

Assessing readiness to work in primary health care: the content validity of a self-check tool for physiotherapists and other health professionals

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ABSTRACT

INTRODUCTION: The New Zealand Primary Health Care Strategy has emphasised the importance of well-coordinated service teams in managing complex chronic conditions. There is international evidence that physiotherapists can contribute effectively to the prevention and management of these conditions. However, there are few examples of physiotherapists in New Zealand (NZ) engaging in primary health care (PHC). It has been recognised that professional development is necessary to optimise physiotherapists' participation in PHC.

AIM: The aim of this study was to both design a self-check tool that physiotherapists could use as an initial step in preparing to work in PHC and to assess the content validity of the tool.

METHODS: A literature review informed the development of the self-check tool. The tool was reviewed by members of the Physiotherapy New Zealand PHC working party to establish content validity.

RESULTS: The tool was found to have excellent content validity with an overall score of 0.937, exceeding the acceptable index of 0.8. Item validity was excellent or acceptable for all except two items, which were subsequently modified in the final tool.

DISCUSSION: This investigation provides initial support for the tool's potential use by physiotherapists as a means of determining their readiness to work in PHC. It could have application beyond individual professional development to the wider context of team and organisational development. Additionally, with minor modifications the tool could have broader application to other professional groups.

KEYWORDS: Continuing education; New Zealand; physiotherapy; primary health care; validity and reliability

Introduction

The New Zealand Primary Health Care Strategy¹ has emphasised the importance of multidisciplinary service teams in improving efficiencies in health care delivery at a time when there are significant increases in health need alongside a static budget. The management of long-term conditions is one area of rapidly rising costs and increasing inequities, where well-coordinated service teams can contribute to improved care.² Care Plus is an example of an initiative in the primary care sector targeting improved service coordination for people with complex and chronic conditions.² This initiative has strengthened the role of nurses and community health workers, alongside

general practitioners, in community-based teams. Psychologists, podiatrists, dietitians and social workers have also been recognised as having complementary roles in these teams.² Although the Primary Health Care Strategy document¹ includes physiotherapy in the health care team, there are very few examples of physiotherapists in New Zealand (NZ) engaging in primary health care (PHC).

There is international evidence of physiotherapists' contribution to the prevention and management of long-term conditions. For instance, the value of physiotherapy has been demonstrated in falls prevention,³ the management of chronic respiratory conditions,⁴ and rehabilitation of

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joint disorders and neurological conditions.^{5,6,7} Physiotherapists' exercise prescription expertise has been shown to contribute to improvement in postnatal wellbeing,⁸ management of diabetes and associated risk factors,^{9,10,11} enhancement of recovery in mental health,^{9,10} and following breast cancer surgery.¹²

In NZ, 56% of physiotherapists work in primary care where their work mainly involves the treatment of musculoskeletal disorders.¹³ Until recently, physiotherapy education has had a similar emphasis. However, in the last decade the profession has become increasingly aware of its responsibility to contribute to PHC.^{14,15} Professional development opportunities are being introduced so that current practitioners are more adequately prepared for this work¹⁶ and university programmes have recently made significant curricular changes to prepare future physiotherapists.¹⁷

The purpose of this research was to develop a tool that physiotherapists could use as an initial step in preparing to work in PHC. The aim of this study was to design a self-check tool for physiotherapists to assess their readiness for working in PHC and to establish the content validity of the tool.

Methods

The design of the self-check tool was underpinned by the principles outlined in the NZ Primary Health Care Strategy, which is based on the Alma-Ata Declaration.^{1,18,19} A literature review informed the development of the questions. Literature included a discussion paper to support implementation of the PHC Strategy²⁰ and a critical analysis of its implementation,¹⁹ guides to developing health promotion programmes in PHC settings,^{21,22} a paper on integrated care in a DHB,²³ guidelines for health promotion planning and action in PHOs,²⁴ a national survey of health equity in the NZ health care system² and a paper on factors influencing wellbeing among Maori and non-Maori in NZ.²⁵ The draft tool developed from this literature comprised questions relating to knowledge and networks associated with working in PHC.^{1,2,18-25} There were also questions relating to importance and confidence that aimed to assess readiness to work in PHC.²⁶

WHAT GAP THIS FILLS

What we already know: International evidence supports a role for physiotherapists in primary health care teams in the management of complex chronic conditions. There are currently few examples of physiotherapists engaging in primary health care in New Zealand and professional development is considered to be a necessary prerequisite to optimise their engagement in this work.

