HEALTH POLICY

Consumer Awareness and Strategies Among Families with High-deductible Health Plans

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OBJECTIVE: High-deductible health plans (HDHPs) are a new and controversial approach to increasing the share of health care costs paid by patients. Our study had the following aims: (1) to describe the experiences of families with HDHPs who had incurred high out-of-pocket costs and (2) to identify areas where clinicians could support more effective health care decisions by such families.

METHODS: We conducted four focus groups with adults whose families had HDHPs in a New England-based health plan and had experienced high or unexpected out-of-pocket health care costs during the past 12 months. Transcripts of audio recordings were independently coded by three investigators using modified grounded theory techniques.

RESULTS: The 21 focus group participants had a good general understanding of how their HDHP worked, but reported confusion about specific processes due to the plans' complexity. They described heightened awareness of health care costs, and identified important barriers to their ability to control costs. These included needing to seek care for urgent problems without having the time to assess potential costs; having mistaken expectations about what services the HDHP covered; and being reluctant to discuss costs with doctors. They attempted to control costs by delaying or avoiding visits to doctors, but felt they had little control over costs once a clinical encounter had begun.

CONCLUSIONS: Patients with HDHPs reported heightened sensitivity to health care costs, and described important barriers to their ability to make effective choices. Helping such patients make optimal decisions will likely require systems-level changes that involve clinicians and health insurers.

KEY WORDS: health policy; health insurance; health care reform; costs; decision-making.

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INTRODUCTION

National health care reform in the U.S. seeks to expand access to care while controlling costs.¹ The need for affordable health insurance has led to increasing requirements that patients pay a share of health care costs.² High-deductible health plans (HDHPs), in which patients pay at least \$1,000 per individual and \$2,000 per family before selected benefits are covered, have become increasingly common.^{3,4} In 2007, 18% of insured employees were enrolled in an HDHP.⁵

HDHPs have generated debate among clinicians and policy-makers. Supporters say they will make care more affordable and promote more efficient use of services.⁶ Critics counter that patients don't have the ability to make medical judgments or effectively use information on quality and prices.^{7–10}

Despite the controversy over HDHPs, few studies have described in depth how they affect patients' decisions about health care use. A recent survey suggested that patients with HDHPs in one large health plan had poor knowledge about their benefits.¹¹ We designed the current study to capture the perspectives of adults in families with HDHPs who had experienced high or unexpected out-of-pocket costs, events that could have caused them to learn more about their HDHPs. We used qualitative methods to (1) describe the experiences of these families, including surprises and strategies for controlling health costs; and (2) identify specific areas in which health insurance policymakers could support more effective health care decisions by families with cost-sharing arrangements.

METHODS

Study setting. We studied the views of adults in families with at least one child aged ≤17 years who had an HDHP, defined as a health plan with a deductible of \$1,000 or more per individual

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and \$2,000 or more per family. Families were drawn from the population of Harvard Pilgrim Health Care, a New England-based non-profit health insurer. In Harvard Pilgrim Health Care's HDHPs, most preventive services including routine check-ups, immunizations, and selected screening tests were exempt from the deductible, i.e., enrollees paid either a co-payment or nothing, whether or not they had met the deductible amount. In contrast, most diagnostic laboratory tests were not covered until the deductible had been met.¹²

Study population. We selected families who had been enrolled in an employer-sponsored HDHP for at least 12 months and who had experienced high or unexpected out-of-pocket costs.¹³ Each focus group was composed entirely of patients selected from 806 families with one of the following characteristics during the previous 12 months based on the health plan's computerized data: (1) made an emergency department visit (n=553); (2) had out-of-pocket health care costs of \$1,000 or more (n=259); (3) had out-of-pocket health care costs of \$500 to 999 (n=320); or (4) had an adult family member with a cardiac condition, and the same adult family member was hospitalized or the family had out-of-pocket health care costs of \$1,000 or more (n=132). Some families qualified for more than one subgroup. We selected a random sample from each subgroup, sent invitation letters, and made telephone calls to invite participation of the adult in the household most responsible for health care decisions. Of the 244 eligible families contacted by telephone, 30 (12%) initially agreed to participate, and 21 (9%) actually participated.

Data collection. We conducted four focus groups, each of which included four to six participants, in a conference room housed in a clinical center. Immediately prior to each group, participants were asked to complete a seven-item questionnaire on demographic characteristics. Each focus group lasted approximately two hours and was facilitated by a lead moderator (JS). Audio recordings were transcribed verbatim. A gift card incentive of \$100 per participant was provided. The protocol was approved by the Institutional Review Board of Harvard Pilgrim Health Care.

