious incentive to score highly if such comparisons are known or expected to be made. However, it is suggested that confidential scoring by a knowledgeable and independent rater could be welcome and requested by programs wishing to learn from the experience of other programs, in a quality improvement rather than 'punitive' environment.

Within a research context, the Q-SAF may be used to systematically describe programs, to find commonalities across programs and to link outcomes to processes. This must be done within a research framework rather than a quality assurance framework, within which the following must be addressed: aspects of internal and external validity of the design, inter and intra-rater reliability, and bias.

The box below contains a practice related case study, whereby a rehabilitation program was enhanced to become more of a comprehensive self-management program by using the Q-SAF to identify required changes and then implement these.

#### Case Study:

Community Physiotherapy Services (CPS) provides group-based physical activity (PA), rehabilitation and education programs designed to maximise functional ability and minimise the impact of chronic disease and related secondary complications. Programs that have been developed for people with chronic conditions have been identified in research as benefiting from PA and/or specific rehabilitation programs. All clinical interventions within CPS follow condition-specific evidence based best practise guidelines, and incorporate targeted PA and education to empower the client to better manage their own health.

CPS has a range of programs to cater for different functional levels and specific chronic conditions. The Functional Rehabilitation Program is designed for people with chronic conditions living independently in the community who find it difficult to exercise independently due to restricted mobility and a reduced functional level. The program was evaluated by the CPS team using the Q-SAF. Initial Q-SAF scores obtained are as follows:

Self-management Program Content and Delivery:	57%
Program Reach, Consistency and Sustainability:	80%
Workforce:	70%
Organizational Support:	95%

CPS expected to score a lower value on content as the program was not designed as a self management program – it is a rehabilitation program in which CPS is trying to incorporate self management principles.

Using the Q-SAF as a guide, CPS reviewed the format and content of the class plan to ensure goal setting and problem solving became standard practice and fully integrated into all classes. Education topic outlines used as a guide by class physiotherapists were revised and modified to ensure relevant topics were included and delivered in the form of group led brainstorms and interaction, rather than a "lecture format" delivered by the physiotherapist.

Resources were also reviewed and are in the process of being updated, and a staff self assessment checklist is being developed to enable staff and line managers to identify areas for professional development either for individual staff members or the CPS workforce as a whole.

The Q-SAF was then used to re-evaluate the program to assess the effect of the changes being implemented on the program profile in the key areas of workforce and content.

Our follow-up Q-SAF profile scored as follows:

Self-management Program content and delivery:	84%
Program Reach, Consistency and Sustainability:	81%
Workforce:	90%
Organizational Support:	91%

We viewed the change in profile as confirmation that the changes we were introducing into the Functional Rehabilitation program were taking the program in a positive direction with regards to empowering the clients to better managing their own condition.





## References

- Access Economics Pty Limited. (2001). The prevalence, cost and disease burden of arthritis in Australia. Canberra, ACT.
- Access Economics Pty Limited. (2005). Acting positively: Strategic implications of the economic costs of multiple sclerosis in Australia: Multiple Sclerosis Australia.
- Australian Bureau of Statistics. (2006). *National health survey: Summary of results 2004-2005* (No. 4364.0). Canberra, Australian Capital Territory: Author.
- Barlow, J. H., Turner, A. P., & Wright, C. C. (2000). A randomized controlled study of the Arthritis Self-Management Programme in the UK. *Health Educ Res*, 15(6), 665-680.
- Barr, V. J., Robinson, S., Marin-Link, B., Underhill, L., Dotts, A., Ravensdale, D., et al. (2003). The expanded Chronic Care Model: an integration of concepts and strategies from population health promotion and the Chronic Care Model. *Hosp* Q, 7(1), 73-82.
- Bodenheimer, T., Lorig, K., Holman, H., & Grumbach, K. (2002). Patient selfmanagement of chronic disease in primary care. *The Journal of American Medical Association*, 288(19), 2469-2475.
- Bonomi, A. E., Wagner, E. H., Glasgow, R. E., & Von Korff, M. (2002). Assessment of chronic illness care (ACIC): a practical tool to measure quality improvement. *Health Serv Res*, *37*(3), 791-820.
- Calsyn, R. J. (2000). A checklist for critiquing treatment fidelity studies. *Mental Health Services Research*, 2(2), 107-113.
- Corbin, J. M., & Strauss, A. (1988). Unending work and care: Managing chronic illness at home. San Francisco: Jossey-Bass.
- Department of Health. (2005). Promoting optimal self care consultation techniques that improve quality of life for patients and clinicians. DH, London.
- Department of Health (2006). *Australian better health initiative*. Canberra, from <u>http://www.healthnetworks.health.wa.gov.au/abhi/home/</u>
- Foster, C., Brown, J., Killen, M., & Brearley, S. (2007). The NCRI cancer experiences collaborative: Defining self management. *European Journal of Oncology Nursing*, *11*(4), 295-297.
- Glasgow, R. E., Klesges, L. M., Dzewaltowski, D. A., Estabrooks, P. A., & Vogt, T. M. (2006). Evaluating the impact of health promotion programs: Using the RE-AIM framework to form summary measures for decision making involving complex issues. *Health Educ. Res.*, 21(5), 688-694.