What this study adds: A self-check tool has been developed for NZ physiotherapists to assess their readiness to work in primary health care. Content validity of the tool was found to be excellent. The tool could have potential for broader use in teams, organisations and by other health professionals.

Six reviewers assessed the content validity of the self-check tool to ensure that all content areas of importance were sufficiently represented and that all items were relevant to the purpose of the tool. Reviewers were elected members of the Physiotherapy New Zealand PHC Working Party. All had at least 10 years' experience and were recognised for their expertise in primary care.

The reviewers were requested to evaluate each of the 32 items on the participant's score sheet as '1 = not relevant, 2 = somewhat relevant, 3 = quite relevant or 4 = highly relevant'. Item content validity (I-CVI) was computed as the number of reviewers giving a rating of either three or four, divided by the total number of reviewers.²⁷ For each item a content validity score of 0.8 or above was an acceptable value.²⁷ Overall content validity (CVI) for the tool was calculated as the mean percentage of items with a score of three or four, divided by the total number of reviewers. An acceptable CVI is defined as 0.8 or above, while an average of 0.90 or above indicates excellent content validity.²⁷ Reviewers were also invited to provide feedback under two headings; 'any items missing', 'any comments'.

Results

All reviewers completed the content validity score sheet. Content validity scores for individual items (I-CVI) of the self-check tool are listed in Table 1. Two items had unacceptable content validity (item 13, I-CVI 0.50; and item 14, I-CVI 0.66). The self-check tool CVI as determined by the six reviewers was 0.937. No reviewers reported any items missing and there were no recommendations for major changes.

Discussion

The self-check tool developed and investigated in this study was found to have excellent content validity with an average CVI of 0.937, exceeding the acceptable index of 0.8.²⁷ Item validity was excellent or acceptable for all draft items except 13 and 14 (see Appendix A in web version of this paper). Poor scoring was attributed to the fact that these items regarding physiotherapy networks overlapped and the recommendation was that they be amalgamated. Minor wording changes were also recommended to draft items 18 and 32. All recommendations have been ad-

dressed in the final tool (see Appendix B in web version of this paper).

The content validity results need to be viewed cautiously in the light of the small number of reviewers in the expert panel. For example, another study evaluating content validity employed a larger panel of nine experts.²⁸ However, the findings do provide initial support for the tool's potential use by physiotherapists as a means of determining their readiness to work in PHC.

The justification for including questions in the tool related to importance and confidence was

Table 1. Self-check tool item content validity scores* by reviewers.

