Research paper

Exploring consumer values of comparative performance information for hospital choice

Nicole A B M Ketelaar MSc PhD Candidate

Marjan J Faber PhD Senior Researcher

Gert P Westert PhD Professor and Director

Scientific Institute for Quality of Health Care, Radboud University Medical Centre, Nijmegen, the Netherlands.

Glyn Elwyn BA MB BCh MSc FRCGP PhD

Professor, The Dartmouth Center for Health Care Delivery Science, and The Dartmouth Institute for Health Policy and Clinical Practice, Hanover, New Hampshire, USA

Jozé C Braspenning PhD

Associate Professor, Scientific Institute for Quality of Health Care, Radboud University Medical Center, Nijmegen, the Netherlands

ABSTRACT

Background In many countries, market orientation in healthcare has resulted in the publication of comparative performance information (CPI). Most of the research in this field is oriented towards the content and the presentation format of CPI while little is known about how consumers value CPI and the use of this information.

Aim The aim of this study was to clarify the perceived value that CPI brings for consumers of healthcare.

Methods Qualitative research using six focus group interviews. Twenty-seven healthcare consumers were recruited using a mailing list and by personal invitation. Data from focus group interviews were transcribed and thematic analysis undertaken.

Results Most participants were unaware of CPI, and valued alternative sources of information more than CPI. Through discussion with other con-

sumers and by means of examples of CPI, respondents were able to express the values and perceived effects of CPI. Numerous underlying values hindered consumers' use of CPI, and therefore clarification of consumer values gave insights into the current nonusage of CPI.

Conclusions CPI is marginally valued, partly because of conflicting values expressed by consumers and, as such, it does not yet provide a useful information source on hospital choice beyond consumers' current selection routines in healthcare. Future research should be more focused on the values of consumers and their impact on the use of CPI.

Keywords: comparative performance information, consumer values, choice behaviour, qualitative research

How this fits in with quality in primary care?

What do we know?

Comparative performance information (CPI) comparing performance across providers has increased in recent years. Despite the efforts and resources that go into the collection, production and dissemination of CPI, it is only used by a small group of consumers. Most of the research is oriented towards the content and the presentation format of CPI, while little is known about how consumers value CPI and the use of this information.

What does this paper add?

The value of CPI varied greatly among healthcare consumers. As such, it does not challenge the current selection routines choosing providers in healthcare. Other, additional strategies are necessary to translate CPI into the values that matters for consumers, preferably integrated into referral processes of primary care providers.

Introduction

Provider choice for healthcare consumers has emerged as a key policy focus in modern Western healthcare systems. The architects of the policy outlined several reasons to promote choice among healthcare consumers. First, to encourage competition between providers which was expected to improve the efficiency and quality of healthcare;^{1,2} and second, to increase patient empowerment and improve the position of consumers in healthcare.^{3,4} It is based on the expectation that patients will choose the best healthcare provider once they are informed.

Systematically collected, publically available information about the performance of healthcare providers, called comparative performance information (CPI), can be used as a tool to inform healthcare consumers to enable them to make informed provider choices. The information consists of, for example, patient volumes, treatment methods, waiting lists and patient experiences, and can be found in leaflets, magazines, books and on the internet.

Despite the efforts and resources that go into the collection, production and dissemination of information for the public,⁵ there is little evidence that CPI affects consumer choices. Many people do not understand the information, or do not view the information as useful.⁶ British and American studies have shown that as few as 5–7% of consumers use CPI to choose a hospital^{7,8} and only 12% use CPI to select a primary care physician,9 although awareness of the right to choose a provider has increased. The overall conclusion is that consumer usage of CPI to make an informed choice is still limited. Instead, consumers rely on information from family and friends or base their choice of hospital on recommendations from their referring primary care physician.^{10,11} The choice is largely driven by familiarity with a certain hospi-tal^{12,13} or the distance between home and hospital.^{12,14} Using CPI is also a difficult and complex task for consumers, which limits its impact on consumer choice even more.^{14,15}

Because provider choice by healthcare consumers is positively associated with autonomy and self-determination, both important principles of patient activation,¹⁶ the need to explain the limited exercise of choice by healthcare consumers might improve our understanding of active patient participation in healthcare.

