Page 1 NATIONAL QUALITY FORUM + + + + +PATIENT REPORTED OUTCOMES WORKSHOP #1 + + + + + MONDAY, JULY 30, 2012 The Steering Committee met at the National Quality Forum, 9th Floor Conference Room, 1030 15th Street, N.W., Washington, D.C., at 9:00 a.m., Patricia Brennan and Joyce Dubow, Co-Chairs, presiding. DR.S PRESENT: PATRICIA BRENNAN, PhD, University of Wisconsin-Madison JOYCE DUBOW, AARP, MUP, Co-Chair RICHARD BANKOWITZ, MD, MBA, FACP, Premier Healthcare Alliance ETHAN BASCH, MD, MSc, Memorial Sloan-Kettering Cancer Center JIM BELLOWS, PhD, Kaiser Permanente DAVID CELLA, PhD, Northwestern University Feinberg School of Medicine ANNE DEUTSCH, PhD, RN, CRRN, Brookings Institution STEPHAN FIHN, MD, MPH, Veterans Health Administration LORI FRANK, PhD, Patient-Centered Outcomes Research Institute BARBARA GAGE, PhD, MPA, Brookings Institution TED GANIATS, MD, University of San Diego Health System KATE GOODRICH, MD, MHS, Centers for Medicare & Medicaid Services JENNIFER EAMES HUFF, MPH, Pacific Business Group on Health DENNIS KALDENBERG, PhD, Press Ganey Associates IRENE KATZAN, MD, MS, Cleveland Clinic

Page 2 LEWIS KAZIS, ScD, Boston University School of Health UMA KOTAGAL, MD, Cincinnati Children's Hospital Medical Center KEVIN LARSEN, MD, Office of the National Coordinator for HIT KATHY LOHR, PhD, RTI ELIZABETH MORT, MD, Massachusetts General Hospital CHARLES MOSELEY, Ed.D, National Association of State Directors of Developmental Disability Services GENE NELSON, DSc, MPH, The Dartmouth Institute KENNETH OTTENBACHER, PhD, OTR, The University of Texas Medical Branch at Galveston GREG PAWLSON, MD, MPH, FACP, BlueCross BlueShield Association ELEANOR PERFETTO, PhD, Pfizer COLLETTE PITZEN, RN, BSN, Minnesota Community Measurement CHERYL POWELL, Centers for Medicare & Medicaid Services (via telephone) DAVID RADLEY, PhD, MPH, Institute for Healthcare Improvement TED ROONEY, RN, MPH, Maine Quality Counts DEBRA SALIBA, MD, MPH, UCLA Borun Center/VA/RAND MARCEL SALIVE, MD, MPH, National Institutes of Health BARBARA SUMMERS, PhD, RN, University of Texas-MD Anderson Cancer Center KALAHN TALYOR-CLARK, PhD, MPH, National Partnership for Women & Families MARY TINETTI, MD, Yale New Haven Health System PHYLLIS TORDA, MA, National Committee for Quality Assurance JOHN WASSON, MD, Dartmouth Medical School ROB WEECH-MALDONADO, PhD, MBA, University of Alabama-Birmingham LINDA WILKINSON, MBA, Dartmouth Hitchcock Medical Center ALBERT WU, MD, MPH, Johns Hopkins Health System

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1	P-R-O-C-E-E-D-I-N-G-S
2	(9:04 a.m.)
3	DR. BURSTIN: All right, everybody,
4	we're going to go ahead and get started. Good
5	morning. I'm Helen Burstin, the Senior Vice
6	President for Performance Measures at NQF.
7	Thank you so much for joining us today and
8	tomorrow. We're very excited about this
9	meeting that has been long in planning, and I
10	think will really offer us a great opportunity
11	to think about this next stage of measurement
12	that we all want to enter.
13	I'll do the introduction to the
14	group, and then I'll turn it over to our
15	incredibly capable Co-Chairs, Patti Brennan
16	and Joyce Dubow, who will serve as your
17	hostesses and keep the train moving through
18	the next couple of days.
19	I just want to personally thank
20	the two Karens who many of you have interacted
21	with, Karen Adams and Karen Pace, and all of
22	our staff, and Gene Cunningham in particular

	Page 7
1	who have just done a phenomenal job of pulling
2	this together.
3	So, I get to set the stage, and
4	part of the reason for setting the stage is
5	that we really want to try to, as best as
б	possible, try to make a distinction between
7	tools and measures. So, I think that's an
8	important issue for us. So, next slide,
9	Jessica.
10	So, briefly, a little bit about
11	the project scope and the activities before I
12	turn it over to Patti.
13	OPERATOR: Excuse me. This is the
14	conference Operator. You're not in the main
15	conference.
16	DR. BURSTIN: Oh, could you please
17	put us in the main conference, Farah. That
18	would be lovely.
19	OPERATOR: Okay, one moment.
20	DR. BURSTIN: All right. Great.
21	Good morning, everybody joining us on the web.
22	We prematurely started without you for a

	Page 8
1	couple of moments but welcome.
2	This is Helen Burstin. I'm just
3	going to give a little bit of the project
4	background before I turn it over to the Chairs
5	for this workshop. So, briefly, a little bit
6	about the project scope.
7	The first is that this meeting, in
8	particular many of you who have spent time
9	at the NQF tables know we tend to talk about
10	endorsement of measures. Well, today we're
11	talking about the methodologic issues, almost
12	really a prequel, we think, to what will
13	ultimately, we hope, be some further work on
14	endorsement in the coming years.
15	So, essentially, our project scope
16	is under the guidance of the expert panel,
17	essentially, all of you in the room, we're
18	going to have these two workshops to help
19	bring together the stakeholders we think are
20	necessary to really facilitate the critical
21	path, the groundwork we need to get to the
22	development, testing, endorsement, and

Page 9 1 implementation of PRO-based performance 2 measures, a pretty heavy lift from I think where we are now. But I think we felt that 3 4 since there were so many methodologic issues 5 that needed to be resolved, it was difficult to take a big leap and just call for these 6 7 measures without really putting everybody on 8 the same place, and really beginning to 9 understand what the next steps would be. You'll have the benefit of two 10 Commission papers, the first of which you have 11 12 today, thank you to David Cella and his team, on the first one to think through next steps 13 14 about the selection of patient-level PROs for use in performance measures. And the second 15 one which we'll get to in the fall will be the 16 path to developing reliable and valid PRO-17 18 based performance measures that would, in 19 fact, be eligible for NQF endorsement, and 20 could be used for both accountability and 21 quality improvement. Thanks to HHS for funding this 22

	Page 10
1	work. We think it is really important, and
2	we're really glad to be here. Jessica, next
3	slide.
4	So, just briefly, the time line to
5	give you a sense of where we're going, I've
6	given you a little bit about that today. So,
7	the workshop is today in July. We're going to
8	be working, the paper writers are here with
9	us. They're going to actually work through
10	some revisions of the paper based on the input
11	that you'll be providing over the next couple
12	of days.
13	We'll have the chance to prepare
14	that draft report, get a chance to hold that
15	second workshop. Here are the dates, September
16	11th and 12th, at which point we'll have a
17	second paper from Barb Gage and Anne Deutsch
18	of RTI. That one will be much more grounded in
19	how to move into performance measures. We'll
20	have a public comment period from October to
21	November. We'll get the expert panel, all of
22	you again to review those comments, finalize

	Page 11
1	the papers and then bring them through our
2	approval process before the end of the year.
3	Next slide.
4	So, a little bit about putting
5	this in context. We often talk about the
6	Quality Measurement Enterprise. And one
7	important thing I want to mention is the top
8	gold bar there is measure development. It's
9	outside the realm of the others, and that's
10	because very important distinction for NQF is
11	we are not measure developers. We do not
12	develop measures. It's a really important
13	firewall for us, because we are the neutral
14	evaluators of measures. But this does give you
15	a broad sense of how this work fits into the
16	broader landscape of the measurement
17	enterprise.
18	The National Quality strategy has
19	clearly indicated a goal for having more
20	patient-reported outcomes. There is a
21	standardized measurement process that we'll
22	talk a great deal about in the coming months

	Page 12
1	that leads to NQF endorsement. But we also
2	recognize it would be very difficult to do
3	much of this without the emerging electronic
4	data platform, also part of the work that
5	we've been doing, trying to then think about
6	the alignment of the various environmental
7	drivers, how do people select measures, how do
8	people find the right measures they want to
9	use. And then, ultimately, evaluating and
10	seeing if these are driving both improvement,
11	as well as improved accountability. Next,
12	please.
13	So, just a high-level view, I
14	think, of where we're sitting in terms of what
15	we've been viewing in terms of performance
16	measurement.
17	The first is, there's definitely
18	been a drive towards higher performance. I
19	think as our criteria have gotten more and
20	more rigorous, we are beginning to see a good
21	number of the very basic process measures
22	falling to the wayside in favor of some of the

	Page 13
1	more difficult intermediate outcomes and
2	outcome measures which we think is very
3	positive.
4	I think there is a hope that with
5	more of a data platform we'll be able to
6	increasing measure disparities in all we do,
7	as opposed to the afterthought it often tends
8	to be now. If we have the data to always
9	stratify, then we insure that we do that in a
10	rigorous way.
11	We're seeing more of a shift
12	towards composite measures rather than single
13	process measures or single outcome measures,
14	trying to get a more complete picture.
15	Consumers and purchasers, in particular, find
16	these measures very, very valuable, and
17	clinicians and others find them useful when
18	they can be packaged, but still get the
19	broader view, and lots of different models of
20	this.
21	A major part of our work over the
22	last couple of years has really been about

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	Page 14
1	harmonizing measures. There is a lot of
2	cacophony currently in the measurement space
3	of measures that are just slightly different
4	across different settings of care, slightly
5	different for different payers, public and
6	private. So, a great deal of our effort
7	currently has been around trying to make sense
8	of some of this, bringing them together,
9	having a more parsimonious set.
10	And then, finally, there's been a
11	great deal of interest in moving towards a
12	more longitudinal view of what we can do in
13	measurement rather than everything being very
14	siloed of what I do in clinic on Mondays
15	versus what others do in the hospital, versus
16	the patient's experience at home care, really
17	making it a more longitudinal view. And if you
18	do that more patient-focused episode it does
19	naturally lead you towards outcome measures.
20	That's what patients care most deeply about,
21	and especially I think patient-reported
22	outcomes, in particular. Am I actually going

	Page 1
1	to feel better as a result of this procedure,
2	or measures along those lines.
3	If they are process measures,
4	increasingly there is a move to make sure
5	they're process measures that have a direct
6	impact on the desired outcomes. It also moves
7	us towards more measures of appropriateness,
8	and in this day and age hard to imagine that
9	we could look at quality in isolation without
10	increasingly now bringing in measures of cost
11	of resource use to couple them with quality
12	measures including a view of overuse.
13	So, we had some work done a couple
14	of years back now that Karen Pace led for us
15	with David Shahian as chair of an evidence
16	task force. And this was one of the, I think,
17	really important pieces of work that emerged,
18	was a very clear hierarchical preference for
19	NQF for outcomes, as much as possible, linked
20	to evidence-based processes, outcomes of
21	substantial importance with a plausible link
22	to processes of ways to improvement, although

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Page 16 not necessarily. And then if they are going to 1 2 still continue to have process measures or structural measures, they need to be closely 3 linked to outcomes. They can't be things so 4 5 distal from the outcome that just continually measuring and improving those won't ultimately 6 7 improve what we care most about. Next, please. 8 So, this is just a visual view. We 9 have two visual views of it for those of you 10 who think differently, see things differently. So, this is what we did last year of analysis 11 12 of our portfolio, breaking it down by process 13 and outcome measures. 14 And I realize this might be a bit difficult to read, but just -- as you could 15 see from the lefthand side there are more of 16 the classic areas that have been in 17 18 measurement for years; prevention, 19 cardiovascular disease, safety, surgery, 20 musculoskeletal are the ones at the top of 21 that pinnacle there. 22 And as you start going down, you

	Page 17
1	get to the very small ones towards the bottom
2	there which, unfortunately, include patient
3	experience and engagement and functional
4	status. That's two of the lowest at the end
5	there.
6	We also broke it down into process
7	and outcomes, so we're actually pleased to see
8	more of that movement towards outcomes.
9	Actually, about a third of our portfolio now
10	is outcomes as opposed to process measures and
11	structural measures.
12	And the blue here are outcomes.
13	And you can see that in some of the areas
14	there are certainly more process measures than
15	outcome measures. I think work we're going to
16	continue to work on, but in some areas, for
17	example, like surgery, way ahead in terms of
18	thinking about outcomes as opposed to more
19	process fields linked medicine which is my
20	next.
21	And this is a different view of
22	it, very similar, but this is the way we break

	Page 18
1	down our portfolio into what's crosscutting
2	and what's condition-based here. The white are
3	process measures, the blue are outcome
4	measures.
5	And just very briefly in this
6	lower box here, functional status, patient
7	engagement. So, two of the very, very
8	smallest boxes on that overall chart of our
9	over 700 measures now relate to those two
10	topic areas that we think in particular are so
11	important here. And those are, of course,
12	outcomes, and we want to try to get more of
13	those across the portfolio. Next.
14	So, before I hand it over to Patti
15	just one quick, I think, distinction that is
16	always difficult to transmit. We're going to
17	probably need to do this a couple of times
18	during the course of the meeting. So, the
19	first is that people often talk about
20	individual-level PROs, and then they talk
21	about performance measures. And they are, in
22	fact, different, and we need to make that

Page 19

1 distinction.

2	So, the first is, NQF doesn't
3	endorse individual-level instruments or
4	scales. We wouldn't endorse, for example, the
5	SF-12, or a tool like that in isolation. It
6	would need to be as part of a performance
7	measure. So, although they may be very
8	reliable, highly valid in clinical practice or
9	research, those individual patient scores
10	alone are not sufficient to really determine
11	performance of a given entity, or make
12	conclusions about the quality that's provided.
13	But we recognize those individual-level scores
14	are the data that are going to drive the
15	performance measures. What we do endorse,
16	though, are those performance measurements
17	that result in a score for the accountable
18	entity, a hospital, a practice, an ACO,
19	whatever the case may be and use data from all
20	those eligible patients.
21	So, at the same time, an endorsed
22	performance measure needs to be standardized,

	Page 20
1	precisely specified so that the specific
2	instruments and scales and scoring must be
3	identified. So, these are highly linked, but
4	at the same time, identifying just the PROs
5	won't get us to where I think we need to go in
6	terms of performance measures. Next.
7	And just to put this in perhaps a
8	bit more concrete terms, here's two examples
9	of two measures we've endorsed in the last
10	year. The first was for Minnesota Community
11	Measurement. I know Collette is here with us
12	today, which is about use of the PHQ-9, which
13	is a tool to gauge depression. And we've
14	endorsed three measures, the first of which is
15	actually utilization of the question there in
16	the first place in clinical practice paired
17	with one of these two measures, depression
18	remission at six months, or depression
19	remission at 12 months. So, we have not
20	endorsed the PHQ-9. We've endorsed the
21	performance measure that uses the PHQ-9.
22	Similarly, a very recently

	Page 21
1	endorsed measure from American Academy of
2	Ophthalmology looks at visual function, and it
3	was the improvement in patient's visual
4	function within 90 days following cataract
5	surgery defined using the VF-14.
6	Again, we have not endorsed the
7	VF-14. That is a very well validated NIH tool,
8	but we have endorsed the measure that looks at
9	the degree of improvement. So, just to kind of
10	give you that sense of distinction.
11	It is something that we often find
12	ourselves flipping back and forth. NQF has
13	endorsed CAHPS. Well, NQF has endorsed the
14	tool has endorsed the measure that uses
15	CAHPS but we don't endorse the actual tool
16	itself.
17	So, I think with that, hopefully,
18	I haven't confused you completely. I'm going
19	to turn it over to Patti. So, next slide,
20	Jessica.
21	CO-CHAIR BRENNAN: Thank you very
22	much, Helen. I want to thank Helen, Karen Pace

Page 22         and Karen Adams for the work they did to get         us to this point, and Eugene Cunningham         wherever you are for the work you've been         doing.         I am delighted yes, can you         hear? Can't hear. Okay. That's never been said         of me before, thank you. I'll try to speak         louder. I do have a Philadelphia slur. I         apologize.         II         IN WART to thank Helen, Karen Adams         and Karen Pace, and Eugene Cunningham for         their work that they've done to bring us here.         And I want to thank all of you here and on the         web for your work on the NQF, and particular         in patient-reported outcomes. It's a critical         part of the outcome assessment, and now we're         bringing the patient into the loop.         II       The purpose of our workshop is to         remind and to expand the idea that patients         are a valid and valuable source of outcomes.         Now, today we're going to be         focusing on identifying some of the	1	
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<ul><li>Now, today we're going to be</li><li>focusing on identifying some of the</li></ul>	20	are a valid and valuable source of outcomes.
22 focusing on identifying some of the	21	Now, today we're going to be
	22	focusing on identifying some of the

methodological issues related to patient reported outcomes.