- Glasgow, R. E., McKay, H. G., Piette, J. D., & Reynolds, K. D. (2001). The RE-AIM framework for evaluating interventions: what can it tell us about approaches to chronic illness management? *Patient Education and Counseling*, 44(2), 119-127.
- Horner, S., Rew, L., & Torres, R. (2006). Enhancing intervention fidelity: a means of strengthening study impact. *J Spec Pediatr Nurs*, 11(2), 80-89.
- Koch, T., Jenkin, P., & Kralik, D. (2004). Chronic illness self-management: locating the 'self'. *Journal of Advanced Nursing*, *48*(5), 484-492.
- Lorig, K. R. (2003). Self-Management Education: More than a Nice Extra. *Medical Care*, *41*(6), 699-701.
- Lorig, K. R., Sobel, D. S., Ritter, P. L., Laurent, D., & Hobbs, M. (2001). Effect of a selfmanagement program on patients with chronic disease. *Effect of Clinical Practice*, 4(6), 256-262.
- Lorig, K. R., Sobel, D. S., Stewart, A. L., Brown, B. W. J., Bandura, A., Ritter, P., et al. (1999). Evidence suggesting that a chronic disease self-management program can improve health status while reducing hospitalization: a randomized trial. *Medical Care.*, 37(1), 5-14.
- Mowbray, C., Holter, M., Teague, G., & Bybee, D. (2003). Fidelity criteria: Development, measurement, and validation. *American Journal of Evaluation*, 40(2), 315-340.
- National Health Priority Action Council. (2006). National chronic disease strategy. Canberra.
- NSW Department of Health. (2004). Health and Equity in New South Wales. N.S.W. *Public Health Bull, 15*(S-1).
- Pincus, T., Esther, R., DeWalt, D. A., & Callahan, L. F. (1998). Social conditions and self-management are more powerful determinants of health than access to care. *Ann Intern Med*, 129(5), 406-411.
- The Royal Australian Colledge of General Practitioners. (2004). Chronic condition selfmanagement guidelines: Summary for nurses and allied health professionals.
- Wagner, E. E. H., Austin, B., & Von Korff, M. (1996). Orgranizing care for patients with chronic illness. *Milbank Q*, 74(4), 511-544.
- Wagner, E. H. (1998). Chronic disease management: what will it take to improve care for chronic illness? *Effective clinical practice*, 1(1), 2-4.
- Wagner, E. H. (2001). Improving chronic illness care: Translating evidence into action. *Health affairs*, 20(6), 64-69.
- World Health Organization. (2005). *Preventing chronic disease: a vital investment: WHO global report* Geneva, Switzerland: World Health Organization.



### **1. Self-management Program Content and Delivery**

The program content is consistent with the management tasks related to living with a chronic condition and respects the expertise of the individual who lives with the chronic condition and/or disability. It is delivered using principles of self-management.

For the following **program** components indicate to what extent the program uses the following educational mechanisms to achieve improved selfmanagement support in individuals

0 = not at all

1= limited

2= to some extent 3= fully integrated into the program

	Components	Information/ facts provided	Opportunity for problem solving and goal setting	Ability to tailor information/ strategies to own situation	Structured opportunity for practice during or between sessions	Reinforcement/ feedback provided	Learning from peers / modelling
Does the program assist people to	Improving communication1.1with health professionals?						
access self- management support through:	Improving navigation of the health care system?1.2						
	Reducing modifiable risk1.3factors for the condition?						
Does the program assist people to	Preventing secondary 1.4 consequences of their disease?						
through:	Training client on how to 1.5 manage specific disease characteristics and symptoms (e.g. use of aids and devices, monitoring signs and symptoms)?						

# Self-management Program Content and Delivery - continued

For the following **program components** indicate to what extent the program uses the following educational mechanisms to achieve improved selfmanagement support in individuals

0 = not at all

1= limited

2= to some extent

3= fully integrated into the program

Components		Information/ facts Provided	Opportunity for problem solving and goal setting	Ability to tailor information /strategies to own situation	Structured opportunity for practice during or between sessions	Reinforcement/ feedback provided	Learning from peers/ modelling
Does the program assists people to proactively manage the emotional consequences of	Manage personal/ 1.6 intrinsic consequences of health such as fear, guilt, stress, anxiety, helplessness etc?						
condition through support/training to:	Manage relationships 1.7 with family, friends, work colleagues?						
Does the program	Routines/schedules/1.8priorities at home?						
assist people to decide how to manage the impact of their health on:	Routines/schedules/1.9priorities at work?						
	Routines/schedules/1.10priorities outside of the home?1.00						

## 2. Program Reach, Consistency and Sustainability

A quality program is based on evidence, maintains fidelity and is judged by others to be credible and of value to people with chronic conditions.