Previous studies have questioned whether this limited usage of CPI is caused by the absence of the right information content¹⁷ or whether CPI presentation formats do not support decision-making tasks.⁷ Evidence for both assumptions has been found. Damman and colleagues conclude that the presentation of CPI facilitates consumers' correct interpretation as well as effective use, meaning the ability to choose the best performing provider.¹⁸ Although these are without doubt crucial elements in facilitating consumers in using such information, fundamental questions over how CPI is perceived, valued and appraised by healthcare consumers for their choice of hospital are overlooked. Some theory and evidence suggest that healthcare consumers are insufficiently informed about what is important for them.^{5,19} Current shared decision-making models for clinical treatment acknowledge the need to clarify patients' values to promote active patient participation in decision-making.^{20,21} The aim of this study was to identify consumers' values, appraisal, understanding, opinions and judgement of CPI. We conducted a series of focus group interviews.

Methods

Approach

The current study was a qualitative focus group study in 2009. The method allows researchers to capitalise

on communication between participants to generate pertinent information.²² The focus group method was chosen because of its flexibility to explore unanticipated issues, and to make use of the interaction between group members. We encouraged the participants to discuss the subject of CPI, ask each other questions, exchange opinions and views, and share experiences.²³ We presented the 'values' of CPI initially using terms such as 'meaning', 'sense', 'ideals' and 'principles' to explain their meaning for healthcare consumers. We introduced three real-world CPI examples to align the mindset of the participants in the discussion (see Table 1). The example shown in Table 1 combined stars with percentages, the second used different kinds of bullets, and the third one showed the availability of a service using 'yes' or 'no'.

Participants and sampling

Our initial idea was to approach patients with a specific condition. However, a commonly cited concern is that patients predominantly focus on their personal context and return to the hospital where they were treated previously.²⁴ Also, those who are most dependent on care services and who could benefit most from a 'good choice' are also those who tend to have more problems associated with the capacity to manage informed choices about care providers.²⁵ We therefore decided to recruit a cross-section of healthcare consumers from the general population. By 'healthcare consumer' we mean anybody who is a user or potential user of healthcare. In order to increase the potential use of healthcare for themselves, family or friends, we selected respondents aged over 35 years. Our participants responded to an invitation letter sent to a random sample of 480 people listed at a large health insurance company. We used a stratification procedure to include a representative age distribution. We sent 160 letters to people aged 35-50 years and 320 to people aged 50-65 years (ratio: 1/3 to 2/3). Because the response rate was low, an additional approach was undertaken, namely a personal invitation, made by members of the research team, to healthcare consumers, including people sitting in a general practitioner's (GP's) waiting room. Participants received a small incentive in exchange for their efforts. No medical information was asked for, so approval by an ethics committee was not needed.

Data collection

First, an interview guide was developed by members of the research team (NK, MF, JB) and influenced by the available literature about this topic. The interview guide was used to guarantee consistency among groups. The interview guide is available in an online appendix.

Before beginning each session, the aims and methods to be used were explained by the moderator (NK). Participants were asked to give their permission for audiotaping and transcribing. At the beginning of the focus group session, the moderator attempted to create a thoughtful, non-threatening atmosphere and set the tone for the discussion. Participants were encouraged to respond to all the issues raised by the moderator or other participants. Every effort was made to create an environment that encouraged individuals to participate fully in the discussion. After the introduction and the first items of the interview guide, real-world examples were explained by the moderator to encourage involvement and to support respondents in their discussion about big themes as values. Participants were asked to look at the examples and to answer the following questions:

- Do you understand what the performance information is showing you?
- Could this information benefit you in any way when you would be in a situation to make a comparison between different providers?

 Table 1 Example of comparative performance information related to three quality indicators of hospital A, B and C

Quality indicator	Hospital A	Hospital B	Hospital C
Cancelled surgeries (%) ^a	1.2 ★★☆	3.3★☆☆	0.7 ★★★
Pressure ulcers (%) ^b	8.1 ★☆☆	2.5 ★★★	1.5 $\star \star \star$
Electronic personal health record (%) ^c	9.5 ★★☆	10.0 ***	7.0 ★☆☆

^a Surgeries cancelled within 24 hours. ^b New patients with pressure ulcers. All patients underwent total hip replacement. ^c Availability of electronic personal health record including lab results, medication use, X-rays.

★☆☆ Hospital performance was less than average.

 $\star \star \ddagger$ Hospital performance was average.

 $\star \star \star$ Hospital performance was better than average.

• What benefit could you gain from this information?