3 Remember, as Helen first introduced, that there are individual level 4 5 patient-reported outcomes. How are you feeling today? How much are you able to walk? Can you 6 7 carry your groceries? Can you play with your 8 grandchildren? These are outcomes the patients 9 may know about and care about, but to 10 translate them into performance measures that tell us about the ability of an institution to 11 12 provide care requires that we attend to the methodological issues. 13 14 Individual-level patient-reported outcomes are valuable to the patient and to 15 the clinician, the individual clinician. They 16 inform the care process, they provide patient 17 18 feedback and a guide for self-monitoring. And, 19 importantly, they can be contributory towards 20 shared decision making. 21 We're focusing on the second half

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of this slide today, the aggregate level, the

22

## Page 23

Page 24 1 performance measure where we're identifying 2 performance measures that can be used for two different purposes in health care; first of 3 4 all, for quality improvement, to help an 5 organization, a practice, a group of 6 clinicians know how to improve. And, secondly, 7 for accountability, public reporting, 8 transparency, payment determinations. 9 Now, we're going to be having a 10 lot of opportunity for your participation and feedback today so get ready throughout the 11 12 agenda. You see opportunities for audience engagement, and one will be coming your way in 13 14 just a few minutes. 15 I'm going to turn the podium over, though, to Joyce Dubow who is our Co-Chair. 16 I've been delighted to work with Joyce. I 17 haven't worked with her before and she brings 18 19 a perspective from the AARP, and a citizen's 20 perspective on patient-reported outcomes. It's 21 extremely helpful to us. Thank you, Joyce. 22 CO-CHAIR DUBOW: Thanks, Patti. And

	Page 25
1	I want to add my welcome to everybody. And
2	it's a pleasure to have such a knowledgeable
3	Co-Chair. But, again, thanks to the staff,
4	they've been really terrific.
5	So, what you see here is the
6	famous bubble diagram. Can't hear? Okay,
7	sorry. Is that better? Okay. I've never had
8	that problem either. Gee, I have to tell my
9	kids.
10	So, this is the famous NQF bubble
11	diagram that describes the person-centered
12	episode of care. And it is a person-focused
13	model that demonstrates the episode from
14	looking at the population at risk through
15	follow-up care, and the various trajectories
16	that would depend on each individual.
17	Helen talked about the need to
18	look at patient-reported outcomes with a
19	longitudinal perspective, and this diagram
20	essentially helps us conceptualize and see
21	that framework graphically. And it takes in
22	health behaviors, health quality of life,

	Page 26
1	functional status behaviors, et cetera.
2	The next slide, please, helps us
3	identify very clearly what our objectives for
4	today's and tomorrow's this is today's
5	objectives, and tomorrow's. This is the
6	these are the objectives of the workshop, and
7	they are very clearly presented here.
8	We want to be able to identify
9	best practices and lessons learned from
10	initiatives that are already underway looking
11	at individual-level PROs in performance
12	measurement.
13	We want to discuss the major
14	methodological issues related to the
15	selection, administration, and use of the
16	individual-level PROs in performance measures.
17	We want to discuss key
18	considerations for inclusion of PROs in EHRs,
19	so we need to focus on how this stuff gets
20	integrated into electronic records.
21	We want to identify the
22	characteristics of individual-level PROs

Page 27 1 suitable for potential use in performance 2 measures, and we want to identify the additional set that would be most suitable for 3 further development. 4 5 The key here is going to be the interaction and the discussion that this group 6 7 that we get from everybody -- thank you, 8 there's a good person back there who is -thank you. 9 10 It's very important for us to have an interactive conversation today. Everybody 11 12 here brings something very important to the conversation, so we want to encourage you to 13 14 participate and to share your knowledge and your views so that we can move this effort 15 forward. 16 17 And with that, we have an 18 opportunity to hear from you. Are there any 19 questions or any observations about anything 20 you've heard so far before we get started with 21 out first panel? Karen? 22 KAREN: No, I was going to say

	Page 28
1	let's go ahead and take a few questions.
2	CO-CHAIR DUBOW: Is there anybody
3	(Off microphone comment.)
4	CO-CHAIR DUBOW: Can you identify
5	yourself, please? And we can't hear you.
6	MS. KELLER: San Keller, American
7	Institutes for Research, and there's an
8	inherent tension between the longitudinal view
9	of having the measure standardized over
10	patient-centered but standardized over
11	different applications, and the definition of
12	the measure at the unit level. So, the units
13	are going to differ as the patient moves
14	through the system.
15	CO-CHAIR BRENNAN: I'm sorry that
16	engineering degrees doesn't work inside the
17	Beltway.
18	If I'm understanding the comment
19	directly, your remark is that a longitudinal
20	view of measures is following a patient
21	through a number of different episodes of care
22	at different points of care. So,

	Page 29
1	methodologically you're asking us to consider
2	how different contributors to the care process
3	can be appraised or evaluated by a single
4	point measure a single set of measures
5	across a number of points. And I think did
6	I get your comment correctly? Thank you.
7	(Off microphone comment.)
8	CO-CHAIR BRENNAN: Right. And when
9	you refer to units you mean sites of care as
10	opposed to units of measure. So, I think
11	that's a very important consideration, and
12	that's something we will need to be returning
13	to over the next two days.
14	CO-CHAIR DUBOW: Anybody else?
15	MS. LENTZ: Hi, Lisa Lentz, Centers
16	for Medicare and Medicaid Services. And I work
17	mainly on accountable care organizations and
18	physician and group-level outcome measure
19	development. And one thing that we've been
20	thinking a lot about is provider attribution,
21	particularly when we're talking about patient
22	reported outcomes that would be holding

Page 30 individual physicians and groups accountable 1 2 because, of course, the providers are only seeing patients in the office in a limited 3 time, and then the patient goes off, and they 4 5 adhere or they don't. So, I quess, what I'm hoping that we can talk about in the next two 6 7 days, too, is about attribution, and how we 8 actually tie those outcomes back to the care 9 that patients are receiving. 10 CO-CHAIR BRENNAN: Thank you. If we could have people go back to this corner area 11 12 where there's a microphone, I think that --DR. GANIATS: This one works. 13 14 CO-CHAIR BRENNAN: Good, thank you. 15 DR. GANIATS: And no one has ever 16 said that to me before that they could hear my voice. This is Ted Ganiats, University of 17 18 California-San Diego. 19 I think that one of the issues 20 that's interesting is that usually we have a 21 clinical measure that is valid at a clinical 22 level, and we try to aggregate them into a

	Page 31
1	performance measure. And sometimes there is a
2	problem because of issues related to are the
3	patients the same from one institution to
4	another, et cetera.
5	Here we're dealing with measures
6	that may or may not be applicable at an
7	individual level. Many PROs have scoring
8	mechanisms that are designed based on
9	populations of patients and they are not
10	relevant at the individual level, some of them
11	are. So we have that fundamental difference
12	between PROs and most of what makes up
13	performance measures. Plus, we have the other
14	issues that make relate to the
15	generalizability, so it will be interesting to
16	see how we can capture that additional element
17	of complexity.
18	DR. LOHR: Can you hear me with
19	this mic? Okay. I'm Kath Lohr from RTI. And I
20	wanted to go back to a couple of your meeting
21	objectives which are really the last two
22	points, which I think are more for tomorrow.

	Page 32
1	I was curious to know whether when
2	you say you want to identify characteristics
3	of individual-level PROs, whether you're after
4	sort of criteria for choosing them, whether
5	you're meaning to have a family of attributes
6	for such measures and factors that would sort
7	of be pro or against selecting them. I just
8	want to clarify that that's kind of what you
9	mean when you say "characteristics."
10	The last bullet is to say pick an
11	initial set, but then I thought I heard Joyce
12	say maybe to pick an additional set, so
13	somewhere along the line today I'm wondering
14	if you could clarify a bit more what you're
15	after, because clearly you have plenty of
16	outcome measures from your earlier slide. And
17	I wasn't sure whether you're meaning to say
18	well, let's find some other ones, or we're
19	starting from scratch.
20	MS. PACE: I'm Karen Pace. And just
21	you're right on your first question that
22	we're looking when we say

	Page 33
1	"characteristics," we're talking about
2	criteria or attributes. We did not use the
3	term "criteria" because we have criteria for
4	our performance measures, and we wanted to
5	make a distinction, but it's essentially,
6	you're right. What are the things that would
7	make an individual PRO something we should
8	consider for inclusion in a performance
9	measure?
10	And it is an initial set. As Helen
11	mentioned a couple of examples, we only have
12	a few patient-reported outcome measures as
13	performance measures. We have many more
14	outcome measures that are more clinical in
15	nature, but we are looking now to identify
16	those from patient-reported outcomes.
17	DR. LOHR: Thank you.
18	MR. YANG: Hi, Mr. DerShung Yang
19	with BrightOutcome. And I just want to get
20	clarification on the use of the term "PRO."
21	Are you we referring to specifically only
22	those tools that were assessed by patients
	show toold that were appended by patients

	Page 34
1	themselves, or are we also including those
2	that are assessed by providers or care givers
3	or some other proxies?
4	CO-CHAIR BRENNAN: At the present
5	moment, the focus is on tool or observations
6	that the patient individually makes, not an
7	interpretation by a professional or anyone
8	else. Thank you.
9	CO-CHAIR DUBOW: Thank you for that
10	clarification. It's important. Linda?
11	MS. WILKINSON: Yes, Linda
12	Wilkinson from Dartmouth-Hitchcock. I'll be
13	very interested as the conversation unfolds to
14	see how we acknowledge the different cultures
15	and climates in which these measurements are
16	taken, and such symptoms of cultural behavior
17	as things like what sort of support is given
18	the patient to enable them, or to encourage
19	them to report, et cetera. I mean, I'm sure
20	these things will come up but that's of great
21	interest. Thank you.
22	CO-CHAIR DUBOW: Thank you.

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1	DR. GOODRICH: This is Kate
2	Goodrich from CMS, and this builds off of that
3	last comment, and also a little bit off of
4	what my colleague, Lisa Lentz said.
5	One thing I'd be interested in
6	hearing about, although I think it may be a
7	little outside the scope of what we're talking
8	about today is the issue of provider buy-in to
9	these types of measures. So, to the extent
10	that people who have that we're going to
11	hear about lessons learned. I think it would
12	be very helpful for us at CMS, and also just
13	us within the room to understand how
14	providers, whether it be physicians, or group
15	practices, or facilities, how they if they
16	did, and if so, how they developed buy-in into
17	these types of measures. I think that's a
18	major barrier, a major hurdle to the use of
19	these types of measures.
20	You know, eventually even if CMS
21	requires over time the use of these types of
22	measures we still would like to be thinking

	Page 36
1	about how we can do that, and how within the
2	construction of the measure, the
3	identification of the measure topic, that can
4	lead to better clinician buy-in.
5	CO-CHAIR DUBOW: An important
б	topic. I think we may get to that during the
7	first panel. We need to wrap-up. I want to
8	take one more. Who's got the mic? Oh, Albert.
9	DR. WU: Albert Wu from Johns
10	Hopkins. Just to clarify sort of the previous
11	question. So, PROs are obviously from the
12	individuals themselves, and not the clinician.
13	But are we excluding, for example, parents,
14	reported measures for children, since and
15	then, therefore, are we excluding all child
16	measures that are not directly from the child?
17	CO-CHAIR DUBOW: Proxies count.
18	DR. WU: Proxies count.
19	CO-CHAIR DUBOW: It's one of the
20	challenges, but we need to study that, and the
21	first paper addresses some of the issues
22	around proxies, but that's within scope.
	Page 37
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1	CO-CHAIR BRENNAN: Yes. I'd like to
2	make sure that we recognize the origin is an
3	individual who received care. Yes? Speak up
4	more. The focus is the individual who receives
5	the care service, and it may be through a
б	proxy. We'll have to consider issues about
7	family care givers for individuals unable to
8	respond for themselves. And we will be hitting
9	up against the boundaries that might be a
10	little fuzzy. If it's observed by a parent as
11	opposed to observed by a clinician, for
12	example. We'll have plenty of time to talk
13	about that in the next panel, though. Thank
14	you.
15	MS. PACE: Okay. We're going to
16	move to transition to our first panel, and
17	Joyce Dubow is the moderator.
18	Just one note from Patti, that we
19	didn't really introduce or give you logistics.
20	Those of you who need restrooms, they're out
21	across the hall through the other doors on the
22	other hallway, and there is coffee in the

	Page 38
1	back. And we'll also have a break in a little
2	while, but we'll go ahead and get situated.
3	CO-CHAIR DUBOW: This is our first
4	panel, Acknowledging the Patient as an
5	Authoritative Source. I want to point out that
6	the Planning Group is that better? Can
7	everybody hear me? The Planning Group felt
8	that it was very important to start out with
9	this topic for the workshop just to reinforce
10	the importance and the authoritativeness of
11	patient-reported outcomes as a source of
12	important data in health care.
13	So, not only is the patient a
14	source of information about her own
15	preferences, for example, but also about
16	sometimes a unique source, also about
17	functional status, quality of life, pain, et
18	cetera. Sometimes patients are the only source
19	of information, but we wanted to reinforce
20	that by starting out with this topic.
21	We think that generally this is a
22	view that's shared by everybody here, but just

	Page 39
1	for the record, that's just what we had in
2	mind.
3	We've already addressed the fact
4	that patient-reported outcomes have multiple
5	uses in addition to an expression of
6	preferences, for example. Patient-reported
7	outcomes can be used in quality improvement,
8	public reporting, payment programs, so they
9	have important functions and play an important
10	role in the measurement process.
11	We've just heard that there are
12	challenges to taking some of these validated
13	clinical instruments and making them into
14	valid performance measures. And that's what we
15	need to tackle with. Today we have a panel
16	that represents important perspectives in
17	addition to the author, who's going to give us
18	an overview, the author of the first paper who
19	will give us an overview of the range of
20	topics that the paper discusses. The three
21	perspectives coming from the disability
22	community, a provider perspective, and a