The focus group interview protocol, which was developed by our multidisciplinary study team, included seven topic domains: (1) knowledge of how the HDHP worked; (2) strategies to reduce health care use; (3) other strategies to manage costs; (4) financial burden; (5) sense of control over health care use and costs; (6) health savings or other accounts; and (7) satisfaction with the HDHP.

Data analysis. Qualitative methods were used to code and analyze the data from focus group transcripts. The seven topic domains guided the reviews of transcripts, however the approach was inductive in that salient themes regarding the domains became apparent—or emerged—only upon a complete and close reading of all the data. In the first phase of analysis, five investigators independently read the transcripts, adapting principles from “grounded theory”

(known as an “open coding” process) to identify general level salient themes.

Subsequently, a sub-group of three investigators examined the transcripts in greater detail to either flesh out or refine the initial salient themes and identify various sub-themes pertaining to the broader general themes. The three investigators first independently coded each of the four focus group transcripts and then met to discuss the themes and achieve consensus about them. Finally, these themes were reported back to the entire research team for further discussion, during which consensus was achieved.

RESULTS

Study population. The four focus groups each included four to six participants, for a total of 21 participants. Based on a brief survey, participants' families had a mean of 4.1 persons, including 1.8 children. Four participants were Hispanic, one was black, one was Asian, one was black and white, and 14 were white. Seven had an educational level of some college or less and six had a household income of less than \$60,000. Eight reported they had a health savings account or health reimbursement account that accompanied their HDHP. Based on computerized health plan data, 13 of the participants had been offered a choice of health plans during their last enrollment period.

Major themes. Analysis of focus group transcripts suggested that participants' ideas clustered into four major themes (Fig. 1). The following sections provide specific, detailed examples of each of these themes.

Figure 1. Conceptual map of themes and their relationships, from focus groups with families in high-deductible health plans. The themes are interrelated and mutually influencing.

PERCEPTIONS AND EXPERIENCES IN HDHPs

Understandings of the purposes of HDHPs. The focus group participants seemed to have a good general understanding of how their HDHP and their deductible worked. For example, they understood that they needed to pay out of pocket for at least some services until the deductible limit was met. A few had made a carefully calculated comparison between the expected annual cost of both an HDHP and a traditional health insurance plan, and concluded the HDHP would cost less even if they paid the entire deductible. One said,

You might say, why would we spend the first \$3,000 [in deductible costs] when we had an HMO? Well, because we will pay \$3,000 more for that HMO than we do for the [HDHP]... Basically the additional \$3,000 I would have paid monthly just for my medical health insurance, I put it into an HSA and it actually goes a lot further because I'm not going to have these co-pays building up... I've saved even more money than I thought when I compared with what I would have paid for the HMO.

Seeking care without prior information on costs. The awareness that their HDHP might require them to be at risk for certain costs did not always lead to participants' seeking more information about costs. In some cases, the urgency of the situation or a sense of fatalism that the services would be needed regardless of costs led participants to seek health care without prior knowledge of the financial consequences:

Even in our situation where we have to pay a lot more out of pocket now going to emergency rooms ... if we have an emergency, especially with one of our children, we don't think twice, we just go.

One participant mentioned a minor operation she had had. She expressed a sense that having the operation was inevitable, so costs were a secondary concern:

I probably should have done more research ahead of time but it wasn't an issue of not getting it [the operation] done ... we'll take care of what has to be taken care of. But that's more where I think I am with it, is I just kind of hope, I just go along.

Unexpected costs. One type of situation that commonly led to unexpected costs was when a patient mistakenly thought a service would be covered based on patients' intuition or experience with prior health benefit packages. For example, doctor's services provided at preventive visits were exempt from the deductible, but not the laboratory tests or other tests ordered at those visits. A participant who was surprised by these charges said,

When I go for an annual physical, given my family history, I have an EKG. I was billed as part of the deductible for the EKG. I think I was billed for the lipid profile, which for me is an annual event. I was surprised that the tests that

have been part of my annual physicals now for 10, 15 years were part of the deductible and not considered just part of an annual physical.

Another said,

It was just my intuitive sense that an annual physical, everything that was part of an annual physical I figured would not be part of the deductible ... It's getting to the point where I'm almost hesitant to, do I really want a physical? Because I'm going to get all these fees.