0 = not at	2 = to some extent		
1= limite	d 3= fully integrated into the program		
	Components		Score
	The population for whom the program is intended has been defined and their needs documented.	2.1	
	The program reaches the intended population.	2.2	
Reach	Advertising and marketing of the program to participants occurs and is reviewed on a regular basis.	2.3	
Reach	Advertising and marketing of the program to referrers occurs and is reviewed on a regular basis.	2.4	
	The program is accessible (time, venue, face to face, phone, internet etc) for intended population.	2.5	
	The program is appropriate for intended population.	2.6	
	The educational protocol is documented in detail AND followed.	2.7	
Consistency of	Consistency of delivery across facilitators is ensured through use of formal structures (checklists, peer review etc).	2.8	
delivery	The program content is understandable by the intended audience.	2.9	
	Within the confines of the protocol, there is the ability to meet the needs of individual participants.	2.10	
	Content has been based on existing self-management programs and condition-related research.	2.11	
	The underpinning theoretical constructs are described and are based on published literature.	2.12	
Evidence-base	The mechanism for behaviour change is articulated.	2.13	
	There is published evidence that the program can significantly change key participant outcomes.	2.14	
	There is evidence for cost effectiveness.	2.15	
Embedded in	Information about the program is disseminated to potential referral sources.	2.16	
and linked to other health services	Communication occurs between the program providers and other health professionals involved in the participant's care.	2.17	
	A mechanism exists which ensures participants are referred to other health professionals/programs/peer support groups as required.	2.18	
	Feedback from the participants about the program quality and impact is periodically sought and documented.	2.19	
Evaluation	Participant outcomes are measured in a structured and systematic way.	2.20	
Evaluation	The program is routinely reviewed taking account of evaluation findings.	2.21	
	Unintended adverse events/consequences are recorded, reviewed and acted upon.	2.22	

For the following <u>implementation</u> components indicate to what extent the program conform to the following processes: 0 = not at all 2 = to some extent

## 3. Workforce

Self-management support competencies are essential for all staff (professional and peer) who deliver programs.

For the following **workforce components** indicate to what extent the program conform to the following processes:

- 0 = not at all
- 1= limited

2= to some extent 3= fully integrated into the program

	Components		Score			
Staff	ff Professional staff have qualifications/ accreditation/ licence relevant to the program.					
qualification/						
accreditation /	And/ or (if relevant)					
licence	Peer leaders are people with a chronic condition(s) relevant to the program and have accreditation/ licence.					
Training	The staff (professional and lay) have completed formalised self-management training specific to the program being	3.2				
&	delivered either on hiring or prior to delivery of the program.					
support	Ongoing professional development in self-management competencies is regularly provided (through peer support,	3.3				
11	mentoring, formal conference attendance).	_				
	Recognising and working within individual participants' "readiness for change", whilst trying to influence this	3.4				
	positively.					
	Supporting participants to search for and find answers for themselves.	3.5				
	Seeking to understand and work within client values, culture and life constraints.	3.6				
Staff have	Supporting all participants with chronic disease self- management through attention to disease, emotional and role	3.7				
appropriate skills and competencies in:	management.					
	Supporting and encouraging participants to develop action plans.	3.8				
	Supporting and encouraging participant problem solving and decision-making.	3.9				
	Supporting and assisting participants who are stressed, anxious or depressed.	3.10				
	Supporting participants to identify and individually select self-management strategies appropriate to their life	3.11				
	context, choices and preferences.					
	Supporting participants to adopt healthy lifestyle choices (nutrition, alcohol intake and activity participation levels)	3.12				
	regardless of their diagnosis.					

# 4. Organisational Support

A quality self-management program is embedded in systems and organisations.

Define/ describe organisation level (unit level, department level, whole of ogranisation level etc.):

For the following **organization** components indicate to what extent the program is consistent with the following statements :

0 = not at all

2 =to some extent

1= limited

	Components		Score
Organisational priority	Self-management principles are reflected in the organisation's values, mission and policies.	4.1	
	The self-management program is an integrated part of service delivery (i.e. is included in models of care, clinical pathways, guidelines etc).	4.2	
	The self-management program has a designated coordinator.	4.3	
	Adequate, sustainable funding is available to ensure ongoing delivery.	4.4	
Integrated into	Existing practices and resources make it easy to deliver the program.	4.5	
service/ practice	The program roles and responsibilities are documented and reflected in job descriptions.	4.6	
Partnership	The organisation actively contacts and uses additional services and resources to support participants to self-manage.	4.7	

3= fully integrated into the program

### Scoring

For each domain, add the scores in all boxes. Enter the total score below and calculate a percentage score per domain. Plot the percentage score on the radar diagram.

### 1. Self-management Program Content and Delivery

Total score =

% Score = Total Score  $\times$  100 / 180 =

### 2. Program Reach, Consistency and Sustainability

Total Score =

% Score = Total Score  $\times 100 / 66 =$ 

### 3. Workforce

Total Score =

% Score = Total Score  $\times 100 / 36 =$ 

### 4. Organisational Support

Total Score =

% Score = Total Score  $\times 100 / 21 =$ 