Page 40 1 purchaser perspective are very important. 2 What we want to do is to tackle these challenges, address them so that we can 3 move forward. If there is agreement that this 4 5 -- that patient reported outcomes really represent an authoritative and valid source of 6 7 data, we have to figure out how to move to the 8 next steps. And that's what we hope to 9 achieve. 10 So, we have, like I say, we have a very, very talented panel. Their bios are in 11 12 the materials that you've received. We're going to start out with an overview from the 13 14 author of the paper, David Cella, one of the authors. And we're going to go from there to 15 Charles Moseley of the National Association of 16 17 State Directors of Developmental Disability 18 Services, Steve Fihn from the VA, and 19 Jennifer-Eames Huff from the Consumer 20 Purchaser Disclosure Group and PBGH. 21 So, David, will you begin, please. DR. CELLA: Good morning. Thank 22

	Page 41
1	you, Joyce. Do I ask you to advance or can I
2	advance from here? Okay, there's the first
3	one. Thank you.
4	So, you've all been sent a paper,
5	a draft of a paper, and I think I had a list
6	of contributors to the paper before this
7	slide. Is it not on this set? Okay. There we
8	go. I really want to show this first.
9	To those of you who said
10	congratulations on a nice draft, these people
11	deserve as much or more credit as I do. I get
12	to be the one standing here, but Beth Hahn,
13	Sally Jensen, and Zeeshan Butt, Cindy
14	Nowinski, and Nan Rothrock all contributed a
15	lot to this paper, so I want to acknowledge
16	them. To those of you who think the paper is
17	terrible, I'll take the full blame for that.
18	Next slide, please, or two slides.
19	So, I think the first question
20	and I know whenever I work, which I don't
21	often do, but whenever I work with people in
22	the performance measurement field, the first

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	Page 42
1	question I get either explicitly or implicitly
2	is why can't we just ask the clinicians? It
3	would be a lot easier, a lot cheaper. We know
4	our patients, why can't we do that?
5	Apart from the issue of possible
6	bias and conflict of interest in asking
7	doctors how their patients are doing when
8	they're going to be paid based upon their
9	answers, independent of that in the
10	literature, research literature there's a vast
11	amount of support that demonstrates that
12	clinical providers unfortunately don't
13	accurately capture outcomes that are only
14	logically obtained by direct patient query.
15	Certain symptoms, certain functional areas,
16	I'm afraid to say you have to ask the patient.
17	Next slide, please.
18	This is actually some work from
19	Ethan Basch, who's one of the moderators later
20	this morning just showing it's looking at
21	various symptoms associated with cancer
22	treatment. In the middle is agreement, that's

	Page 43
1	the light bars. On the left is where the
2	patient says it's worse than the doctor. On
3	the right is where the doctor says it's worse
4	than the patient. You get the impression here
5	pretty consistently that the error is in favor
6	of the patient acknowledging more problems
7	than the doctor or clinician seems to realize
8	or report on adverse events.
9	Now, these are people being asked
10	to rate the same thing, fatigue, pain, et
11	cetera. So, there is bias, and the bias tips
12	toward patients identifying more problems and
13	more issues than providers either are aware of
14	or report. Next slide.
15	And also, there's also work in
16	cancer done by Deb Bruner. When you look at
17	the correlation of adverse events, which is
18	what Ethan's study looked at with quality of
19	life, that is the broader sense of well being
20	and functioning, there's very little
21	correlation between the symptoms that patients
22	have associated with treatment or their

	Page 4
1	adverse events and their overall general
2	functioning and well being. So, for several
3	reasons it's really important to get this
4	information from the patient. And I realize
5	this may be the choir, but it's an important
6	choir. And if I can help with this refrain
7	please let me know. Next slide.
8	So, what's the potential for PRO
9	use in clinical care? Well, there are many
10	which I'll run through. You can assist
11	providers in care management, you can enhance
12	efficiency as opposed to the myth that you
13	actually interfere with efficiency, you can
14	improve communication. This is usually at the
15	top of the list, identify patient needs in a
16	more timely manner, sometimes being able to
17	intervene more quickly and prevent problems,
18	and facilitate an atmosphere of patient-
19	centered care.
20	Despite all these possible
21	opportunities or advantages, routine care
22	assessment is still not common in clinical

4

practice. Next slide.

1

2	One area that's gotten pretty
3	common is the patient experience of care,
4	largely I think because of the endorsement and
5	paying processes around getting information on
6	the patient experience of care through CAHPS
7	and other measures. So, broadening from
8	patient satisfaction where there are questions
9	like did your doctor seem to understand what
10	was important to you? Were you satisfied with
11	your visit? There is an extension in CAHPS to
12	things like reports of actual experience. For
13	example, in the last 12 months when you phoned
14	the provider's office during regular hours how
15	often do you get an answer to your questions
16	that same day? So, a very and much more focus
17	on the experience of care in a very drilled
18	down way, which I notice the all blue I
19	think it was the only all blue bar in that
20	figure that Dr. Burstin showed. Next slide.
21	Clearly, this is an area where
22	we're getting the information from patients

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	Page 46
1	now. So, this concept of patient-centered
2	care, originally Epstein's concept, I think
3	has caught on in the minds of many, and as
4	implemented some places better than others,
5	involves a partnership between the informed
6	and activated participatory patient and family
7	member with an accessible and organized
8	responsive health care system that produces
9	better, more patient-centered and oriented
10	communication, that then logically would
11	improve health outcomes. So, this is the model
12	for why we would think we would want to do
13	this. Next slide.
14	Now, there are barriers. They've
15	been alluded to, and we're going to start to
16	talk about them throughout the day. Some of
17	the current practices or best practices to
18	minimize self-report barriers including
19	selecting an appropriate method and mode of
20	administration for your context, doesn't mean
21	that there's one-size-fits-all. In fact,
22	that's not the case that one-size-fits-all.

	Page 47
1	It's important to consider things like the age
2	of the patient, the functional status of the
3	patient going into an episode of care,
4	especially when you consider longitudinal
5	evaluation over time, and the cognitive
6	capability of the patient, whether because of
7	age or because of disease or disability as
8	those relate to your likely need for use of
9	proxies and assistive devices in helping the
10	patients provide information on their own
11	behalf.
12	In designing instruments, people
13	that use universal design principles that are
14	published and available tend to produce better
15	instruments. There are accepted and approved
16	methods for translating and culturally
17	adapting questionnaires so that they are more
18	likely to produce valid results across
19	different groups whether by language or by
20	culture, or by reading level. And you can
21	produce equivalent versions across these very
22	important sociodemographic and cultural

	Page 48
1	differences that our patients manifest.
2	There needs to be flexibility in
3	the location from which you get the
4	assessment, and sometimes there are
5	differences based upon the location, white
6	coat hypertension, for example, versus
7	influences at home, maybe someone is cheating
8	and having a family member help them at home.
9	These are all issues that come up when you do
10	things the assessments in the clinic, at
11	the home, or at some facility, say a nursing
12	home or hospital.
13	It requires access to the
14	technology. If you're choosing to use an
15	electronic technology, then people if you
16	choose to do it at home people have to have
17	internet access, or some ability to get to
18	that technology. Or if it's telephone
19	technology, they have to have a phone.
20	And in every setting, particularly
21	the at-home settings health information
22	privacy and security have to be considered and

1 protected. 2 It's also important within that to address functional literacy, and health 3 literacy. They're somewhat distinct, and 4 5 they're critical really to delivering person-6 centered health care. The next slide has an 7 illustration, a diagram of that. 8 You can divide literacy and 9 technology skills, and consider patients not 10 just in terms of their literacy by doing a rapid literacy test, but whether they have 11 12 oral literacy; that is, being able to listen and hear what someone is saying, process oral 13 14 information and speak back in conversation, written literacy, and reading literacy. And 15 even reading literacy is divided into PROs, 16 17 that is being able to read some text and understand what it's saying. Document 18 19 literacy, can you sort out figures and graphs. 20 You know what percentage means? Do you know 21 what probabilities are? And quantitative 22 literacy, as well, which gets into this

Page 50 numeracy issue. 1 2 And then on the technology side, if one moves as I would personally advocate to 3 an electronic environment whenever possible, 4 5 we need to make sure that people have appropriate computer skills or other media 6 7 skills that might help give them assistance in 8 completing questionnaires, perhaps by reading questions out loud to them if their oral 9 10 literacy is better than their reading literacy. Next slide. 11 12 So, continuing on with practices to minimize barriers to self-report, there are 13 14 some circumstances where it might be difficult, or even impossible to directly 15 obtain the assessment by self-report. 16 17 We suggest in the paper that proxy 18 reporting, though it does have problems, can 19 be useful. It's really important if you want 20 to be able to be inclusive to include people 21 with cognitive or communication deficits, or 22 severe disease burden who can't speak for

Page 51 1 themselves or respond as to how they're doing, 2 not to exclude them from the picture. And for people who may be able to respond for 3 themselves but they may be in early stages of 4 5 dementia or malcognitive impairment who might not recognize their impairment as it's 6 7 evolving, and yet a proxy, a family member 8 would be a good source of that information. 9 And, finally, for young children who are not yet sufficiently reliable to 10 report the kinds of health status things that 11 12 we want to capture in performance measurement. Next slide. 13 14 So, that's my introduction. And I think I'm supposed to sit down now and have 15 16 the experts react. 17 CO-CHAIR DUBOW: Are there any specific questions about anything? We don't 18 19 want to have the conversation now, but if 20 anybody has any specific questions about the 21 presentation? Okay, Charles. 22 DR. MOSELEY: Thank you very much.

	Page 52
1	It's a pleasure to be here. Can you hear me
2	okay in the back? No? How about now? Yes?
3	Okay.
4	It is, as I mentioned, a pleasure
5	to be here. And I was really interested to see
б	the focus of the discussion on the slides
7	highlighting the real need to address
8	indicators that will improve quality, and
9	provide accountability.
10	I'd like to add one more to the
11	list, and that is to produce indicators and
12	information that's actionable, that can be
13	used by policy makers, by service providers,
14	by family members and others to really make a
15	difference in the lives of the people who are
16	receiving the support.
17	As I begin today, it's
18	interesting, I feel a little bit like a duck
19	out of the water. We don't use the term
20	intellectual in the field of intellectual
21	and developmental disabilities, patient to
22	refer to the folks that we support. We

	Page 5
1	typically use people receiving support or just
2	people. And I think that's a very important
3	difference because it does not distance the
4	individual from the services and supports that
5	they are receiving, like the word "patient"
6	does.
7	What I tried to do is organize my
8	comments today around the three particular
9	areas that you asked me to address; how do we
10	best build a value proposition for clinicians
11	and policy makers that individual input is
12	credible?
13	I think it's important to
14	recognize that the nature of the services
15	provided excuse me, important to recognize
16	the nature of the services provided in the
17	populations who are receiving them. Acute care
18	services, for example, typically are time-
19	limited and measured narrowly focusing on a
20	treatment regimen or course leading to some
21	type of cure or amelioration of a condition.
22	For people who are aging, long-

3

	Page 54
1	term care typically refers to support through
2	a nursing facility which lasts on average
3	about two and a quarter years per person
4	according to the CDC.
5	Many people with disabilities by
6	contrast receive supports throughout their
7	life span. The majority of the over one
8	million people with intellectual disabilities
9	and developmental disabilities currently
10	receiving publicly funded supports, for
11	example, enter the system following school and
12	continue to receive support throughout their
13	life times. Many never utilize a nursing home
14	at all.
15	Indeed, a disproportionate share
16	of the support is provided by family members.
17	Of all people currently receiving publicly
18	financed services right now, 57 percent
19	receive them within the home of a family
20	member.
21	Finally, it's important to
22	recognize that the various demographic and

	Page 55
1	need profiles of Medicaid beneficiaries with
2	disabilities are incredibly diverse. As noted
3	by the National Council on Disability and
4	Managed Care Principles, the type of services
5	and supports required by an 85-year old widow
6	with advanced Alzheimer's disease are entirely
7	different than those needed by a teenager with
8	significant behavioral or communication
9	challenges caused by autism or other serious
10	neurological disorder, or an adult with
11	intellectual disabilities who has co-occurring
12	mental illnesses.
13	Each may require specialized
14	medical and prescription medical services
15	and prescription medications in combination
16	with ongoing personal assistance, but the
17	composition and competencies of the team
18	assembled to deliver those services will be
19	radically different in each case, as will the
20	types of medical, psychological,
21	pharmacological, and social intervention
22	services that are deemed to be appropriate.

	Page 56
1	What is it that people need? And
2	how do we know that the services will result
3	in the outcomes that are desired? People with
4	disabilities, just like all of us, need direct
5	support to access the community, work,
6	families, and friends. They need training and
7	assistance to enable them to learn the skills
8	they need to function as independently as
9	possible, and to direct their own services.
10	They need assistance in accessing
11	appropriate health care, therapies, through
12	service coordination and case management, and
13	they need ancillary services, transportation,
14	interpreter services, and a whole wide range
15	of other supports to enable them to fully
16	participate as members of society.
17	Long-term supports are as personal
18	as taking a shower, eating meals and getting
19	dressed. They're also a matter of public
20	policy. So, how do we develop value
21	proposition for clinicians and policy makers
22	that takes input from people receiving

Page 57 1 supports? 2 It's important that we develop, I believe, population-specific indicators that 3 are meaningful in the sense that they add 4 5 value to people's lives, and to state policy, and individual practice; that they're 6 7 credible, that they address areas of 8 importance to service delivery and the achievement of individual outcomes, that 9 10 they're valid, measuring what they're intended to measure, reliable, that they produce 11 12 consistent results across interviewers, raters, and over time, and representative, 13 14 they're based on a representative sample. And, finally, they include questions that are risk-15 adjusted so that you can compare -- identify 16 17 trends and compare state-to-state data, and as 18 I mentioned, national trends, and by 19 addressing broader outcome and performance 20 variables that are relevant to individuals 21 receiving support, state policy and funding 22 decisions.

	Page 58
1	And we're talking about indicators
2	that measure access to appropriate health care
3	at a point in time, and over time, identifying
4	the number and percentages of people who are
5	receiving of people receiving support who
б	are working and are accessing employment, and
7	stay on the job, documenting the percentages
8	of individuals who choose where and with whom
9	they live, and who they spend time with during
10	the day, identify individual and service-
11	related choices that a person can exert over
12	the course of the day, and by tracking the
13	extent to which measures produce data that are
14	used by policy makers, actually used by policy
15	makers, practitioners, individuals receiving
16	support, and researchers.
17	Now, the National Association in
18	collaboration with the Human Services Research
19	Institute has developed and implemented the
20	National Core Indicators Program which gathers
21	individual-level data, systems data, across 35
22	states, roughly pulling in information,

	Page 59
1	individually reported data on people's
2	perspectives on the places where they live and
3	work, the amount of choice that they're able
4	to use, the activities they engage in during
5	the day, the nature of the experiences that
6	they have with the supports they receive, and
7	their individual characteristics.
8	Currently, we gather information
9	on about 20,000 individuals each year. We're
10	working with a grant from the Administration
11	on Intellectual and Developmental Disabilities
12	to expand the core indicators to all 51 states
13	over the next four years, 50 states plus the
14	District of Columbia. Here I need to really
15	say 51 states, I think.
16	How do we insure that PRO data is
17	useful to patients as well as other users?
18	This is a really important issue, and I think
19	it's very important to identify and utilize
20	measures that reflect and assess what is
21	important to the person, and what is important
22	for the person.