Sections	Items	Reviewer A	Reviewer B	Reviewer C	Reviewer D	Reviewer E	Reviewer F	I-CVI
1	Item 1	3	4	4	4	4	4	1.0
2	Item 2	4	4	4	4	4	4	1.0
	Item 3	4	3	4	4	4	4	1.0
	Item 4	4	4	4	4	3	4	1.0
	Item 5	4	4	4	4	4	4	1.0
	Item 6	3	4	4	4	3	4	1.0
	Item 7	3	4	4	4	4	4	1.0
3	Item 8	4	3	3	4	3	4	1.0
	Item 9	3	4	4	4	3	4	1.0
	Item 10	3	3	3	4	4	3	1.0
	Item 11	3	3	3	4	3	4	1.0
	Item 12	3	3	4	4	2	4	0.83
4	Item 13	2	2	4	4	2	4	0.50
	Item 14	2	3	4	4	2	3	0.66
	Item 15	3	4	4	4	4	4	1.0
	Item 16	4	4	4	4	4	4	1.0
	Item 17	4	4	4	4	4	4	1.0
	Item 18	4	4	4	4	4	4	1.0
	Item 19	4	3	3	4	4	4	1.0
5	Item 20	4	4	4	4	4	4	1.0
6	Item 21	3	4	4	4	4	4	1.0
	Item 22	3	4	4	4	3	4	1.0
	Item 23	3	3	4	4	3	4	1.0
	Item 24	3	4	4	4	4	4	1.0
	Item 25	3	4	3	3	4	4	1.0
	Item 26	4	4	4	4	3	4	1.0
	Item 27	4	4	4	4	3	4	1.0
	Item 28	3	3	4	3	4	3	1.0
7	Item 29	3	4	3	4	3	4	1.0
8	Item 30	3	4	3	4	4	4	1.0
9	Item 31	3	4	†NR	4	3	4	0.83
10	Item 32	3	4	†NR	4	4	4	0.83

* Scoring: 1 = Not relevant; 2 = Somewhat relevant; 3 = Quite relevant; 4 = Highly relevant

† NR = No response

the established use of this approach for assessing readiness in the stages of change model of behaviour change.²⁶ This model has been used extensively to assess readiness to change long-term health behaviours, such as quitting smoking.²⁹ Its relevance to assessing health professionals' readiness to change long-term professional behaviours merits further investigation. The questions related to knowledge and networks were informed by the same model that posits awareness-raising is part of making behaviour change.²⁶

The self-check tool appears to be well aligned with the Physiotherapy New Zealand PHC draft document¹⁷ which sets out a competency pathway for physiotherapists to engage in PHC. While it has application to individual professional development of physiotherapists, it may also be useful in the wider context of team and organisational development. For example, it could form the basis for discussion between line managers and staff concerning gaps and opportunities for contributing to PHC and strategies for changing practice. Additionally, with minor modifications it has the potential to be used by other health professional groups.

As this is the first investigation of this self-check tool, further research into its validity is required to support its use by the physiotherapy profession and other health professions.