PERCEPTIONS OF PROVIDERS

Perceptions of the provider's role in generating costs. Two participants observed that doctors' recommendations may result in use of services, and the patient then has little control over their costs. One said,

The doctors are suggesting, recommending all these tests that are probably necessary, but are very expensive ... My wife was in an automobile accident a few months ago... we went to the emergency room. And just to make sure that everything was okay, they did some CT scans... My wife was in the hospital for maybe three hours, and it was a \$19,000 bill. I've got no control over that.

Another participant expressed the sense that his provider should bear some responsibility for the costs of an ED visit he made:

It was the day before Thanksgiving and my doctor wasn't anywhere to be found. I finally got a message to go to the emergency room. So there were some surprise charges ... Well, I shouldn't say surprise. If I read the fine print they wouldn't have been surprises ... [but] I had an unavailable physician and was essentially sent [to the emergency room] by his office. I was hoping he would be kind enough to pay my deductible." [Laughter]

Reluctance to discuss costs with providers. Participants did not generally perceive that doctors could be helpful in controlling costs. One said he didn't think doctors had knowledge of costs:

I have complete confidence that they [providers] have no idea [about costs]. Why would I even ask or think to ask? So that's horribly cynical but that's kind of my initial feeling.

A mother said,

My son needed a lower GI X-ray and when they were ordering it, it was considered a diagnostic test. And I was like, so how much is that going to cost? I knew it was not going to be covered. And the doctor literally had no idea. They were like, you know what, you've got to call your insurance company.

In general, participants reported being reluctant to question medical advice, even when they knew costs could be an issue. One said,

It seems to me the doctor orders it, who am I to question? I can't go into the doctor during the appointment and say, well how much is that going to cost? You can't itemize on the spot.

STRATEGIES FOR CONTROLLING COSTS

Participants described delaying or avoiding what they perceived to be unneeded doctor's office or emergency department visits as their main strategy for limiting medical costs. One father reported that the HDHP had prompted him to use doctor's visits more judiciously:

If I had an HMO and I knew it cost no more than \$20 [for a doctor's visit], I'd say what the heck, for 20 bucks I'll go do it. But when you're paying a lot more, I think it [the HDHP] probably worked the way the system was meant to have it work and not just sort of frivolously spend someone else's money.

Another patient described using a watchful waiting strategy when her child jammed his or her finger on a basketball:

With kids, you just kind of step back and go, are you really that hurt? With 24 hours of ice, are you going to feel better tomorrow and I don't have to pay the deductible and spend the time to go? And if they obviously need it, yes ... It's if I don't have to lay out that \$150 for that, I have it for someplace else.

One participant mentioned the value of telephone advice:

It's really nice to be able to have an office where you can call and there's a nursing staff and they can then consult with a doctor as needed and get back to you ... I think that that's a kind of area of coverage that is pretty valuable.

INCREASED AWARENESS OF COSTS AND PAYMENT POLICIES

One participant observed that information about costs is not readily available to patients:

I wonder if the opportunity is really presented to look at things in a cost effective manner, because it's not like going to a supermarket or a department store where everything's got its price tag on it. You don't know that urinalysis is going to cost you or cost your health insurance company \$49, or \$490. I have no idea what it costs.

In contrast, several participants said they had become more aware of costs in selected situations and were acting accordingly. One father described a situation in which there was a choice between an MRI or an X-ray. He said,

My wife is a nurse so she has some rough sense of what these things cost. So I said, 'Well let's just go get him an

MRI.' And she goes, 'You know what MRIs cost?' I said, 'I have no idea.' She goes, 'That's going to cost about \$1,000 and the X-ray is like \$100.' ... In the old days with an HMO if we could have gotten permission from our doctor of course you get an MRI... So that's when I found myself sort of thinking a little bit like a consumer.

One mother said that becoming aware of the charges for services had made her angry that her daughter's primary care provider received far less compensation than a consulting specialist:

I was really outraged when my daughter got sick because the pediatrician put in so much time, I mean hours and I've seen the EOBs come in, you know, he might charge \$85 and he might get \$39 or some crazy number. And then we ... saw the GI specialist and ... the doctor was with us maybe 15 minutes tops for the full exam and she billed \$585 and she got \$585... [My pediatrician is] the one doing all the work and doing all the follow-ups and he's getting maybe \$50. It drives me crazy and I don't know why nobody has done anything about it.