	Page 60
1	There are two separate
2	perspectives there that are both valid,
3	they're both important, but for too long we
4	have identified only what's important for the
5	person as determined by someone else, whether
б	it be a clinician, a family member, a
7	guardian, or others. And it's really critical
8	to gather the information from the person
9	receiving supports.
10	And we certainly have found over
11	the past 14 years in gathering our data that
12	individuals with intellectual disabilities can
13	very easily, the majority of them, report on
14	information about the nature of the supports
15	that they receive, their choices, their
16	outcomes, their goals, and their life
17	expectations.
18	Provide regular the data set
19	really needs to provide regular user-friendly
20	reports summarizing key data trends and
21	issues. And as I mentioned, the core
22	indicators that are now being used by 35

Page 61 states are being used in a number of different 1 2 ways. 3 I recently surveyed the directors 4 of the state agencies supporting these 5 individuals across the country. They said that 6 they used the data to meet CMS and HCBS waiver 7 quality assurance requirements with respect to 8 the plan of care, family involvement, and health and welfare. 9 10 Now, the core indicators are important to mention that these are system 11 12 measures and cannot be used by themselves to really assess this kind of information, but 13 are best used in combination with other 14 information that is gathered by providers and 15 16 others. 17 Formulate key policy positions with respect to the kinds of services that 18 19 should be delivered, compare performance 20 measures and outcomes by diagnostic groups or 21 across key service areas, residential size, 22 for example, employment and health access,

Page 62 bench marking system performance in key areas 1 2 against that of other states, and providing information on key systems variables such as 3 the impact of facility size on quality of 4 5 life, loneliness, and community access, the extent to which people are able to control and 6 7 direct the services that they receive, access 8 to employment, improved choice and access to 9 regular health care. 10 Finally, what are best practices to minimize barriers to individuals being able 11 12 to self-report? We found that to a great extent you have to go back to the survey 13 14 basics. Surveys need to be well-constructed, that can utilize alternative methods of data 15 16 gathering, not only reading a survey questionnaire but having questions explained 17 to them. We found, for example, that iPads are 18 19 terrific for people who have communication 20 problems because they can zoom right through 21 them and are pretty much in control of the 22 information. Trained and well-supervised

	Page 63
1	interviewers, the availability of people
2	receiving support to participate in the
3	process.
4	We talked earlier about proxy
5	respondents. They're very good; the responses
6	that they give are, however, different, and
7	it's important to note those differences even
8	though you may include them in part of the
9	data set.
10	The development of sound and
11	practical interview and survey administration
12	protocols, data analysis methodologies, and
13	data entry processes, targeting the right
14	people who have access to the data needed,
15	providing consistent and appropriate
16	methodological approaches for analyzing and
17	reporting the data, and providing processes
18	for releasing the data to researchers,
19	demographers, and others to document usage and
20	trends.
21	I want to loop back around to just
22	mention that it's really important that the

	Page 6
1	data be used. We're very good, and I think
2	across the health care field at gathering a
3	whole lot of information, producing a lot of
4	beautiful reports and leaving it on people's
5	desks. We need to figure out ways to really
6	drill into the information and use it to
7	change practice. Thank you very much.
8	CO-CHAIR DUBOW: Thanks, Charles. I
9	think that your point what we call these
10	things is well taken. We are talking about
11	persons, individuals, but for the sake of our
12	discussion today, forgive us if we slip, but
13	I think everybody recognizes what you're
14	saying, and we appreciate that. Steve.
15	DR. FIHN: Good morning, and I'd
16	like to thank all of you for inviting me here
17	as a representative of the Department of
18	Veterans Affairs.
19	As many of you may know, the VA
20	has been undergoing yet another major
21	transformation over the past couple of years
22	under the direction of Secretary Shinseki, and

4

	Page 65
1	the sort of three tenets of that
2	transformation have been that we are Veteran-
3	centric, that's our word for "patient,"
4	results-driven and forward thinking. So, the
5	notion of patient-centricity I think is
6	central to our system at this point, so very
7	appropriate to have this discussion.
8	And along these lines, for
9	example, VA is investing about \$1 billion, for
10	example, in developing patient-centered
11	medical homes at the thousand sites that we
12	provide primary care.
13	And we do collect information from
14	patients along the lines of PROs. For many
15	years, for example, we've conducted a survey
16	we call the Survey of Health Experiences of
17	Patients of the Shop, which includes patient
18	experience, the SF-12V, that's collected on
19	about 600,000 people a year in a very highly
20	scientific survey methodology.
21	We've recently started the U Speak
22	for our rehab patients. We have detailed

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patient-driven recovery plans for severely
injured veterans from Iraq and Afghanistan. We
collect PIMS on all our primary care patients.
We collect Audit C for alcohol use and the PSQ
for depression.

That said, actually, from my view 6 7 point that's a relatively limited amount of 8 information to get from patients. And we do 9 have plans which we're working on actively now 10 to expand that repertoire, so for example we're developing mobile health platforms with 11 12 actually a VA App Store, and some of the early 13 apps will be one for pain measurement, another 14 for PTSD symptoms.

15 We are going to release a health 16 risk assessment connected with our patient 17 portal, which is called "My Healthy Vet." And 18 we're actually experimenting with some 19 condition-specific measures particularly 20 related to ischemic heart disease to measure 21 the outcomes following elective percutaneous 22 coronary interventions.

	Page 67
1	So, I think from the VA's
2	perspective, and I'm speaking largely for
3	myself here, I think this is a good direction
4	and applaud these efforts. But I think also
5	from the perspective of a system that has over
6	6 million patients, we've also been acutely
7	cognizant of some of the limitations and
8	difficulties which I hope will be considered
9	in this process.
10	The paper, David's paper I think
11	eloquently outlines many of the concerns that
12	are fundamental, technical issues, bias,
13	problems with performance, respondent burden,
14	interpretability of measures, privacy; and in
15	our system that's multiplied by 6 million
16	people, so these are not, I think, problems
17	necessarily to be minimized.
18	And I'm going to reflect for a
19	second on my own personal experience. I
20	reconnected with one of my close colleagues,
21	John Wasson, and recounting a study we
22	collaborated on actually back in the early and

	Page 68
1	mid-'90s in which we actually randomized
2	30,000 patients in the VA to feedback of PROs,
3	both generic, as well as condition-specific to
4	primary care providers over a two-year period,
5	and failed to show, actually, any clinical
б	benefits in doing that.
7	More recently, we actually
8	conducted another multi-center randomized
9	controlled trial which we linked the use of a
10	condition-specific PRO to well-defined efforts
11	to intensify therapy for patients with
12	ischemic heart disease.
13	We've also done similar things in
14	heart failure, and in COPD. And none of those
15	cases actually have we demonstrated a clinical
16	benefit. And, in fact, in one of those cases,
17	actually, there was, as reported in the New
18	England Journal of Medicine, clinical harm.
19	And can talk about why that might be.
20	So, I think I would say that as an
21	organization, and as an individual, I think
22	I'm quite committed to this notion of patient-

	Page 69
1	driven care. And I think Don Berwick has,
2	basically, eloquently and very succinctly put
3	that, is that the patient should drive the
4	care. And the patient can't do that unless we
5	know exactly what the patient wants. So,
6	that's clear.
7	I think jumping from that precept,
8	though, to the sort of notion of performance
9	measures and mandated instruments is a big
10	jump and one that needs to be taken with care
11	and thoughtfulness. And I'm delighted to be
12	invited to be part of this group. I think this
13	is the right group of people to start
14	addressing and confronting those issues, and
15	will be keen to participate.
16	CO-CHAIR DUBOW: Thanks, Steve. I
17	think your insights about why some of these
18	efforts didn't work would be very helpful. And
19	I hope we can get to that maybe during the
20	question and answer. Jennifer.
21	MS. HUFF: Good morning. Can you
22	hear me back there? Great. I'm also, along

	Page 70
1	with everybody else, really delighted to be
2	here today. It's really I think for me
3	personally very exciting to be having this
4	conversation. Early in my career, I had the
5	benefit of working at the Picker Institute, so
6	this is an area that's near and dear to my
7	heart. And the mission there, which I think is
8	very apropos to our discussion was just to see
9	care through the patient's eyes. And I think
10	that's what we're trying to do with the
11	information we're doing here.
12	It could also be akin to walking
13	in the shoes of the patient, you know. And it
14	brings for some of us that aren't as close to
15	a clinical encounter a real humanness to the
16	work that we're trying to do in terms of
17	improving care.
18	David Cella had talked about the
19	benefits of pros in clinical care, and I'm
20	just going to focus on one aspect which we've
21	actually heard underscored by the other
22	panelists, which is really getting to patient-

	Page 71
1	centered care and the growing recognition that
2	we really want to be truly about the patient.
3	And to do that, patients need to be a part of
4	the process.
5	Asking them about how they report
6	on outcomes and experiences, as well as
7	engaging with them on the results and the
8	interventions is an important piece to
9	creating this patient-centered environment.
10	And I think we all recognize that
11	PROs also offer a valuable perspective that
12	can't be obtained for other from other data
13	sources. In fact, we could even argue that the
14	patient is an expert on some of those areas,
15	like the level of pain they're feeling, their
16	functional status, how their care is being
17	coordinated. And it's not meant to replace
18	other data sources, but it's a good complement
19	to the other information we're gathering as a
20	part of performance measurement.
21	And I think we'd also say it's
22	important to say that PROs have been

	Page 72
1	increasingly shown to be linked to improved
2	clinical outcomes. Patients that have more
3	positive experience tend to get better
4	outcomes we've seen in some studies, which is
5	a compelling argument, I think, for all
6	stakeholders in terms of using this
7	information.
8	And I think we all agree with
9	these particular statements that I've just
10	said, and it creates value, but it's not,
11	necessarily, enough to move the system in
12	terms of using patient-reported outcomes. And
13	for that, I think we have to get really
14	practical on the information that's useful in
15	terms of the value proposition. And that's
16	really creating an evidence base that shows
17	how the use of PRO measurement programs can
18	save money, improve care, engage patients in
19	the care, and then incorporating that
20	information as we gather the evidence into a
21	variety of uses that were talked about,
22	payment programs, public reporting, say,
	Page 73
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1	maintenance of certification or accreditation.
2	I'd also add clinical registries. There are
3	other places where this information could be
4	really helpful in terms of improving care.
5	A good place to focus initially
6	would be looking at places, and I think this
7	creates part of the value proposition of where
8	there's a lot of evidence of inappropriate
9	care. For example, back pain is a good example
10	of that, or with patients that have multiple
11	chronic conditions.
12	I'll give an example of a program
13	that the Pacific Business Group has been
14	involved in, and it will show, I think, not
15	just from a purchaser perspective but a
16	variety of perspectives the value proposition
17	I was talking about in terms of the different
18	elements.
19	PBGH members are using PROs in a
20	program that is called the Intensive
21	Outpatient Care Program. Some of you may know
22	this, as Boeing Corporation did a pilot on

	Page 74
1	high-risk, high-cost patients. It's
2	essentially what I'd call an ACO for a really
3	chronic condition high-risk population in the
4	primary care setting. It's a care redesign
5	model that includes a dedicated staff person
6	for the intensive primary care management.
7	They do a case rate per member per month to
8	cover non-traditional services, and as also a
9	shared savings component.
10	What we found in the Boeing pilot
11	is compared to non-participating a matched
12	population, there was a 20 percent spending
13	reduction in the program and, as well as,
14	which is where this is really important, they
15	used the SF-12, and the PHQ-9, and they found
16	both improved physical and mental functioning
17	from baseline, and patients reported access to
18	care improved since the baseline, and they
19	also saw a decrease in absenteeism, again as
20	reported by the patients.
21	PBGH is spreading this model both
22	in Northern and Southern California, and it's

	Page 75
1	been much easier to spread this model with
2	this compelling evidence. I think this
3	evidence really brings the value proposition
4	to the purchasers that we're working with.
5	We've been working closely with Humboldt
6	County. Some of you may be familiar with it.
7	It's an Aligning Forces for Quality site. And
8	they've also added using the PIM as a part of
9	the in addition to the SF-12 and the PHQ-9.
10	And they incorporate it into the patient's
11	action plan, so they have this information.
12	They use it in terms of how the care will be
13	delivered to the patients, and they are
14	regularly assessing over time how these things
15	change.
16	And I think this model has
17	something for everyone. It's improving care.
18	It's being more affordable. Patients are more
19	satisfied with the care they're getting. It
20	has patient engagement, and the clinicians are
21	also really engaged in using this information.
22	In terms of the other area we're

	Page 76
1	asked to talk about, the usefulness of
2	patients, I would agree with Charles that it's
3	really important to use information that's
4	important to the person, and for the person.
5	And I also would say I think it's really
6	important for us to consider how the PRO data
7	will be used: will patients be using it in
8	shared decision making; will they be using it
9	in their treatment decisions or selecting a
10	provider; because those actions have different
11	data needs. So, really tying it to what the
12	use is is important when we're beginning this
13	path.
14	And I'd do another plug for
15	patient-centered engagement. This is making it
16	useful to patients. This is a place to engage
17	patients or their representatives as a part of
18	that process.
19	The other thing I'd add in terms
20	of useful to patients, which we've seen with
21	other performance information is the timing of
22	when this information is given of really

	Page 77
1	having those opportunities when the patients
2	need the information, or are making the
3	decision.
4	For best practices in collecting
5	PROs, I think integration of the PRO systems
6	into clinical care, making it a part of the
7	clinical process, using patient-reported
8	modules and patient portals that are
9	convenient, and I'd also add if there are ways
10	to use cell phone technology in terms of
11	making this really accessible.
12	And also, I think, with the
13	technology, I think David talked about some of
14	the challenges with using that, so also
15	recognizing what are some of the barriers that
16	would come of that, but it would be a great
17	place in terms of making the information much
18	more available.
19	And then I'd like to conclude with
20	an experience I had when I was working with a
21	doctor who was an oncologist and primarily
22	treated breast cancer patients. And he decided

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	Page 78
1	that it was really important for him to be
2	tracking the SF-12 looking at the physical and
3	mental functioning of his patients, so he
4	bought a machine that he put in his clinic,
5	and when patients came in for their visit,
6	they filled out the SF-12 questionnaire. It
7	was much like educational testing where you
8	fill in the dots. It has all these dots, and
9	there is a machine where you could put the
10	card right in there, and it spit out the
11	report in terms of the results. It would
12	calculate it.
13	And there is also a way that you
14	could download the information on a disc, and
15	do different analyses, but it was real time.
16	And then that was given the nurse took it
17	and put it in the chart, and it was something
18	that the doctor could use as a part of his
19	visit right then and there. And I'd just like
20	to add that was 17 years ago.
21	So, I think one of the things
22	you'll hear purchasers saying, as we're always