All focus group meetings lasted about 1.5 hours and were audiotaped. In addition, an assistant made notes during each session. Data saturation, the point at which the participants provided no new information to the researchers, was reached after focus group five.

Analysis

84

All audiotaped sessions were transcribed verbatim into a Microsoft Word[®] file. Analysis of the transcripts was facilitated by the use of a qualitative software program Atlas.ti.5.2 to manage the data.²⁵ Thematic analysis was undertaken to reveal core consistencies and meanings in the data by identifying and analysing themes, which are abstract categories of meaningful data fragments. In themes, several fragments, known as codes are connected to each other and recur in a patterned way.²⁶

Data were collected and transcripts read thoroughly to estimate data saturation. The transcripts were read several times by two investigators (NK, MF) and the main themes were extracted. Participants' statements referring to a particular theme were grouped by similar codes, and further explored. The analysis followed an inductive approach, which was emergent and strongly linked to the data because assumptions were datadriven. This means that the process of coding occurs without trying to fit the data into a pre-existing model or frame.²⁷

Statements about how many people have said something can leave readers unsure how to interpret quantitative numbers in a qualitative study. However, a relatively high frequency may also signify the importance of a finding. In describing something in between, we avoid actual concrete numbers and used terms such as, for example, 'many', 'most' or 'a minority'. We present the focus groups discussion in sufficient detail supported by quotes which can be read in the boxes after every theme, to allow readers check the interpretation made during the analysis.²⁶ Every quotation used in the boxes is followed by the number of the focus group (FG), the gender and age of the participant.

Trustworthiness

We took several measures to ensure the trustworthiness of this study, including multiple methods of recruitment; multiple researches to reflect on the analysis process; multiple rounds in which data were read, analysed, compared and contrasted; project team meetings to review and explore scientific and organisational aspects of the project.

Results

Thirty-seven consumers agreed to participate in the focus group interviews. Twenty people responded to the invitation letter. Seventeen consumers were recruited having been approached personally; two in the GP's waiting room. Of the 37 participants, 27 finally participated in one of the six pre-planned focus group interviews (7 men and 20 women). The mean age of the participants was 59 years. We describe four themes that emerged from the analysis.

Theme 1: awareness (Box 1)

Most participants were not familiar with CPI as a tool to guide informed choice or to compare hospitals. Only a minority said they had seen CPI before. Although they believed themselves to be skilled internet users, most participants did not know where to find CPI. They said, 'somewhere on the internet', but they could not specify. Some were aware of the national website presenting CPI for hospitals in the Netherlands, a site the Dutch government initiated in 2005 (www. kiesbeter.nl).

Despite a lack of awareness of CPI as a tool to compare hospitals, most participants reported that they knew about the possibility of comparing hospitals and were aware of their free choice of providers. Nevertheless, they mostly seemed to have a low level of interest in CPI. They said that, being in good health, they were not interested in hospital choice, and they did not feel a sense of urgency to look for CPI. The participants also agreed that if they became ill, they probably would not have the time and energy to look for CPI. During the focus group meetings, the participants realised that, because of a low level of awareness, there was a vicious circle in which they continued to be unaware of the potential value of CPI to help them choosing high-quality care.

Box 1 Awareness

- 'I do not know where to find such information' (FG6, female, 58). 'No, I did not know either. And on which things do we need to compare? That is also a question for me.' (FG6, female, age 60)
- 'If you feel healthy, you will not start looking for a hospital just in case you might need one.' (FG1, female, age 53)
- 'Only, if it is really necessary then is the chance big enough that I would use this kind of information' (FG2, female, 57) 'For me as well, I have better things to do' (FG2, female, age 56)

Theme 2: current sources for decisionmaking (Box 2)

Most of the participants said that their hospital choice was fixed: essentially, they always went to the same hospital. This hospital was usually the closest one, as distance was an important choice attribute. They did not have any reason to change this routine, and questioned the added value of CPI. There were other significant sources they currently used for their decision making. Consumers said that their own previous experiences were important and outweighed the impact of CPI. They also highly valued the advice of family and friends. The consumers trusted their own GP as a source of information. There was some disagreement about whether to follow the GP's advice and the GP's role in providing information. In one session, some said they would not argue with their GP's advice because they felt it could damage their relationship with their GP.