References

- Ministry of Health. The Primary Health Care Strategy. Wellington: Ministry of Health; 2001.
- Sheridan NF, Kenealy TW, Connolly MJ, Mahony F, Barber PA, Boyd MA, et al. Health equity in the New Zealand health care system: a national survey. *Int J Equity Health*. 2011;10(45):1–14.
- Michael YL, Whitlock EP, Lin JS, Fu R, O'Connor EA, Gold R. Primary care-relevant interventions to prevent falling in older adults: a systematic evidence review for the U.S. preventive services task force. *Ann Intern Med*. 2010;153:815–25.
- The Australian Lung Foundation & the Thoracic Society of Australia & New Zealand. The COPD-X Plan: Australian and New Zealand guidelines for the management of chronic obstructive pulmonary disease: Australia; 2006.
- Hay EM, Foster NE, Thomas E, Peat G, Phelan M, Yates HE, et al. Effectiveness of community physiotherapy and enhanced pharmacy review for knee pain in people aged over 55 presenting to primary care: pragmatic randomised trial. *BMJ*. 2006;333(7576):995.
- Ferrarello F, Baccini M, Rinaldi LA, Cavallini MC, Mossello E, Masetti G, et al. Efficacy of physiotherapy interventions late after stroke: a meta-analysis. *J Neurol Neurosurg Psychiatry*. 2011;82:136–43.
- Mulligan H, Fjellman-Wiklund A, Hale L, Thomas D, Hager-Ross C. Promoting physical activity for people with neurological disability: perspectives and experiences of physiotherapists. *Physiother Theory Pract*. 2011;27(6):399–410.
- Norman E, Sherburn M, Osborne RH, Galea MP. An exercise and education program improves well-being of new mothers: a randomized controlled trial. *Phys Ther*. 2010;90(3):348–55.
- Dean E. Physical therapy in the 21st century (Part I): Toward practice informed by epidemiology and the crisis of lifestyle conditions. *Physiother Theory Pract*. 2009;25(5–6):330–53.
- Dean E. Physical therapy in the 21st century (Part II): evidence-based practice within the context of evidence-informed practice. *Physiother Theory Pract*. 2009;25(5–6):354–68.
- Schlessman AM, Martin K, Ritzline PD, Petrosino CL. The role of physical therapists in pediatric health promotion and obesity prevention: comparison of attitudes. *Pediatric Phys Ther*. 2011;23(1):79–86.
- Collins L, Nash R, Round T, Newman B. Perceptions of upper-body problems during recovery from breast cancer treatment. *Support Care Cancer*. 2004;12:106–113.
- Ministry of Health. Physiotherapists: Health Workforce Annual Survey. Wellington: Ministry of Health; 2011.
- Stewart JJ, Haswell K. Primary health care in Aotearoa, New Zealand: challenges and opportunities for physiotherapists. *NZJP*. 2007;35(2):48–53.
- New Zealand Society of Physiotherapists. Engaging in primary health care: New Zealand Society of Physiotherapists Primary Health Care Working Party Report. Wellington; 2008.
- Physiotherapy New Zealand Primary Healthcare Working Group. Draft Physiotherapy Primary Healthcare Working Group Report: developing a competency pathway to primary healthcare. Wellington; 2011.
- Auckland University of Technology. The Auckland University of Technology Calendar 2012. Auckland; 2012.
- World Health Organization and UNICEF. Primary Health Care: Report of the International Conference on Primary Health Care. Alma-Ata USSR. Geneva; 1978.
- Ministry of Health. Critical analysis of the implementation of the Primary Health Care Strategy implementation and framing of issues for the next phase. Wellington: Ministry of Health; 2009.
- Winnard D, Crampton P, Cumming J, Sheridan N, Neuwelt P, Arroll B, et al. 'Population Health'—meaning in Aotearoa New Zealand? A discussion paper to support implementation of the Primary Health Care Strategy. Wellington; 2008.
- Winnard, D. Health promotion in PHOs: towards a mutual understanding of this new resource in the primary care team. *N Z Fam Phys*. 2007;34(1):45–5.
- Ministry of Health. A guide to developing health promotion programmes in primary health care settings. Wellington: Ministry of Health; 2003.
- Rea R, Kenealy T, Wellingham J, Moffitt A, Sinclair G, McAuley S, et al. Chronic Care Management evolves towards Integrated Care in Counties Manukau, New Zealand. *N Z Med J*. 2007;120(1252):1–11.
- Auckland Regional Public Health Service. Guidelines for health promotion planning and action in PHOs: Auckland; 2008.
- Dulin PL, Stephens C, Alpess F, Hill RD, Stevenson B. The impact of socio-contextual, physical and lifestyle variables on measures of physical and psychological wellbeing among Maori and non-Maori: the New Zealand Health, Work and Retirement Study. *Ageing Soc*. 2011;31:1406–1424.
- Prochaska J, DiClemente C. Stages and processes of self-change of smoking: towards an integrated model of change. *J Consult Clin Psychol*. 1983;52:390–5.
- Polit DF, Beck CT, editors. Nursing research: generating and assessing evidence for nursing practice. 8th edition. Philadelphia: Lippincott Williams & Wilkins; 2008.
- Leach MJ, Gillham D. Evaluation of the evidence-based practice attitude and utilization survey for complementary and alternative medicine practitioners. *J Eval Clin Pract*. 2008;14:792–8.
- Cahill K, Lancaster T, Green N. Stage-based interventions for smoking cessation. *Cochrane Database Syst Rev*. 2010;11:CD004492.

COMPETING INTERESTS

None declared.