Page 79 1 saying there's an urgency to move things 2 forward and not let some of the real nitty details keep us from making progress. And I 3 think that's a great example of, "We've been 4 5 doing this for a while." I'm really excited to 6 be here and start talking about ways to really 7 move this forward. 8 CO-CHAIR DUBOW: Thanks, Jennifer. 9 So, maybe we can conclude that this is an idea 10 whose time has come. And, you know, Jennifer, I hope that during the conversation, and we 11 12 have about a half hour. Is that right, Karen? That you'll have a chance to give us some 13 insight on how we can get other purchasers to 14 15 be thinking about asking for PROs to be incorporated into their measurement 16 17 strategies, as well. PBGH is a fairly 18 enlightened and sophisticated purchaser on 19 behalf of other companies, but it would be 20 really useful to think about how to spread the 21 word to those who aren't quite. 22 With that, we have plenty of time

	Page 80
1	for questions and answers. I think that the
2	panel has given us lots to think about, and I
3	urge you to just come forth with your
4	questions.
5	MS. PACE: And I think what we'd
6	like to do during these discussion sessions,
7	if we could ask the expert panel first to make
8	their comments and questions, and then we'll
9	go to the audience that's here in person and
10	on the phone, and then we'll have to ask the
11	operator to open up the phone lines when we're
12	ready for that.
13	CO-CHAIR DUBOW: Does the panel
14	want to
15	(Off microphone comment.)
16	CO-CHAIR DUBOW: Right.
17	MR. CUNNINGHAM: And just a
18	reminder, at each roundtable is an individual
19	microphone that you can all use, as well.
20	(Off microphone comment.)
21	MR. CUNNINGHAM: Oh. At each
22	roundtable we have

	Page 81
1	CO-CHAIR DUBOW: I just wanted to
2	be able to say that.
3	MR. CUNNINGHAM: At each roundtable
4	there is a microphone to use, as well. Just
5	push it on until it's green.
б	CO-CHAIR DUBOW: Is that Al there?
7	I can't see. Al Wu.
8	MS. PITZEN: Okay. This is Collette
9	from Minnesota Community Measurement, and I'm
10	sure we'll get to this later, but I just
11	wanted to make sure that we address the use of
12	the validated tools and potential copyright
13	issues with those developer holders.
14	For example, we're working on a
15	couple of orthopedic measurement sets with
16	definitive charge to access functional status.
17	We obtained permission from Oxford University
18	and the EQ-5D, but in a very narrow scope. So,
19	we can only use those tools for that
20	measurement. And as hospitals and clinics are
21	starting to implement these functional status
22	tools, they would like to use them a little

	Page 82
1	bit broader than just spine fusion patients.
2	So, we are continually running into those
3	complications in terms of copyright. Thanks.
4	CO-CHAIR DUBOW: That's a good
5	point. Do you want to talk about the
6	proprietary issues around that measurement,
7	Helen?
8	DR. BURSTIN: Sure, I could try.
9	Oh, that works. It's a great question, and
10	it's something that's come up. Actually,
11	numerous tools have been proposed to us, and
12	people have sort of backed away because of the
13	issue around cost. So, NQF does have a carder
14	that allows proprietary measures to come
15	forward, where part of what is revealed, the
16	measure has to be fully transparent, the
17	Committees have to be able to review it fully,
18	but there is an opportunity to include the
19	charges as one of the considerations under
20	feasibility.
21	We have not had very many measures
22	make it through that way. Actually, recently

	Page 83
1	a couple of ICU measures did because it truly
2	was the only tool around to look at pediatric
3	ICU care.
4	But it is a real issue, and it is
5	something that does limit what's available.
б	And I think if there are opportunities, and
7	I'd be curious to hear, you know, David
8	Cella's perspective from NIH as some of those
9	sort of those sub-elements of those tools may
10	get looked at if there are ways to take some
11	of those building blocks and build them into
12	measures, perhaps, rather than the whole tool.
13	CO-CHAIR DUBOW: Al.
14	DR. WU: To save time hereafter,
15	I'm going to go as Al Wu. I think that we all
16	agree that the patient is the authoritative
17	source. And it struck me as we are thinking
18	about as we are discussing this, one
19	question which we probably need to ask, which
20	is a little bit of a measurement question, is
21	which the patient, becomes sometimes patients
22	are too sick to answer for themselves. Someone

ſ

Page 84 1 else responds for them. They then at a later 2 point in time respond. Those two measures are 3 supposed to represent the same person, but we now to figure out how to combine them. Some 4 patients may report things multiply over time. 5 6 How are going to use that information? Are we 7 most interested in the state of the patient at 8 one point in time, or are we measured in a 9 changed measure, or are we interested in some 10 area under the curve? 11 So, I think there are a number of 12 issues that we need to think about which sort of relates to which patient, at least at the 13 individual level. 14 15 CO-CHAIR DUBOW: Greg. 16 DR. PAWLSON: I'll agree. I'm not color blind. I actually tell red from green. 17 18 I had the privilege last night of, I guess, 19 that you'd call it that of spending about six 20 or seven hours on an airplane, and I had a 21 chance to really re-read the paper in some 22 depth. And when I got home and my 5-year old

	Page 8
1	granddaughter who lives with us engaged me in
2	doing a puzzle with her. And those two
3	experiences together sort of really helped
4	shape some thinking around acknowledging the
5	patient as an authoritative source.
6	I think one of the things that
7	would really help in this work is to and
8	specifically the paper, is to really start
9	with a little bit broader context.
10	We normally think about it as
11	helpers of a person who needs help, and I
12	think we need a new phrase, because persons is
13	a little bit too broad. But there are people
14	who need assistance of some kind or another,
15	input, and those people are the ultimate
16	source of information about what is going on
17	with them, what they are experiencing, what
18	they think they need, and their outcomes.
19	And I think that really
20	reinforcing that spectrum of where the patient
21	or where this person who is needing the help
22	is not only the authoritative source, but is

5

	Page 86
1	the critical and only source, and then how
2	that plays out in the interaction with the
3	persons trying the care givers, the people
4	that are trying to assist that individual, I
5	think it would really be helpful.
6	It gets back to because I think
7	it puts into context for clinicians of how we
8	gather information, and when we gather it, and
9	when it's really important. And that patient-
10	reported outcomes are one piece of the puzzle
11	that is absolutely critical, and has been
12	lacking, I think, a good deal, but is really
13	in this whole context of how the person we're
14	trying to help has to be the ultimate source
15	of a lot of the key, and then how that gets
16	played out in this new electronic age. Because
17	I was also watching my 1-1/2 year old
18	granddaughter use my iPad, which was very
19	impressive.
20	CO-CHAIR DUBOW: Wow.
21	DR. TINETTI: Mary Tinetti, Yale. I
22	just want to make one comment about

	Page 87
1	differentiating patient important outcomes
2	from patient-reported outcomes. And several
3	people have alluded to it, but I think I would
4	like it to be explicitly on the table that a
5	lot of the measures are what researchers think
6	are important. I just want to clarify that.
7	The second point I want to make is
8	I think I don't want to dismiss too quickly
9	the clinician reported. I think we need to
10	differentiate clinician ascertainment of
11	patient-reported versus clinician reported,
12	because ultimately we want to do with quality
13	improvement is to improve care. And if we have
14	separated what clinicians do versus what we
15	ascertain from patients we're not going to
16	accomplish our goal.
17	So, I really want to make sure,
18	because I both in sort of alluding in the
19	discussion today and an excellent background
20	paper, I think it almost too much dismisses
21	the clinicians that still need to be at the
22	center of the relationship between the patient

1	and the outcomes, so I really want to make
2	sure we differentiate those two points.
3	CO-CHAIR DUBOW: That's very
4	important. Patti Brennan keeps making that
5	point over and over again, and I think we
6	really need to keep it in mind.
7	DR. BASCH: Hi, there. Ethan Basch
8	from Memorial Sloan Kettering Cancer Center.
9	I just wanted to bring up the issue of context
10	of use of measures, because many of the
11	measures that have been discussed are actually
12	generic measures, but as we start to think
13	about really getting very granular about
14	evaluating performance, some of the approaches
15	will really have to take into consideration
16	the context in which patients live, and what
17	they're experiencing.
18	And if we look at the regulatory
19	context in which many of these measures have
20	been used for many years, context of use or
21	fitness for purpose is really central to the
22	development of a measure. Demonstrating that

	Page 8	39
1	the measure being used is appropriate to the	
2	patient population is meaningful to that	
3	patient population. And generally speaking,	
4	this is based upon up front qualitative	
5	research demonstrating that what is being	
6	assessed is meaningful in that particular	
7	population. So, I hope that as we move forward	
8	we will keep sight that as we develop patient-	
9	reported performance measures, that it's a	
10	whole package, and it's not just presenting a	
11	measure, but demonstrating that in the context	
12	of use for the population of interest that	
13	measure is actually meaningful and can measure	
14	something the patients care about.	
15	DR. GANIATS: I love you all. I	
16	hope you still love me. I'm Ted Ganiats,	
17	again, from San Diego, University of	
18	California-San Diego. And I will play a bit of	
19	a role of a curmudgeon, I guess, because I'm	
20	going to challenge the statement that patients	
21	are an authoritative source. I don't doubt	
22	that they can be, but are they?	

	Page 90
1	And I say that because as a
2	clinician I'm able to sit there and listen to
3	the patient, and the one who comes in with a
4	positive review of systems, who has a positive
5	serum porcelain level for whatever reason, I
6	can then dismiss or partially dismiss, but
7	when put into a performance measure we lose
8	that ability. And are patients of that ilk
9	equally spread among all practices? Then I
10	don't have to worry as a performance measure,
11	but if not, there's a problem. And we know
12	that they're not equally spread.
13	Are men and women equally likely
14	to respond to a given problem? We know that
15	there are gender differences. If there are
16	gender differences, we have a problem using it
17	as a performance measure. Does mood affect the
18	report of a patient-reported outcome? I
19	believe it does. I think people around the
20	table do.
21	I am not I mean, I'm a family
22	physician. I actually use this stuff, I

1	
	Page 91
1	believe in it. I'm a strong proponent, but we
2	have to remember the limitations of the
3	patient-reported outcomes, and not assume that
4	just because it's from the patient it's
5	automatically authoritative. I say that with
6	love and respect.
7	CO-CHAIR DUBOW: It's always
8	necessary to have a curmudgeon. And we
9	appreciate the push-back because, clearly,
10	there are challenges to implementation, and we
11	need to be able to address those. But I don't
12	think you actually challenged whether the
13	patient is an authoritative source, as you
14	simply identified some barriers that we need
15	to address when we get to the measurement part
16	of it. So, you're only a kind of quasi-
17	curmudgeon, and you have to work harder.
18	(Laughter.)
19	(Off microphone comment.)
20	CO-CHAIR DUBOW: Okay.
21	DR. MOSELEY: I have a quick
22	comment. I think you're raising an important

	Page 92
1	issue, and it gets back to the notion of
2	context that you've talked about earlier,
3	because we have certainly found as we gather
4	individual responses on people's perspectives
5	on their quality of life, that that changes.
6	It changes with respect to several variables,
7	not only the level of the person's disability
8	or the particular life situation, but also
9	changes with respect to people who are working
10	versus people who are not working.
11	People who are working clearly are
12	demonstrating more choice over the services
13	that they receive, over the people who come
14	into their lives, over the structure and
15	functioning of their individual support plan.
16	So, I think it's important to kind
17	of look underneath, just as you suggest, the
18	data to see which group is being
19	representative, and what are the various other
20	variables that could come into play.
21	CO-CHAIR DUBOW: Steve.
22	DR. FIHN: Yes, I was going to

	Page 93
1	respond also. We've actually looked at the
2	geographic distribution of health-related
3	perceptions in our system, and there are huge
4	geographic differences. A good example would
5	be in the Southeast, health status is much
6	worse than it is in other parts of the
7	country. And it, obviously, closely correlates
8	with socioeconomic status and other health-
9	related conditions.
10	So, again, if we were to sort of
11	use this as a performance measure without some
12	sort of adjustment, we would arrive at some
13	probably erroneous conclusions.
14	DR. CELLA: This is Dave Cella
15	again. So, I see this particular discussion
16	as, for me, at least, the most important thing
17	for me to take away from the meeting, and it
18	comes back to Dr. Fihn's initial comment about
19	the jump from patient-driven care to
20	performance measurement mandate. And making
21	that jump, I see this group as the group that
22	can help that jump happen.

	Page 94
1	I guess I what I was saying was
2	that I see this group of experts and panel
3	reactors, reactor panels, I said in a
4	conference call that reactor panels sounded
5	like I was getting in front of a power plant.
6	(Laughter.)
7	DR. CELLA: And it is sort of a
8	power plant, I guess. But I think this is the
9	to me, this is the rub, this is the core of
10	what our challenge is to do here. And on one
11	level you can very simplistic and say well,
12	I'm not sure why patient-reported outcomes are
13	different than any other outcome that has to
14	be risk-adjusted. Maybe you could argue there
15	are more things to adjust for because of
16	culture, and language, and things that go into
17	patient-reported outcomes, and that might be
18	true. But I don't think, in my mind, at least,
19	I can I'm here to be educated, that it
20	necessarily is fundamentally or qualitatively
21	different to consider how we adjust patient-
22	reported outcome scores to do fair

	Page 95
1	comparisons, just as you adjust any other
2	outcome across providers. But I'd like to hear
3	what you think about that.
4	CO-CHAIR DUBOW: We want to open
5	this opportunity for questions and answers to
6	the audience, as well, as well as to the
7	people on the phone. So, can we ask the
8	operator to open up the are there people þ-
9	OPERATOR: At this time, ladies and
10	gentlemen, if you would like to ask an audio
11	question please press *1 on your telephone key
12	pad. We'll pause for just a moment to compile
13	the Q&A roster.
14	MS. MASTANDUNO: Good morning. I'm
15	Melanie Mastanduno from the Dartmouth
16	Institute. And I'm going to echo something one
17	of our experts, and that is going back to
18	survey basics. And thinking about the response
19	rate among the patients who are eligible to
20	report these measures, whatever instrument we
21	are using.
22	And I've had the pleasure of

	Page 96
1	visiting six different sites that are doing
2	some form of patient-reported measures on the
3	ground, and looking at their work flows, and
4	finding out their challenges, as well as
5	what's working well.
6	And two things that haven't been
7	mentioned this morning; one is the positive
8	attitude among providers when a patient does
9	provide their perspective, and wanted to be
10	acknowledged, thanked, and somehow integrated
11	into that provider-patient conversation as an
12	essential key ingredient.
13	And the second is the level of
14	trust some patients have for computers, for
15	example, or using a technology when their
16	whole social and socioeconomic circumstance
17	has not permitted them to be really power
18	surfers. And this is a key way we'll collect
19	data. And before we even get to Smart Phones,
20	this is a real cultural barrier from the
21	perspective of accessibility. Thank you.
22	DR. ROSS: Hi, I'm Clarke Ross. I'm

	Page 97
1	a new member of the MAP workgroup on persons
2	duly eligible for Medicare and Medicaid. And
3	I represent the Consortium for Citizens With
4	Disabilities, which is a policy consortium,
5	volunteer consortium of 113 disability
6	organizations.
7	I wanted to throw out a couple of
8	paradigm challenges, things that are happening
9	with Medicaid dollars, both Medicaid managed
10	care dollars and Medicaid home and community-
11	based service dollars, and just keep the
12	thought in your mind as we work through the
13	two days. And this is the direct empowerment
14	of people with disabilities.
15	The payment of dollars not through
16	an agency, and not through an organization,
17	and not through a provider, and not through a
18	professional, the payment of dollars directly
19	to people with disabilities to make their own
20	purchase decisions.
21	We have in several states what's
22	called Cash Counseling programs. These are