Theme 3: value of CPI (Box 3)

Most participants had never seen CPI before attending the focus group interviews. They had some doubts and felt a little confused after being confronted with the CPI examples. The examples caused a variety of reactions among the participants. The inventory of these reactions, including start-up questions, was supportive for participants in the discussion that followed. At first, they gave a reaction to the examples and their usefulness in general. Some participants immediately tried to interpret what they saw, others were primarily looking to see if the examples confirmed their ideas or their own experiences. Some consumers questioned the added value of such information.

During the discussion, reactions evolved to more specific goals and values by using the examples. Participants reported that having the ability to select a healthcare provider might involve a significant effort to find and compare information. They argued that choosing a hospital introduced a new responsibility for patients, including feelings of distrust and anxiety, since they could not foresee the consequences that they might be held responsible for. Not using CPI was sometimes explained as a strategy to prevent regret for a wrong decision.

The participants pinpointed an important paradox: the more you know, the more uncertain you become,

Box 2 Current sources for decision making

- 'I think, well I would go to the hospital I always go to. I would not go searching. I am not sure if this wise, I have been in the [name] hospital a zillion times.' (FG2, female, age 57)
- 'I just feel safe in that hospital.' (FG3, female, age 75)
- 'I have had personal experience with that hospital and I will never go back! And that is the way you choose. The list may point out that it is a great hospital, but if your personal experience was unpleasant, you simply do not believe the list.' (FG1, female, age 63)
- 'It's simple, you rely on the experiences of the people you know.' (FG1, female, age 53a)
- 'I don't know how my PCP [primary care provider] would react if I went to a different hospital from the one I was referred me to. I don't know if it would affect the relationship. I still think you will tend to listen to your PCP.' (FG6, female, age 63)
- 'It would be nice, if my PCP would help me to remember that I have a choice, and would provide me with an overview or refer me to a website where I could look for it' (FG4, female, age 54). 'But you can't expect that the PCP know everything about this.' (FG1, female, age 53b)
- 'If my PCP said "I have faith in that specialist for these reasons" or "I would not rely on that specialist", then I would indeed switch to another hospital.' (FG1, female, age 53a)

Box 3 Values of comparative performance information

- 'I had to take a look at this for a second. What is this!? All these dots and circles. I'm just amazed by the way we are supposed to believe that this is useful for us as patients.' (FG1, female, age 53a)
- 'What happens now is that someone tells me: "You are the patient, so make your own choice." (...). The responsibility is passed on to me, the patient. This fits with the image of the consumer-driven healthcare system, but the question is whether you can deal with this and what happens if something goes wrong?' (FG2 male, age 53)
- 'You read something and it stays in your head. But if you had not known it, you wouldn't have that problem. Knowing everything is not that great either.' (FG2, female, age 57)

86

especially if information from different sources is inconsistent. The participants were afraid of losing their trust in certain aspects of healthcare that they had previously assumed to be good.

An important theme was the importance consumers assigned to the reliability and trustworthiness of the information. Respondents complemented each other in listing conditions CPI must fulfil before it became of value for them and before they would start using this information. The discussion included the objectivity of the information, how the information was collected, which groups of patients were compared, and at what level the CPI was published. Most participants stressed the importance of the reliability of CPI, but at the same time they found it difficult to determine on what grounds CPI could be considered reliable and trustworthy. Our participants wished to see that sources presenting CPI would include disclaimers about reliability aspects and declare any conflicts of interest. Also, up-to-date information was of much value for consumers. The remarks regarding to this can be summarised with the question: 'How do I know if what was good then is good for me right now?' Some participants wanted a single composite indicator of overall quality to compare hospitals rapidly and easily. Other participants stated that the level of aggregation was too general in the real-world examples. The examples referred to an entire hospital, whereas participants wanted to have information at the level of departments, e.g. cardiology and orthopaedics, or at the level of individual doctors.

Theme 4: perceived effect of CPI (Box 4)

The values identified stimulated the participants to mention possible effects of CPI: patient empowerment, waste, freedom of choice, benchmarking, changed perceptions, and a dichotomy in society. Patient empowerment was mentioned in several sessions, so was the counterpart that CPI is a waste. Some respondents found that using CPI to choose providers went beyond what is necessary in healthcare in terms of good care. Increasing freedom of choice was noted as a positive effect, as well as an attitude among some participants who felt their perceptions of quality of care had changed. They declared raising more awareness about the quality of care after the recent introduction of choice for consumers. Consumers supported the effect of benchmarking, so that professionals and organisations could compare each other in terms of quality of care. Finally, some participants had concerns about whether using this information might cause a further dichotomy in society by increasing inequity in healthcare. They foresaw that the ability to use information required skills of healthcare consumers for which some would be better than others.