APPENDIX A

PARTICIPANT'S SCORE SHEET FOR STEWART-HASWELL SELF-CHECK TOOL FOR READINESS TO WORK IN PRIMARY HEALTH CARE: PHYSIOTHERAPY

The tool is designed so that physiotherapists can assess their readiness to work in PHC. Score items one to 32 below. Indicate your choice for each item by circling the number that most closely captures your opinion of its relevance to the purpose of the self-check tool.

- 1 not relevant**
- 2 somewhat relevant**
- 3 quite relevant**
- 4 highly relevant**

Items within the self-check tool for physiotherapists to answer	Rating of relevance
Item 1 How important is it for me to work with the local PHO?	1 2 3 4
Item 2 Within the locality I work, how well informed am I about the demographic profile of the population?	1 2 3 4
Item 3 Within the locality I work, how well informed am I about the main health needs of the non-Maori population?	1 2 3 4
Item 4 Within the locality I work, how well informed am I about the main health needs of the Maori population?	1 2 3 4
Item 5 Within the locality I work, how well informed am I about specific health needs with regard to the ethnic breakdown of the community?	1 2 3 4
Item 6 Within the locality I work, how well informed am I about the range of health and social services?	1 2 3 4
Item 7 Within the locality I work, how well informed am I about current health initiatives?	1 2 3 4
Item 8 Within the District Health Board (DHB) and local PHO where I work, how well informed am I about the current DHB Strategic Plan and goals?	1 2 3 4
Item 9 Within the District Health Board (DHB) and local PHO where I work, how well informed am I about the current PHO Strategic Plan, goals and budget allocation?	1 2 3 4
Item 10 Within the District Health Board (DHB) and local PHO where I work, how well informed am I about the current PHO Board and employees?	1 2 3 4
Item 11 Within the District Health Board (DHB) and local PHO where I work, how well informed am I about current PHO contracts?	1 2 3 4

Item 12 Within the District Health Board (DHB) and local PHO where I work, how well informed am I about PHO consultation processes with health providers and the enrolled population?	1	2	3	4
Item 13 Within the locality I work, who does my professional and community network include? The people I work with in my physiotherapy workplace.	1	2	3	4
Item 14 Within the locality I work, who does my professional and community network include? A number of physiotherapists in different work locations	1	2	3	4
Item 15 Within the locality I work, who does my professional and community network include? Local General Practitioners	1	2	3	4
Item 16 Within the locality I work, who does my professional and community network include? A range of health professionals from different disciplines	1	2	3	4
Item 17 Within the locality I work, who does my professional and community network include? Health providers employed by the local PHO (other than GPs)	1	2	3	4
Item 18 Within the locality I work, who does my professional and community network include? A range of social service providers	1	2	3	4
Item 19 Within the locality I work, who does my professional and community network include? A range of people and groups who are representative of the community	1	2	3	4
Item 20 Over the last month, in my day-to-day practice how frequently have I worked in an integrated multidisciplinary or interdisciplinary way?	1	2	3	4
Item 21 How do I rank my knowledge about chronic conditions prevention and management?	1	2	3	4
Item 22 How do I rank my knowledge about health promotion and designing health promotion initiatives?	1	2	3	4
Item 23 How do I rank my knowledge about behaviour change theories and education strategies?	1	2	3	4
Item 24 How do I rank my knowledge about exercise science and its application to a range of health conditions?	1	2	3	4
Item 25 How do I rank my knowledge about the basic science of nutrition?	1	2	3	4

Item 26 How do I rank my knowledge about Maori Health?	1 2 3 4
Item 27 How do I rank my knowledge about the health of diverse ethnic groups?	1 2 3 4
Item 28 How do I rank my knowledge about Epidemiology?	1 2 3 4
Item 29 How confident am I about incorporating health promotion principles in my day-to-day work?	1 2 3 4
Item 30 How confident am I about working in a health promotion framework as part of a team delivering a health initiative?	1 2 3 4
Item 31 How confident am I about writing a high quality Request for Proposal (RFP) in collaboration with others, to secure funding for a health initiative?	1 2 3 4
Item 32 On reflection, how well prepared am I to work collaboratively on health initiatives with the local PHO?	1 2 3 4

Any items missing

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Any Comments

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APPENDIX B

Stewart-Haswell Self-check Tool for readiness to work in Primary Health Care: Physiotherapy ©

For each question select the score that applies to you and write your score in the box provided.