DISCUSSION

Major Findings

Participants in this study of families' experiences with HDHPs reported heightened awareness and understanding of health care costs, yet identified several important barriers to their ability to control costs. They generally accepted the rationale for increased cost-sharing and understood how deductibles worked. However, they sought care for urgent problems without prior knowledge of its costs, had mistaken expectations about what services were covered by the HDHP, and were reluctant to discuss costs with doctors. While participants said they had increased interest in and sensitivity to costs, they reported employing only a few practical strategies for helping limit costs.

Comparisons with Other Studies

This study is unique in its use of qualitative methods to create a detailed picture of the perceptions and decision-making processes of families in HDHPs. Several quantitative surveys of HDHP enrollees have been reported.^{3,11,14,15} Our finding that HDHP enrollees seemed to have heightened awareness of costs is in accord with a previous study that showed that HDHP enrollees tend to both defer use of services and seek information about costs and treatment options.³ Our findings offer encouragement to policymakers who believe that HDHPs and other cost-sharing mechanisms will stimulate heightened general awareness of health care costs and promote dialogue on how they can be controlled.

Our findings add to the evidence that HDHPs affect patient behavior regarding health care use. Study participants reported that having to share in costs made them more likely to use self-management strategies such as watchful waiting and seeking telephone advice before making doctor's visits. These results are in accord with Hibbard's finding that HDHPs may encourage information-seeking behaviors, at least among the most highly activated patients.¹⁵ They also are consistent

with a study by Wharam that found that patients with HDHPs who made one ED visit were less likely to make a second ED visit than patients with traditional health plans.¹⁶

This study identified important barriers to families in HDHPs being able to act as skilled consumers. The comments of our focus group participants suggested that HDHPs are relatively complicated consumer products. One study of patients in a different HDHP suggested that many had incorrect knowledge about what the plan covered.¹¹ The confusion expressed by some of this study's participants was most likely not the result of special problems with this particular health insurance plan. The health plan in this study, Harvard Pilgrim Health Care, makes information on its HDHPs available online, has readily accessible telephone assistance, and has consistently received top ratings nationally for member satisfaction as well as quality of care.¹⁷ Despite efforts to educate and support enrollees, the inherent complexity of HDHPs in general may pose a barrier to patients' acting as more effective consumers.

Patients were hesitant to discuss costs with doctors, despite their feeling that the HDHP had increased their awareness of costs. This observation is consistent with those of previous studies.^{3,18,19} Patients felt that doctors did not have information or care about costs, or that it was not appropriate to question doctors' recommendations based on their financial ramifications. Thus, they did not seem to picture doctors as potential allies in helping them use services judiciously. Value-based insurance design, in which health benefits plans are structured to encourage preferential use of the highest-value services, is one possible approach to aligning patients and providers and limiting the potential harms of HDHPs.²⁰ The health plan in this study covered most preventive services without the deductible having to be met, a structure consistent with value-based insurance design.

Our findings highlight selected issues HDHPs may create for clinicians, who may be caught between the ethical need to advocate for patients' interests and pressures to make health care more efficient.²¹ Clinicians may be able to increase opportunities for interactions via telephone or the internet, although providing these services may result in time or financial losses. In some situations, providers might be able to offer patients information about the effectiveness and value of alternative testing or treatment options. Many providers feel that they have limited knowledge about costs and are not well-prepared to counsel patients with HDHPs.²² Enabling clinicians to provide optimal guidance to such patients will require better systems for giving providers real-time information about the costs of services and the insurance arrangements of individual patients.

Limitations

This study focused on families who had high or unexpected health care costs that would likely have caused them to become familiar with how their HDHP worked. Thus, these findings should be interpreted as representing the views of patients with a high level of engagement with their health insurance.

HDHPs in the United States are highly variable in their designs, with the deductible amounts and the availability of special accounts for health care expenses differing between plans. The HDHPs used by this study population were reasonably representative of such plans nationally in terms of deductible amounts and benefit design. The fact that they

covered preventive services is consistent with some other HDHPs nationally in that many pay for preventive services without the patient's having to first meet the deductible.^{3,4}

Policy Implications

Patients in HDHPs have heightened sensitivity to costs, and encounter important barriers to their ability to act as effective decision makers. Potential approaches to better supporting patients in HDHPs include simplifying these plans to enhance their predictability and the clarity of communications among patients, clinicians, and insurers. Health insurers and health care systems could attempt to offer doctors real-time information on individual patients' cost-sharing arrangements and the possible financial effects of clinical recommendations. While current HDHPs may offer an initial strategy toward increasing awareness of health care costs, helping families with cost-sharing arrangements make optimal decisions will likely require systems-level changes that involve clinicians and health insurers.

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