Discussion

This study explored the values, thoughts, understanding and evaluations of CPI for hospital choice among healthcare consumers in the Netherlands. By means of real-world examples, healthcare consumers were able to express their views about CPI. The four themes (awareness, current sources of decision-making, value of CPI and perceived effect of CPI) from the data suggest that there are numerous underlying but conflicting values, which are important for healthcare consumers relating to their use of CPI. The CPI was only marginally valued, due to consumers' values during their processing of CPI, and wider principles that limited consumers even considering the use of the information.

Most participants were unaware of CPI, and did not use this kind of information. Therefore, participants could not give a direct answer when we asked them what kind of information they would like to have or

Box 4 Perceived effect of comparative performance information

- 'You now look differently. When I, recently, came to the Emergency Room with my mother, you start to look around, how is it here? How are the nurses doing things? How do they do that? What are the stories of my mother?' Moderator: Do you now look at things in healthcare from a different perspective? 'Yes, more as a purchaser of care.' (FG3, female, age 56)
- [...] 'So you go on this path, and you might get a dichotomy in society, that is a risk with this market in healthcare.' (Female, age 57). 'Yes [approvingly].' (Female, age 56). 'You have people who can do this.' (Female, age 57). 'Yes, yes' (Female, age 56). 'People who have the skills, but for others there will be less possibilities.' (Female, age 57). 'Yes, I worry about that too.' (FG3, female, age 56)
- 'I think patients become more assertive. Normally, you would take things for granted if they say "go to that hospital". While if you later find out you had a choice, you might say: if I could choose, I had perhaps done things differently and if I had known, I might have gone elsewhere; so I think this has an effect on empowerment of patients.' (Female, age 60). 'Yes, I do think it is useful information that they receive.' (FG6, male, age 63)

what matters most to them at the beginning of the focus group sessions. It seemed that the participants had never reflected on the information they would like to have while comparing hospital care. This is a general finding in judgement and decision-making research because decision-makers often do not know their own values.^{28,29} The examples were needed to clarify information preferences and led to active debates during the focus group session and to a deeper understanding of the consumers' values around CPI. In Moser and colleagues' study, the use of concrete examples led to similar positive results.³⁰ Hibbard et al_{5}^{5} stressed the need for consumers to develop a better understanding of quality of care and current measures of quality. A recent study in clinical decision-making³¹ focuses on the social influence of interaction in decision-making. The concept of 'shared mind' as an underlying process for clarifying individual values between two or more people, in which new ideas and perspectives emerge, corresponds with our findings using focus groups. Epstein also underlines the power of multiple perspectives of patients, family, physicians or other members of the healthcare team.³¹

Our study showed that consumers expressed values on several levels and that these values sometimes conflicted with each other. Some values were in favour of the use of CPI, while other doubts, concerns and principles negatively affected consumers' views of CPI. Participants relied on previous routines such as consulting GP, family, friends, and personal experiences as the basis for choosing a hospital.^{32,33} Nonetheless, they were also keen on having a choice. Respondents also appreciated the increased transparency in care, and the effect on patient empowerment.^{34,35} However, the responsibility was difficult, and participants felt that choosing a hospital was a bit of a burden. Fear of disrupting existing relationships was another consideration that prevented people from using CPI to choose a hospital. The relationship with their GP was of much more value to them, which corresponds with UK and Dutch studies.35-37 A new perspective that was raised in our study is that not using CPI was explained as a strategy to prevent regret for a wrong decision as participants could not foresee the consequences of using CPI. Trusted others can help them to clarify the possible consequences and compare this with personal values. Finally, as in other studies our participants placed much value on reliability and distrust the current CPI.^{24,30}

The use of CPI by healthcare consumers is a complex process in which values, rather than rationality, play an important role. Our findings show that consumers need help from others to solve conflicting values, to develop a firmer understanding of the quality of care concept, and to move forward in making active and informed hospital choices.

Limitations and strengths

Our study adds to the understanding of the role of values, appraisal and judgement of CPI among Dutch consumers. However, the study has a number of limitations that limit the generalisability. First, the small sample size. We intended to include more participants, but recruitment was problematic, despite the use of various strategies. Owing to this difficult recruitment, we were not able to achieve our planned age distribution for the study. Moreover, 25% of the recruited participants did not attend the focus group session, underlining our finding that current CPI is valued marginally. Second, the data collection and analysis took place simultaneously, as the time frame of three months for focus group meetings was short. A strength of this study is the use of real-world examples, which was very helpful for the discussion.