1	How important is it for me to work with the local Primary Health Organisation (PHO)? (1 = not at all important; 2 = a little important; 3 = quite important; 4 = very important)	<input type="text"/>
2	Within the locality I work, how well informed am I about the following? (1 = not at all informed; 2 = a little informed; 3 = quite informed; 4 = very informed)	
i	The demographic profile of the population	<input type="text"/>
ii	Main health needs of the non-Maori population	<input type="text"/>
iii	Main health needs of the Maori population	<input type="text"/>
iv	Specific health needs with regard to the ethnic breakdown of the community	<input type="text"/>
v	The range of health and social services	<input type="text"/>
vi	Current health initiatives	<input type="text"/>
3	Within the District Health Board (DHB) and local PHO where I work, how well informed am I about the following? (1 = not at all informed; 2 = a little informed; 3 = quite informed; 4 = very informed)	
i	Current DHB Strategic Plan and goals	<input type="text"/>
ii	Current PHO Strategic Plan, goals and budget allocation	<input type="text"/>
iii	Current PHO Board and employees	<input type="text"/>
iv	Current PHO contracts	<input type="text"/>
v	PHO consultation processes with health providers and the enrolled population	<input type="text"/>
Total score page 1:		<input type="text"/>

4 Within the locality I work, who does my professional and community network include?

(Tick the statements that apply to you, add-up and write the total number in the box provided.

0 = no statements ticked)

Tick as many as applicable

- i) Physiotherapists ()
- ii) Local General Practitioners ()
- iii) A range of health professionals from different disciplines ()
- iv) Health providers employed by the local PHO (other than GPs) ()
- v) A range of social service providers (Government and non-government agencies) ()
- vi) A range of community representatives (eg recognised community leaders) ()

Total items

5 Over the last month, in my day-to-day practice how frequently have I worked in an integrated multidisciplinary or interdisciplinary way?

(1 = not at all; 2 = less than weekly; 3 = weekly; 4 = several times weekly; 5 = daily;

6 = more than once daily).....

6 How do I rank my knowledge about the following?

Enter score for each item

(1 = not at all knowledgeable; 2 = a little knowledge; 3 = quite knowledgeable;
4 = very knowledgeable)

- i Chronic conditions prevention and management
- ii Health promotion and designing health promotion initiatives
- iii Behaviour change theories and education strategies
- iv Exercise science and its application to a range of health conditions
- v Basic science of nutrition
- vi Maori Health
- vii Health of diverse ethnic groups
- viii Epidemiology.....

Total score page 2:

7	How confident am I about incorporating health promotion principles in my day-to-day work? (1 = not at all confident; 2 = a little confident; 3 = quite confident; 4 = very confident)	<input type="text"/>
8	How confident am I about working in a health promotion framework as part of a team delivering a health initiative? (1 = not at all confident; 2 = a little confident; 3 = quite confident; 4 = very confident)	<input type="text"/>
9	How confident am I about writing a high quality Request for Proposal (RFP) in collaboration with others, to secure funding for a health initiative? (1 = not at all confident; 2 = a little confident; 3 = quite confident; 4 = very confident)	<input type="text"/>
10	On reflection, how well prepared am I to work collaboratively on health initiatives with the local PHO and/or other Primary Health Care providers? (0 = not at all prepared; 2 = a little prepared; 3 = quite prepared; 4 = very prepared).....	<input type="text"/>
Total score page 3:		<input type="text"/>

Page 1	<input type="text"/>	+ page 2	<input type="text"/>	+ page 3	<input type="text"/>	= Total score	<input type="text"/>
Maximum score = 108							