	Page 98
1	people who employ their own personal
2	attendants, for example, and make those
3	choices. And then in the area of mental
4	illness, we have four states who have financed
5	independent third-party consumer and family-
6	operated community-based organizations that
7	monitor services and engage individuals
8	directly, service recipients directly. And
9	these are all people who are in recovery
10	themselves from mental illness.
11	They are people with a history of
12	mental illness who have been trained to engage
13	their peers. So when we just talk about the
14	complexity of what we're talking about, these
15	are models that are actually operated,
16	financed, and have a lot of momentum behind
17	the consumer family movement to increase their
18	use. And I just wanted to remind you all of
19	those developments where the dollar empowers
20	directly the consumer and family member, and
21	doesn't go through all of the kinds of
22	organizations that we're talking about. Thank

	Page 99
1	you.
2	CO-CHAIR DUBOW: Operator, is there
3	anybody on the line who has a question? Thank
4	you for that observation, by the way.
5	Operator?
6	OPERATOR: At this time, if you'd
7	like to ask a question please press *1 on your
8	telephone key pads.
9	CO-CHAIR DUBOW: Okay, then let's
10	continue with the audience.
11	DR. GIOVANNETTI: Hi, my name is
12	Erin Giovannetti from National Committee for
13	Quality Assurance.
14	One thing that I have not heard in
15	this discussionand maybe this going to come
16	up later is, when you're using patient-
17	reported outcomes as performance measures, is
18	accountability, and specifically talking about
19	quality of life and function.
20	If we really think that the
21	evidence is there that we can hold providers,
22	entities, health plans, whatever accountable

	Page 100
1	for quality of life and function outcomes when
2	we know that there are a lot of outside
3	factors, social support, housing, income, et
4	cetera that are impacting these. And just kind
5	of thinking through are these is the SF-12
6	actually controllable by an individual
7	provider? Is that something that they can
8	change by their annual wellness visit?
9	So, I just kind of wanted to get
10	some hear maybe from the panel in terms of
11	what you think about function and quality of
12	life and its controllability.
13	CO-CHAIR DUBOW: That's an
14	interesting question, and I can't help but
15	observe that there is a functional status
16	measure that NCQA has which is in the HOS.
17	DR. FIHN: I'd like to respond. And
18	I'll just expose my own bias here. You know,
19	I think the and in David's paper, you know,
20	he actually addresses some of the areas in
21	which these have been used; one, in
22	particular, hip arthroplasties. In our case I

Page 101 1 mentioned we're looking at PCI as a very 2 directed one. I find these attractive not only 3 because in a sense we think about them as 4 5 measures of technically how good people are, did they do a good job with the hip 6 7 replacement, or did they put a stent in well. 8 But I think in terms of measuring a health 9 system, I like them because they also would 10 depend upon how well your patient selection is, are you selecting great people? In the 11 12 case of hips, are you doing the appropriate post op rehab. In the case of coronary 13 14 revascularization, you know, are -- one of the big issues are you actually revascularizing a 15 16 lesion that is causing the symptoms? If you're doing a lot of revascularization for lesions 17 that aren't a problem, patient symptoms are 18 19 not apt to get better. 20 So, my plea would actually be 21 let's start with some of these focused areas 22 where we do have validated measures, where

Page 102 they've probably are better, if you will, 1 2 value proposition than the larger sort of much more generic, and I would agree, difficult to 3 effect. There may be in intensive primary 4 5 care, some groups of patients in which we can alter sort of the global health, but that's a 6 7 hard thing to move and control. So, that 8 would be my own personal bias, if we're going 9 to get started, to start is some very focused areas where we've got some good evidence 10 11 already. 12 MS. HUFF: I would also show my 13 bias and agree with what Steven has said, as 14 well, in terms of really being careful to select what population we're going to be using 15 in terms of looking at these measures. 16 17 But to the point around using some of the general status, like the SF-12, I will 18 19 say what we have found is really -- it does 20 show sensitivity when you look at a chronic b-21 - a population that has chronic conditions. 22 So, if you're really careful in terms of

Page 103 selecting the population for which it has 1 2 sensitivity, then it is useful. And we found that not only in the project that I talked 3 4 about in my introductory remarks, but also in 5 some other research that we've done. DR. MOSELEY: I just want to 6 7 underscore the differences between performance 8 measures for acute and long-term supports. As I listen to the discussion of remediation of 9 10 conditions and various surgical interventions, those are really good. And I think it's very 11 12 important to have that as a part of the 13 person's overall treatment plan. But people go 14 back to life, and they go back to jobs, and they go back to family members, and they go 15 back to living in situations, particularly 16 17 those who receive live-long supports living in 18 situations that are paid for and controlled by 19 others. 20 One of the biggest factors, 21 variables, in individual outcomes that we've documented through the National Core 22

Page 104 1 Indicators Program is state. The state is the 2 biggest variable. And why is that? It's because state Medicaid programs, structure and 3 functioning of their Medicaid programs, 4 5 although they're all based on the same 6 statutory framework, they vary sometimes 7 significantly from one area to another. The 8 amount of supports that may be available to a 9 family to enable them to keep their son or 10 daughter with disabilities in the family home for a period of time may very vastly. And, 11 12 actually, since 2007 when the economy has kind of gone off the deep end, the level of 13 14 supports that are available to individuals has 15 declined significantly in many areas. 16 These have a very powerful impact on the quality of life that a person has, 17 18 their ability to control their own services 19 and supports, and their ability to really 20 continue to interact with their families and 21 their communities. 22 MR. ROONEY: Hi, this is Ted Rooney

	Page 105
1	from Maine. We're Force for Quality Community,
2	and I want this is one of those both -and
3	comments. I absolutely agree we need to focus
4	on those patient-reported outcomes that are
5	controllable by the health care system. And,
6	at the same time, many of you are familiar
7	with the work Robert Wood Johnson has done
8	with Project Match, which is looking into
9	social determinants come out of the University
10	of Wisconsin and others. And if we read that
11	right, it suggests that 80 percent of the
12	health of the population is not due to medical
13	care. We're hoping that the promise of the
14	accountable care organizations does begin to
15	look beyond those things that are directly
16	controllable by the clinician and look at the
17	community.
18	And at least in Maine, we're
19	actively talking about it. Granted we're a
20	smaller state, we're not going to have 14 ACOs
21	in one environment, but we have account you
22	now, ACO-type organizations that are actively

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1 talking about the social determinants in the 2 community because they recognize the limits of 3 health care.

4 So, yes, I think we need to focus 5 on those things that are controlled by the health care system, but at the same time I'm 6 7 hoping we absolutely look at the communities, 8 then, to determine 80 percent of the health 9 population, what can we do to support those 10 things in the community that are way outside the control of the physician, but need to be 11 12 impacted.

DR. PERFETTO: I think I pressed
the button too many times. Eleanor Perfetto,
I'm with Pfizer.

I want to go back to something that I think it was Ethan brought up a little bit earlier. In the pharmaceutical industry, our most vast experience using PRO data, and I know David knows this well, is in the clinical trial process, and incorporating these tools in clinical trials. And it's a

	Page 107
1	very difficult thing to do to be able to get
2	something into a clinical trial and be able to
3	differentiate whether or not you're finding
4	some differences because of a treatment that's
5	been provided. So, we've got some experience
б	in looking at whether or not a PRO can change
7	in a given clinical trial environment because
8	of treatment versus placebo, or several
9	treatments against one another.
10	And I think it gets back to
11	something Ethan brought up before, was this
12	idea of purpose of fit. And we have our
13	arbiter in the pharmaceutical industry about
14	whether or not the tool can do what we would
15	like for it to do in this differentiation
16	process is the FDA. And the FDA looks at the
17	data that we provide on the tool that we want
18	to use and gives us the yea or nay about
19	whether or not they think it's rigorous enough
20	to be able to do what we want it to do.
21	And I guess one of the challenges
22	that I see in this process is: If a tool is

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1 going to be selected, or if a set of tools as	ce
2 going to be selected, to be able to be used a	as
3 performance measures, who is going to be the	
4 arbiter to say that that tool is good enough	
5 to be able to do what we want it to do, and	
6 that it's capable of doing those things; and	
7 then from there, be able to have that tool be	9
8 translated into a quality performance	
9 measurement process?	
10 DR. KAZIS: So, think this has been	en
11 a very exceptional discussion. I'm Lewis	
12 Kazis. I'm at Boston University. Our group, 1	in
13 fact, developed the Veterans Rand 12-item	
14 Health Survey which has now been adopted by	
15 the Veterans Administration, as Steve	
16 indicated, and also by CMS as part as the	
17 principal endpoint in the health outcome	
18 survey to evaluate the Medicare Advantage	
19 Program.	
20 My view, I think, is that one	
21 needs to be as flexible as possible in terms	
22 of the implementation of these assessment	
Page 109 tools. And that if one moves to very focused 1 2 disease-specific assessments, where one might see an effect to the exclusion of a generic 3 measure, I think one might lose out and not 4 5 get all of the information, in fact, where a lot of the information that might be conveyed 6 7 in terms of the kind of clinical care that's 8 being rendered. 9 So, I think it becomes important to consider not only the disease-specific 10 assessments, but also the generic assessments 11 12 in terms of evaluating, and maybe to consider in the larger health care systems whether one 13 14 can focus on the low-lying fruit to begin with in terms of those particular populations where 15 16 one might get the biggest bang for the buck. CO-CHAIR DUBOW: Okay. Thank you 17 18 very much. I think Erin really highlighted a 19 really important area, and that is that we are 20 talking about quality improvement, as well as 21 accountability, and we need to take that 22 challenge into account as we go forward.

	Page 110
1	I hope you'll join me in thanking
2	the panel for an excellent job for getting us
3	started.
4	(Applause.)
5	CO-CHAIR DUBOW: I think we have a
6	break for 15 minutes. Is that right? And we'll
7	be back here at 11:00 for the next panel.
8	(Whereupon, the above-entitled
9	matter went off the record at 10:47 a.m. and
10	resumed at 11:02 a.m.)
11	MS. PACE: We are going to
12	reconvene. Greg Pawlson, Elizabeth Mort and
13	Gene Nelson, come to the table.
14	DR. PAWLSON: Okay, we are going
15	to get started now. I'm very sure that there
16	is important stuff being talked about. There
17	are probably about five new grants that are
18	being discussed. All we need are a few more
19	funders in the room, and then we'd never get
20	back to going.
21	It's always, I think, wonderful in
22	a gathering like this, the conversations that

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Page 111 1 are sort of offline are just as exciting and 2 interesting, and sometimes even more creative, in some senses, than what actually gets 3 4 presented. So these meetings do have, I 5 think, a very important focus, and especially this one. 6 7 This is an area that I suspect 8 almost everybody in this room has been 9 thinking about, kicking around sort of in the 10 background for a very long time. And in different pieces of it, whether you're talking 11 12 about functional status or patient-reported experience of care, or other aspects of POM, 13 it's been around for quite a while. 14 But I don't think it's been put together in this 15 coherent fashion. 16 17 And I do think this is an 18 incredibly interesting and opportunistic time, 19 because I think one of the things we have now, 20 that we didn't have even five years ago, is --21 first of all, we have the developing 22 electronic capability, which I think is

Page 112 1 incredibly transformative. 2 And I wasn't kidding. My one and a half year-old granddaughter was actually 3 going online and finding stuff that she liked 4 5 using icons, which is very different. It's a new language, in many ways. 6 7 So we have that. And then, on the 8 other side, I think, we have this emerging 9 concept of the patient-centered medical home 10 and accountable care organization, which, if it's done right, can truly be a point of 11 12 accountability and take into account, and factor in, for example, the use and 13 14 development of community resources as part of their overall mission. So I think we have 15 both a receptor and an effector on site that 16 we didn't have before. 17 18 So having gone through 19 acknowledging, in the first panel, the patient 20 as an authoritative data source, what we're 21 going to focus on here is that it can be done. 22 I don't think anyone would say it's being done

	Page 113
1	perfectly, or as well as we would like to have
2	it done, but it is being done.
3	And we're going to have two
4	examples of that, which are sort of domestic,
5	U.S. examples. But I would also point out in
6	the paper that it was a very nice little
7	vignette about what's been going on in Sweden,
8	and I am told in our next meeting we are going
9	to actually have representatives from an even
10	larger, very extensive use of patient-reported
11	outcomes that the U.K. has embarked on, and
12	which they've now had about two or three years
13	of experience with. And this was implemented
14	across the entire National Health System, so
15	equivalent to sort of some of the things that
16	Steve talked about that the VA's trying to do.
17	I think what we're going to try to
18	convey is, this can be done. There are still
19	lots of issues. There are still
20	methodological barriers that keep popping up.
21	But we are making real progress. And here to
22	share their experiences with us are Elizabeth

	Page 114
1	Mort from Massachusetts General Hospital and
2	Gene Nelson from Dartmouth Hitchcock. And
3	we're going to start with Elizabeth's
4	presentation, since they're a little bit more
5	in the formative stage. Gene's been at this
6	a while, and can show us his scars a little
7	more.
8	But I think it's a nice balance,
9	because we're sort of looking at one that's
10	getting up and started, and has overcome a lot
11	of the inertia and initial issues, and another
12	that's been in operation for a while. So,
13	Elizabeth?
14	DR. MORT: Thank you very much,
15	Greg, for that introduction. And thank you
16	very much, Helen and others at the NQF for
17	inviting me to come down and share this
18	exciting story, Lessons From the Field: Early
19	Experience with PROs at Partners Health Care.
20	We are just beginning, but we're
21	very enthusiastic, and we're in this to stay,
22	I hope. I think how this session today and

	Page 115
1	tomorrow, and the next part of this workgroup,
2	goes will determine if we're in it for the
3	long run. But at least, we are very, very
4	excited to start.
5	We are only in the beginning of
б	our data collection phase. We only started
7	data collection in March, and I'll get to that
8	in a minute. I wanted to spend a little bit
9	more time up front telling you about the time
10	and energy that we intentionally spent in
11	setting this up, hopefully for success in the
12	organization.
13	Partners Health Care is an
14	integrated delivery network in Boston. It was
15	founded in 1995. The founding hospitals of
16	the Brigham and Women's and Mass General
17	kicked it off at that time. We've had several
18	CEOs, and the most recent CEO set off a new
19	strategic plan that was launched in 2010.
20	When we launched that, we were looking broadly
21	at care redesign in two areas. We were
22	looking at primary care and population health.

	Page 116
1	And we were also looking at condition-specific
2	care redesign, and we selected CABG, stroke,
3	colectomy for colon cancer, AMI, and diabetes
4	as our focused conditions.
5	When we set this up, we organized
6	this around a key principle, which is that if
7	we were going to redesign care, we were going
8	to redesign care with the goal of improving
9	value. And we talked about this concept for
10	a long time, because our providers, when we
11	asked them to come to the table to work on
12	these projects in 2010, knew we were about to
13	undergo a large change in the way we were
14	paid.
15	They asked us "Well, how are we
16	going to be paid? How shall we do care
17	redesign?" And of course, in 2010, all we
18	knew is that it's likely to be different, but
19	we don't exactly know how. It's probably
20	going to be something in the order beyond
21	unfettered fee for service. So what we'd like
22	you to do is think about organizing care with

	Page 117
1	the goal of improving value.
2	So these overlapping Venn
3	diagrams, we must have shown thousands of
4	times, pointing out that, of course, our goal
5	here is to improve care while keeping it more
6	affordable. So we want to improve outcomes by
7	reducing costs, and obviously the inner
8	section is the value.
9	So, when we brought people
10	together, we'd had a decade or so of teams
11	working on quality improvement, working on
12	measurements, working on process indicators,
13	working on outcomes indicators.
14	What really captured people's
15	imagination, and what really has stimulated
16	this work from the get-go, though, was
17	inviting our care teams to think about
18	outcomes that really matter to patients. We
19	want to start collecting patient-reported
20	outcomes. That's what patients, after all,
21	really care about, all the kinds of
22	conversations that we've had this morning.