Implications

Our results make clear that simply providing information is not enough and will not enhance the usage of CPI. CPI is valued only marginally, and as such it is not yet used by service users as an additional information source, nor does it challenge healthcare consumers' current selection of hospitals. Our findings also show that more focus is needed on eliciting the underlying values of consumers. Several studies, including ours, have stressed the need for an agent that can support healthcare consumers in choosing and can coordinate on their behalf when bringing the choice into practice.^{38,39} Such an agent might be able to elicit consumers' preferences, clarify the values of CPI and preferably integrate this into the referral processes of primary care providers.

ACKNOWLEDGEMENTS

We would like to thank the participating healthcare consumers, who shared their time and thoughts with us.

REFERENCES

- 1 Robertson R and Burge P. The impact of patient choice of provider on equity: analysis of a patient survey. *Journal of Health Services Research & Policy* 2011;16 Suppl 1:22–8.
- 2 Victoor A, Delnoij DM, Friele RD and Rademakers JJ. Determinants of patient choice of healthcare providers: a scoping review. *BMC Health Services Research* 2012;12:272.
- 3 Victoor A, Friele RD, Delnoij DM and Rademakers JJ. Free choice of healthcare providers in the Netherlands is both a goal in itself and a precondition: modelling the policy assumptions underlying the promotion of patient choice through documentary analysis and interviews. *BMC Health Services Research* 2012;12(1):441.

- 4 Fredriksson M. Is patient choice democratising Swedish primary care? *Health Policy* 2013;111(1):95–98.
- 5 Hibbard JH, Greene J and Daniel D. What is quality anyway? Performance reports that clearly communicate to consumers the meaning of quality of care. *Medical Care Research and Review* 2010;67:275–93.
- 6 Werner RM and Asch DA. The unintended consequences of publicly reporting quality information. *JAMA* 2005;293:1239–44.
- 7 Fasolo B, Reutskaja E, Dixon A and Boyce T. Helping patients choose: how to improve the design of comparative scorecards of hospital quality. *Patient Education and Counseling* 2010;78:344–9.
- 8 Kaiser Family Foundation. Update on Consumers' View of Patient Safety and Quality Information. Agency for Healthcare Research and Quality: Menlo Park, CA, 2008.
- 9 Fanjiang G, von Glahn T, Chang H, Rogers WH and Safran DG. Providing patients web-based data to inform physician choice: if you build it, will they come? *Journal of General Internal Medicine* 2007;22:1463–6.
- 10 Harris KM and Buntin MB. *Choosing a Health Care Provider: The role of quality information*. Robert Wood Johnson Foundation: Princeton, NJ, 2008.
- 11 Berendsen AJ, de Jong GM, Meyboom-de Jong B, Dekker JH and Schuling J. Transition of care: experiences and preferences of patients across the primary/ secondary interface – a qualitative study. *BMC Health Services Research* 2009;9:62.
- 12 Groenewoud AS. *It's Your Choice! A study of search and selection processes, and the use of performance indicators in different patient groups.* Erasmus University Rotterdam: Veenendaal, 2008.
- 13 Spranca M, Kanouse DE, Elliott M, Short PF, Farley DO and Hays RD. Do consumer reports of health plan quality affect health plan selection? <u>*Health Services*</u> *Research* 2000;35:933–47.
- 14 Kolstad JT and Chernew ME. Quality and consumer decision making in the market for health insurance and health care services. *Medical Care Research and Review* 2009;66(1 Suppl):28S–52S.
- 15 Faber M, Bosch M, Wollersheim H, Leatherman S and Grol R. Public reporting in health care: how do consumers use quality-of-care information? A systematic review. *Medical Care* 2009;47:1–8.
- 16 Rademakers J, Nijman J, Brabers AE, de Jong JD and Hendriks M. The relative effect of health literacy and patient activation on provider choice in the Netherlands. *Health Policy* 2014;114: 200–6.
- 17 Stein BD, Kogan JN, Essock S and Fudurich S. Views of mental health care consumers on public reporting of information on provider performance. *Psychiatric Services* 2009;60:689–92.
- 18 Damman OC, Hendriks M, Rademakers J, Spreeuwenberg P, Delnoij DM and Groenewegen PP. Consumers' interpretation and use of comparative information on the quality of health care: the effect of presentation approaches. *Health Expectations* 2012;15: 197–211.
- 19 Slovic P. The construction of preference. <u>American</u> Psychologist 1995;50:364–71.
- 20 Epstein RM and Peters E. Beyond information: exploring patients' preferences. *JAMA* 2009;302:195–7.

- 21 Lee YK, Low WY and Ng CJ. Exploring patient values in medical decision making: a qualitative study. *PloS One* 2013;8(11): e80051.
- 22 Krueger RA and Casey MA. *Focus Groups: A practical guide for applied researchers* (3e). SAGE: Thousand Oaks, CA, 2000.
- 23 Barbour R. Doing Focus Groups. SAGE: London, 2007.
- 24 Schwartz LM, Woloshin S and Birkmeyer JD. How do elderly patients decide where to go for major surgery? Telephone interview survey. *British Medical Journal* 2005;331(7520):821.
- 25 Sheon N (2007) *Overview of Atlas.ti.5.2.* San Francisco. www.palmpal.org/atlas.pdf (accessed 05/03/14).
- 26 Buetow S. Thematic analysis and its reconceptualization as 'saliency analysis'. *Journal of Health Services Research* & Policy 2010;15:123–5.
- 27 Jepson R, Harris FM, Bowes A, Robertson R, Avan G and Sheikh A. Physical activity in South Asians: an in-depth qualitative study to explore motivations and facilitators. *PloS One* 2012;7(10):e45333.
- 28 Lichtenstein S and Slovic P. *The Construction of Prefer*ence. Cambridge University Press: Cambridge, 2006.
- 29 Peters E, Dieckmann NF, Vastfjall D, Mertz CK, Slovic P and Hibbard JH. Bringing meaning to numbers: the impact of evaluative categories on decisions. *Journal of Experimental Psychology Applied* 2009;15:213–27.
- 30 Moser A, Korstjens I, van der Weijden T and Tange H. Themes affecting health-care consumers' choice of a hospital for elective surgery when receiving web-based comparative consumer information. *Patient Education* and Counseling 2010;78:365–71.
- 31 Epstein RM. Whole mind and shared mind in clinical decision-making. *Patient Education and Counseling* 2013;90:200–6.
- 32 Kaiser Family Foundation. A National Survey on Consumers' Experiences with Patient Safety and Quality Information. Kaiser Family Foundation: Menlo Park, CA, 2004.
- 33 Sinaiko AD. How do quality information and cost affect patient choice of provider in a tiered network setting? Results from a survey. <u>Health Services Research 2011</u>; 46:437–56.
- 34 Coulter A. Engaging Patients in Healthcare. Open University Press: Buckingham, 2011.
- 35 Dixon A, Robertson R, Appleby J, Burge P, Devlin N and Magee H. How Patients Choose and How Providers Respond. The King's Fund: London, 2010.
- 36 Groot de IB Otten W Smeets HJ *et al.* Is the impact of hospital performance data greater in patients who have compared hospitals? *BMC Health Services Research* 2011;11:214.
- 37 Lako CJ and Rosenau P. Demand-driven care and hospital choice. Dutch health policy toward demanddriven care: results from a survey into hospital choice. *Health Care Analysis* 2009;17:20–35.
- 38 Meinow B, Parker MG and Thorslund M. Consumers of eldercare in Sweden: the semblance of choice. Social Science & Medicine 2011;73:1285–9.
- 39 Schlesinger M. Choice cuts: parsing policymakers' pursuit of patient empowerment from an individual perspective. *Health Economics, Policy, and Law* 2010;5:365– 87.

FUNDING

The Dutch healthcare insurance company CZ funded this study.

ETHICAL APPROVAL

Ethical approval is not necessary for focus groups meetings with healthcare consumers.

PEER REVIEW

Not commissioned; externally peer reviewed.

CONFLICTS OF INTEREST

None.

ADDRESS FOR CORRESPONDENCE

Nicole Ketelaar, Radboud University Medical Center, Scientific Institute for Quality of Health Care, Geert Grooteplein 21, 6525 EZ Nijmegen, The Netherlands. email: <u>nicole.ketelaar@radboudumc.nl</u>

89

Received 1 December 2013 Accepted 31 January 2014

The accompanying appendices may be accessed online at www.radcliffehealth.com/shop/quality-primary-care