Page 118 So I tell you this because we got 1 2 everybody really fired up about this quest, 3 sort of two years before we even got into the implementation tasks. So we selected five 4 5 conditions, four of which are acute, based upon an episode starting in a hospitalization, 6 7 one of which is chronic, diabetes, looking at 8 chronic care over the course of a 365 day 9 period. But we were organizing this work 10 around episodic care population management, and we decided to start with CABG, and we 11 12 actually added AVR, aortic valve replacement, 13 as well -- coronary artery bypass graft, I 14 should say, and aortic valve replacement -for the purposes of getting adequate volume to 15 16 study these PROs. And then we selected diabetes. 17 18 We spent about two years. We had a very engaged physician from Israel, Eyal 19 20 He may have interviewed some of Zimlichman. 21 you in the room. He really led this project, 22 and did all the sneaker work, sneaker power,

	Page 119
1	going around talking to people, and really
2	doing a very, very thorough job of change
3	management, managing us, by interviewing
4	people. Interviewing researchers,
5	interviewing folks who went up to Dartmouth,
6	learned from Gene and his colleagues, to learn
7	about how this works.
8	So it was never one of those
9	interventions where we said "Okay, we're going
10	to do this. Here are the measures. It's
11	going to start next Friday." It was all about
12	getting people engaged, getting iterative
13	conversations with high-level people, people
14	very invested in this work from the get-go.
15	And the kind of goals that we
16	thought about from the beginning, I put up
17	here on the slide. We said "You know, this is
18	likely when NQF gets its arms around this,
19	this is likely going to become the way we do
20	business in the future. At least, we all hope
21	that it does. So we want to organize this so
22	that we're positioned to be ready to catch the

Page 120 wave when it comes." 1 2 So we wanted to make it 3 electronic. We said "Well, we can start it 4 with paper forms." No, no, no. We want to 5 make it electronic. Let's do it with futuristic goals in mind. And then we didn't 6 7 want to spend time developing new instruments. 8 We thought possibly taking measures, or pieces 9 of instruments, and putting them together 10 would be okay, but we didn't want to start from scratch, so we decided we would use 11 12 validated instruments. 13 We wanted to reduce respondent 14 burden, so we decided we would make the 15 instruments short. We may have gone a little 16 bit too short. And we wanted to align this 17 with our overall care redesign strategy, and 18 also some of our paper performance strategy. 19 So again, we spent a lot of time setting the 20 table for this important work. 21 So a summary of our tool for CABG and AVR is on the left and diabetes is on the 22

	Page 121
1	right. The total number of questions for CABG
2	pre-procedure is 17. Ten questions on
3	functional status using the PROMIS-10, some
4	symptom-level questions from the medical
5	outcomes survey, receive health benefits again
6	that's a post-op question, obviously, in
7	retrospect and health utility from the
8	EuroQol.
9	So we had 17 measures pre-op, then
10	21 measures post-op. We engaged our cardiac
11	surgery clinical team. Hours and hours of
12	meetings, and tweaking, and discussions and
13	vetting. It's kind of the way we like to do
14	business there. It takes a long time to get
15	things done.
16	But on the diabetes side, we had a
17	very robust diabetes team. We decided to use
18	the same functional status measures. We
19	decided to use PROMIS-10. Actually, David
20	Cella was very instrumental. He came to
21	Partners and gave us some lectures, and again
22	we were very intentional and deliberate in

Page 122 making sure we had run the bases on this. 1 2 We added an anxiety measure from PROMIS, a burden of diabetes measure from one 3 of the American Diabetes quality of life 4 5 indicators. I'm blanking on the exact name of the tool, I apologize. But this was a really, 6 7 really important measure. 8 We held focus groups with patients who weren't familiar with this kind of 9 10 We explained to them what we were measure. trying to do. And one of the patients said to 11 12 me "You know what I want to hold you accountable for, Dr. Mort? I want to hold you 13 14 accountable for keeping me as normal as possible. Just making things normal, so that 15 I don't have to think and worry about managing 16 my diabetes, or the symptoms or complications 17 associated with it." 18 19 I thought that was very, very 20 instrumental to me, to think about how we want 21 to organize this work. But we found a measure 22 that measured that pretty well, and then the

Page 123 health utility measure as well. 1 2 So the way we wanted to roll this out is, we have this working in a CABG and two 3 cardiac surgery clinics, doing a pre-op 4 5 assessment and then a post-op at 3, 6, and 12 months. Our plan for diabetes is a baseline 6 7 measurement and then every 6 months. Both of these instruments, both of these data 8 9 collections, start in the office. 10 Data collection. Again, we wanted to kind of channel the future here, so we 11 12 didn't want to spend a lot of time with our IT folks developing internal data collection 13 14 systems. So we actually talked to a lot of vendors, and we're partnering with a vendor to 15 do the data collection. 16 17 And on the slide you can see, we start with tablets. And all the things that 18 19 have been said about one year-olds and iPads, 20 and so on and so forth, are very much 21 applicable to the patients that we have tried 22 this with in these waiting rooms. The tablets

Page 124 work very, very well. 1 2 When the patient is given the tablet by the medical assistant or the 3 secretary -- they are given a list of patients 4 5 who are coming in. They hand the tablet. The patient goes and sits. Workflow-wise, that 6 7 works pretty well, because they're sitting, 8 and in most clinics you have at least a few 9 minutes to do something while you're waiting 10 to get checked in, and we only have 17 So it has not been a burden or a 11 measures. 12 workflow issue, once you get the group 13 engaged. 14 The patient is then asked how they want to have their follow-up done, and they 15 16 can choose between using our patient portal 17 that we call Patient Gateway, again 18 anticipating that we want to move in an 19 electronically forward-thinking way, or IVR 20 with phone operators. 21 So we really are early in this. We've only been in the field since March of 22

1	2012. We've only collected data on 264
2	questionnaires. 56 percent of the patients
3	who we've enrolled have chosen a method of
4	follow-up selecting the patient portal, the
5	internet option, so not the IVR. So I do
6	think that's going to be an increasingly
7	popular way to collect information in an
8	asynchronous way.
9	Our IT folks are working on
10	developing reports, both for patients and
11	providers. These are still being developed
12	and piloted and iterated, but the idea is that
13	these reports would be pushed out to the
14	patients through our patient portal. We're
15	getting good traction with that tool, and
16	increasingly getting more and more of our
17	patients across the entire system enrolled in
18	our patient portal.
19	And we have the electronic medical
20	record. We are undergoing a massive change.
21	We are actually installing an entirely new
22	clinical and business system across our entire

	Page 126
1	network. But in the interim, we do have an
2	LMR, and the goal is for these indicators to
3	be tracked right along with this is hard to
4	read, but it's a vital sign. It's a flowsheet
5	for vital signs. And we have these kinds of
6	things for clinical indicators, like
7	hemoglobin Alc, blood pressure and the like,
8	and we'd like to do the same with the
9	functional status/quality of life measures.
10	So the feedback again, this is
11	early. The patients we have spent a lot of
12	time with research assistants at the
13	practices, working with the front office,
14	working with the staff, working with the
15	medical assistants, working with the doctors,
16	in large part to make sure it happens, but
17	also to learn from them and to improve things,
18	and to make some iterations as we go, early
19	on.
20	Patients say their doctor should
21	be asking these questions. They like it. The
22	tablet's fun. And they say they're willing to

Page 127 answer these questions at home. 1 2 The staff experience, the practice administrators, once we make the case for this 3 4 and they understand it's important, they've 5 been quite flexible in helping us to get this embedded in the workflow. The medical 6 7 assistants and nurses are very, very eager to 8 get involved in this kind of information, and 9 are great adjuncts to the nurse practitioners and physicians who are actually seeing the 10 11 patients. 12 The physician experience is a little mixed, not surprisingly. You know, 13 14 we've spent 15 years at Partners educating our clinical colleagues about measurements, and we 15 16 don't have all the answers to "Well, is it valid?" and "What's the tool?" and "What about 17 18 the scale?" and "How can you know if there's a difference?" 19 20 We don't have the answers to all 21 those things that we've been telling people 22 for 15 are years are so important, and I said

	Page 128
1	"But wait. People are working on this. The
2	NQF has a workshop, and over the next couple
3	of years these things will evolve. And in the
4	meantime, let's get ahead of the curve." That
5	usually gets you somewhere.
6	(Laughter.)
7	DR. MORT: It's honest. It's
8	honest. But everyone loves the face validity
9	of these things. The workflow is really an
10	issue, though, because doctors obviously
11	this has been alluded to this morning already
12	doctors aren't used to getting this
13	information. How does it fit in?
14	You know, we have our script. We
15	ask the patients a good, open-ended question.
16	"How are you?" Your annual exam, "What are
17	your concerns?" But we have to figure out how
18	to get that piece of data involved in that
19	conversation, so that we can embed it in the
20	workflow of seeing the patients, as opposed to
21	saying at the end "Oh my God, here is this
22	quality of life sheet, let's talk," and it

	Page 129
1	doesn't work. So people are worried about
2	those things, but people honestly are working
3	hard at trying to make this work for us.
4	Concerned about "What do I do with
5	the results?" So if I get a critical result,
б	like a potassium of 5.6, doctors know what to
7	do with that. "But what if I get an indicator
8	from one of these scales that suggests the
9	patient's in trouble? Give me the tools to do
10	something with that information. Tell me what
11	to do in terms of referrals, but also make it
12	easier for me to know that someone else is
13	watching for those critical events and
14	flagging me, just like you do for the
15	potassium."
16	So, just some lessons learned.
17	Most of these I have already alluded to, but
18	we thought it was very important to spend a
19	couple of years doing the change management,
20	doing the research, educating ourselves and
21	bringing experts to the system, integrating it
22	with our data collection on our strategic

	Page 130
1	plan.
2	We have incredible support from
3	our senior executives, my colleagues at
4	Partners as well as the hospitals, all the way
5	up to the CEO of the entire system, who really
6	believes in this, understands that we have to
7	be cautious about going forward, we don't have
8	all the answers, but it seems to be
9	tremendously promising.
10	I think I've covered most of this.
11	So I am hoping that over the next couple of
12	days and the next few months, and subsequent
13	couple of years, we'll have the answers to
14	some of the questions that are being raised.
15	But I do hope and believe that this is work
16	that is here to stay.
17	So again, thank you very much for
18	asking us to come and share our preliminary
19	findings. Hopefully down the road we'll have
20	some more substantive results.
21	DR. PAWLSON: Thank you very much.
22	Just as Gene is coming up to start his

	Page 131
1	presentation, I was really struck with how
2	careful a process you've gone through in terms
3	of change management.
4	And also sort of something to
5	think about, perhaps for a later question, and
б	that is one of the real hallmarks of Partners
7	has been, for a number of years, it has been
8	doing incentive-based contracting, so that a
9	substantial, or at least a significant
10	proportion of reimbursement has been wrapped
11	around achieving some level of performance in
12	different areas. And I think that kind of
13	integration of payment with professionalism
14	and wanting to do right for the patient is a
15	very, very powerful sort of mover and shaker
16	in this area. So we'll perhaps take up on
17	that.
18	Any questions for clarification,
19	something that just you didn't understand? I
20	think it was a very clear presentation. Thank
21	you.
22	DR. BASCH: Just a quick question

	Page 132
1	of clarification. In the development of the
2	selection of the measures, was there patient
3	input, or was it mostly the expert teams of
4	clinicians that were consulted?
5	DR. MORT: Ethan, we had focus
6	groups up front to inform the domains that
7	patients were interested in. I believe,
8	though, in all honesty, once we identified the
9	specific measures no, I stand corrected
10	here. I'm arguing with myself.
11	We did go back to our focus
12	groups. Because we had groups of patients who
13	were advising this care redesign process, and
14	they were a group that was interested in
15	parsimony, and they also felt one of the
16	concerns was "Don't make the questions have
17	lots of different ways to answer it." You
18	know, they wanted the response patterns to be
19	similar.
20	DR. PAWLSON: Another important
21	lesson.
22	DR. NELSON: I think you're going

	Page 133
1	to cue up some slides, and thank you for
2	inviting me. It's great to be with all of
3	you.
4	I've been asked to speak about the
5	Spine Center and its experience, and we're
6	going to start with a riddle, and it comes
7	from Amory Lovins. How is a kilowatt-hour of
8	electricity like a day in the hospital?
9	Nobody wants either. We want cold beer and
10	hot showers, better outcomes, better care,
11	lower costs, and use least costs. Value for
12	money.
13	So what Amory is saying is, he's
14	an energy expert. But when we're thinking
15	about value, it really does focus on the end
16	user. So that means our patients, our
17	clients, the families that the patients reside
18	in. And we have a sense that this is where
19	the great one, Gretsky, talks about the secret
20	of skating to where the puck is going to be,
21	and we think that focusing on person-centered
22	value, and incorporating patient-reported

	Page 134
1	outcomes in that, will be really essential.
2	This is going to be a brief
3	excerpt from about a 50 page technical paper
4	that's available to you. It's available on
5	the internet or in hard copy, and it actually
б	has three case studies: one from Karolinska
7	and rheumatoid arthritis patients, one from
8	Group Health in the Pacific Northwest and
9	primary care patients. And the third case
10	study is the Dartmouth Spine Center, and
11	that's the one I'm going to focus on now. But
12	there's a lot more that you can glean from
13	some systems that have been using patient-
14	reported outcomes for about a decade.
15	So this idea of value, that we
16	start with an individual living at home or in
17	the community, and then they interact with the
18	health care system processes of entry and
19	assessment, and a care plan, what's going to
20	help me become better, and then follow-up over
21	time to see what the outcomes are, what's the
22	new functional status, the new risk status,

Page 135 1 the new disease status, if the person has a 2 disease or a condition, and what cost. And what's my experience on the ride through the 3 4 health care system? How has that treated me? 5 So an image of value that's very personcentered. 6 7 And we, like Mass General, have 8 really been focusing on the redesign of care 9 that becomes person-centered and that tries to 10 deliver on value. So you'll see this use of 11 patient-reported outcomes embedded in an 12 effort to redesign care for spine patients. And more than 10 years ago, Dartmouth had 13 14 spine patients running all over the place. They could have been seen in internal 15 medicine, or the pain clinic, or orthopedics. 16 It was a mess, like much care. 17 And so the idea was to redesign 18 19 the care program so that it's one-stop 20 shopping, and that it's very person-centered: 21 back to work, back to play, one back at a 22 time. This is Jim's initial idea. And to use

	Page 136
1	the patient-reported outcomes to create a new
2	information environment, and a better
3	relationship with the patient to achieve the
4	outcomes that they would wish to receive.
5	What you'll see in just a moment,
б	then, is a new information environment that
7	Dr. Weinstein would say he can't be a good
8	physician for his patients absent this kind of
9	information. "It's essential to understand
10	where the patient's coming from and how
11	they're doing to be a good clinician," in
12	Jim's words.
13	So inn a schematic form, the
14	information environment was changed so that
15	when a referral is made or the patient
16	requests a visit to the spine center, that
17	they are actually requested to complete
18	information as they're oriented to the spine
19	center, what does it have to offer, and then
20	patient-reported information. And that moves
21	to the initial work-up and plan of care.
22	And that information can be

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completed at home, over a portal, or when the
person shows up with a touchpad. And that
touchpad or that portal information is
uploaded to the electronic health record. And
then that is the grist for trying to create a
plan of care that meets that person's actual
needs, in a way that you'll see amplified in
just a bit. And then, depending on their
need, they'll go into an acute care program or
a chronic care program, or a functional
restoration program, or, some people, end-of-
life.
And then that data on the
patients' outcomes is being fed forward with
that patient over time as follow-up occurs,
and it's fed back to create a registry. It's
fed back for clinical program improvement.
It's fed back to become part of a national
trial.
So, feed forward/feedback of
patient information. This is very dense, but
this is what Jim was talking about, Dr.

-	Page 138
Ţ	Weinstein, that this is all based on patient-
2	reported data, and it's meant to be same-page
3	care, if you will, to put the clinician and
4	the patient on the same page about "So, what
5	are my risk factors? What's my history and my
6	symptoms? What are any red flags that I might
7	have? What's my functional status right now,
8	and how is that changing over time?"
9	On the right hand side, you can
10	see a trend line for physical function and
11	mental health, based on the SF-36 in this
12	case. You can also see pain portrayed in
13	terms of the body, and the patient's
14	experience of my own outcomes. So, "Can I
15	sleep better? Am I able to get back to
16	work?," et cetera. So this is used to create
17	the next step care plan, and it's all based on
18	patient-generated data.
19	So the patient-generated data can
20	also be used to actually go from the concept
21	of value easy to say, perhaps hard to
22	measure to measuring value. And this is a

	Page 139
1	bit complicated, but the same feed
2	forward/feedback patient-reported outcomes
3	system that was started at the Spine Center
4	became the data collection device for a
5	randomized controlled trial that NIH funded,
6	also an observational one as well, and in 12
7	other centers, including Dartmouth.
8	And then what it became was a
9	comparative effectiveness research study, to
10	see how people in blue, who had surgery,
11	versus people in yellow, who were treated non-
12	surgically, did at 6 months, 12 months, 2
13	years, 4 years. And the patients are still
14	being followed.
15	And this is two-year results, and
16	it's one of three patients populations. It's
17	people with herniated disc. So the average
18	person with herniated disc is portrayed here,
19	on the east side. The west side is a disease-
20	specific measure called the Oswestry Index,
21	and higher scores here mean greater
22	improvement in disability. So blue, -38 on

	Page 140
1	the Oswestry, versus -24 in yellow, non-
2	surgically treated patients at two years. So,
3	favoring surgery.
4	North is the SF-36 physical
5	component score, and both groups had huge
6	gains, 44 points and 34 points respectively on
7	a 0 to 100 scale. So these are giant gains,
8	surgery a little bit more gain after two
9	years.
10	My perceived health benefit. "How
11	much was I helped by the treatment that I
12	got?" is on the right hand side, so perceived
13	health benefit, both strong but once again
14	favoring surgery.
15	But you see at the bottom these
16	better average results did cost more, so this
17	is an estimate of total direct and indirect
18	costs incurred by the patient or on behalf of
19	the patient, so about 25,000 dollars versus
20	10,000 dollars direct and indirect costs after
21	two years. And in the very middle is the
22	incremental cost per quality-adjusted life

	Page 141
1	year, and that means about 74,000 dollars more
2	per quality-adjusted life year for surgical
3	care over non-surgical care, which many would
4	consider in the United States a reasonable
5	expenditure.
6	So these results are then
7	providing good information for research under
8	these conditions. They're also used, on the
9	lower right hand side if you go to our
10	website, you'll see different kinds of
11	outcomes and experiences publicly reported for
12	over five years. And so this is transparent,
13	these kinds of results, for people with
14	herniated disc, for degenerative spine, and
15	for stenosis, publicly reported.
16	This is a prototype, now, and
17	after 10 years and a collection of a lot of
18	data I can show up at the Spine Center and I
19	could see not just results for the average
20	patient, like I just showed after two
21	years, what might my results look like if I
22	got surgery or not but this is a risk

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1 calculator.

2	So I would enter in my age and my
3	gender and answer, in this case, four
4	questions about pain on this screen, and I
5	would then get a personalized display on the
6	right hand side of what my estimated results
7	would be for people like me with respect to
8	pain relief. And that's, after two years, the
9	moderate versus the mild levels of pain.
10	Yellow is non-surgery, blue is surgery. So,
11	likelihood of better results.
12	And then the lower right hand
13	boxes have the face plots, and it shows the
14	proportion of people like me that would be
15	likely to benefit, or not, for personalized
16	risk assessment or benefit assessment, leading
17	to the possibility of very good shared
18	decision making, very good informed decision
19	making, very good patient engagement with
20	better data about what my choices might look
21	like and what they might get.
22	So wrapping up, we've gone into a

Page 143 1 new electronic health record, and so a lot of 2 the functionality that took nine years to build was lost in about a nanosecond on April 3 4 2nd. And so we've got this incredible group 5 of people that are recovering the lost functionality, and putting it into the new EHR 6 7 environment. 8 There are now 18 different 9 clinical programs that are using the patient-10 reported outcomes data at Dartmouth Hitchcock, the oldest being the Spine Center, but many 11 others that have been used for more than five 12 years. And we think that it has real benefits 13 14 for patient care and for research, and for 15 where the health system is going. 16 We're shifting over to value-based contracts. We're a pioneer ACO. Our basic 17 18 strategy is better value, better outcomes, 19 better experience, lower costs. Redesign of 20 care programs for people over time to 21 accomplish that. And so we think that this 22 information environment is really essential to

	Page 144
1	make that happen. The redesign of care is
2	essential, and the patient-reported outcomes,
3	as part of the information environment, is
4	critical to that.
5	So, lessons learned and a few
6	recommendations. A small comparative study
7	was done at the Spine Center and the
8	Rheumatoid Arthritis Registry in Sweden, and
9	the results are published in a paper that was
10	published a couple years back. And in this
11	small series of patients, as we thought, in
12	Mass General Hospital, patients tended to be
13	positive about giving their information. In
14	this case, 84 percent were positive about the
15	use of the patient-reported outcomes. A
16	statement visit became very helpful, thorough,
17	and informative.
18	Providers' reactions are mixed,
19	and in general when the provider is actively
20	using the information, it allows the patient
21	to become more involved in their care.
22	"Patients get more involved in their care" is
	Page 145
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1	a quote. It changes how health care is
2	delivered, and there can be a real shift in
3	the relationship when you're using the same-
4	page care approach. We're now together
5	looking in on my health outcomes and what we
б	might do best next. And so it can change how
7	care is delivered, and that can usually often
8	be appreciated by clinicians, and sometimes
9	not, because it is different.
10	Sustainable and replicable. We've
11	been going for a decade at Dartmouth in a lot
12	of different clinical programs. Some
13	recommendations are on the right, and this is
14	to make these kinds of systems work in busy
15	places.
16	Here's five suggestions. Fit the
17	PROs into the workflow, to make it easier for
18	patients and providers to do the right thing.
19	Co-design the system with stakeholder input
20	for best end user utility. It's got to be
21	useful for the patients and their families.
22	It has to be useful for the clinicians and the

	Page 146
1	clinical teams. You can't just throw it over
2	the transom.
3	Educate the patients and the
4	providers on how to use the PROs. And the
5	providers have to pay attention to the data,
6	because if I've taken the time to report and
7	it's ignored, as a patient, you're
8	disrespected, and what was the purpose of
9	this? And so the clinicians using the
10	information is critical. Capture data from
11	other sources to improve the utility of the
12	information and then make it better over time.
13	So, thank you.
14	DR. PAWLSON: Thanks very much.
15	It's interesting, again careful planning and
16	dissemination, and also use in terms of
17	payment enhancement, potentially, again, in
18	the clinical care of the patient and in rapid
19	learning feedback research. And I think
20	having all three of those things as power in
21	this is to me, at least, more than sufficient
22	reason to be doing this. So hopefully these

	Page 147
1	two, I think, very well-honed presentations
2	have raised a number of issues and questions.
3	And we'll start with the expert panel.
4	Yes?
5	DR. BASCH: Thanks for those great
6	presentations. Ethan Basch again, Sloan
7	Kettering. Something interesting that's
8	alluded to in these presentations is that the
9	collection of patient-reported outcomes in
10	practice itself, that very act, can be
11	considered as a quality measure or a
12	performance measure, right?
13	So it's a different way to think
14	about it. One way we could look at your
15	examples is to say "Okay, you've demonstrated
16	the feasibility of measuring various
17	outcomes," but another way is to think of the
18	integration of PROs into clinical care as a
19	structural process measure, which is another
20	interesting way to think about it, if we
21	believe that integrating these into practice
22	does enhance the delivery of care and the

	Page 148
1	ability of practitioners to self-understand
2	and benchmark themselves against other
3	practitioners, and thus continuously improve
4	their performance.
5	DR. PAWLSON: Sort of just like
6	ordering a statin, or a lipoprotein, or
7	something.
8	Next?
9	DR. KAZIS: I'll keep the mic a
10	little further away this time.
11	I thought the presentations were
12	great. Having worked with clinicians for many
13	years who were on the front lines and are
14	dealing with the complexities of care, the
15	demands that are on them, the issue is
16	information overload.
17	And I've talked to a number of
18	clinicians given the electronic medical record
19	that are really frustrated, and find that the
20	information is often redundant. It's dated.
21	It doesn't convey what they really need. They
22	really don't have easy access to different

	Page 149
1	parts of the electronic record. It becomes a
2	real challenge.
3	With new information that we're
4	talking about in terms of patient-reported
5	outcomes, how can we compel the doctors to
6	better understand the importance of this
7	information, so that in fact they're going to
8	use it, rather than tossing it in the
9	wastebasket?
10	DR. MORT: I think that's a really
11	great question, one that I hope will be
12	remedied by the change in the way we deliver
13	care, and will be delivering it more so under
14	ACOs and payment systems that are captitated,
15	global payment, that sort of thing.
16	Patients come to me. One patient
17	came to me last Wednesday. She said "Dr.
18	Mort, how come we still have 20 minute annual
19	exams? Aren't you a pioneer ACO, and aren't
20	you doing all these" because she reads, she
21	knows how we're doing at Blue Cross and
22	everything.

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Page 150 I said "Well, not yet. 1 We're 2 working towards that." But she's absolutely right. She's a health care consultant. 3 She's 4 absolutely right that we need to change the 5 way we actually deliver care to make more access to group visits, patient portal, using 6 7 non-physician providers, non face-to-face 8 visits. 9 So we can't do it in the current 10 20 minute, or 15 minute, or even half an hour, an hour, face-to-face visit. That's just not 11 12 adequate to deliver all the care, and absorb and react to all the data. So we're a little 13 bit out ahead of it, I think, but I think the 14 answers will be forthcoming as care redesign 15 16 ensues and more and more practices figure out 17 how to do it. 18 DR. PAWLSON: And I noticed you 19 were using graphs and stuff, and that's 20 another way. The whole way we display data --21 you know, I was also on the plane, and I was 22 looking at the difference between an old 757

	Page 151
1	and a brand new 737-800, and the display
2	panels are just totally different. And I
3	would guess that pilots get a heck of a lot
4	more information the right way in the new
5	cockpit. So that's a nice, I think, thing to
б	think about, is how we deliver information.
7	I think we want one more question
8	from the audience, and then can you unmute the
9	phones to see if we have any phone questions?
10	So first, I saw somebody back one more
11	expert, and then somebody in the audience. I
12	saw a hand.
13	DR. GAGE: Barbara Gage,
14	Brookings. I found the presentations very
15	interesting. I did have a question for Gene,
16	and one of the outcomes was a very important
17	outcome. It was a two-year out outcome. How
18	did you collect that from the patient, and in
19	your comments about sustainability, is that
20	something that you have on an ongoing basis?
21	And if so, how are you funding it, or doing
22	it?

Page 152 DR. NELSON: Those particular 1 2 results were part of this larger NIH-sponsored trial, so people were followed up in that case 3 as in a research study. We had a meeting last 4 5 week with the ortho group, and the issue was "Let's make sure that we attain 90 percent 6 7 baseline PRO data, and 80 percent follow-up 8 PRO data for at least two years." That we 9 have to do this, it's important for our ability to, again, provide care and measure 10 the results. 11 12 And so that becomes the design 13 challenge, to get the work processes and the 14 patients and clinical teams engaged enough, and the design good enough, that we get 90 15 16 percent intake and 80 percent follow-up over 17 two years. DR. PAWLSON: Isn't that close to 18 19 the British experience? 20 DR. NELSON: And to get at that, 21 it's a mixed-methods approach whereby portal 22 at home, possibly IVR has been mentioned,

	Page 153
1	iPads in the office for people that can't
2	report that information, advance scheduling
3	those people 30 minutes early to complete the
4	essential information, so that everything
5	works well.
6	DR. PAWLSON: And two years may be
7	a bit of a stretch, but the British actually
8	base payment on getting responses from
9	patients in the three to six months post-
10	surgical, so there are some levers out there.
11	I think we had one question back
12	in the audience? Go ahead.
13	MS. MASTANDUNO: Melanie
14	Mastanduno from the Dartmouth Institute. Just
15	one point to add to Gene Nelson. Those
16	orthopedic providers were very keen on having
17	some of their clinical team staff participate
18	in the review of the responses, so that
19	screening for positive results that land on
20	the doc's desk are the ones that are part of
21	the workflow, as opposed to noting the results
22	and integrating them into the record.

	Page 154
1	So screen for positives, and that
2	will reduce burden on the physician.
3	DR. PAWLSON: Thank you all very
4	much, and thank you to the panel. That was
5	very well done.
6	MR. CUNNINGHAM: Real quick, just
7	want to check with the operator. Do we have
8	anyone else on the queue for questions or
9	comments?
10	(No response.)
11	MR. CUNNINGHAM: Operator?
12	OPERATOR: Once again, if you
13	would like to ask a question, please press
14	star-one on your telephone keypad.
15	There are no audio questions at
16	this time.
17	MR. CUNNINGHAM: We do have one
18	quick question from the back.
19	MS. LENTZ: Thank you. Lisa
20	Lentz, CMS. I did have two questions, one for
21	Elizabeth and one for Gene. For Elizabeth, I
22	wondered if you could just elaborate a bit

	Page 155
1	more on the process for involving patients in
2	the selection of the domains and the measures.
3	And for Gene, I wondered if you could
4	elaborate more on how you've translated
5	economic data, such as QUAL-Es, into something
6	easily understandable to consumers on the
7	website.
8	DR. MORT: Involving the
9	consumers, patients, was really interesting,
10	because the first couple of focus groups we
11	held, we even had difficulty as focus group
12	facilitators it wasn't me, it was people
13	who were trained focus group facilitators
14	describing what we were trying to get at, in
15	terms of quality of life and outcomes. And
16	what was informative was that patients weren't
17	even thinking about it that way, because no
18	one had ever broached it with them and asked
19	for their thoughts.
20	But once they got it, we just had
21	you know, we did it through focus groups
22	and trained facilitators, to get people to

	Page 156
1	vocalize on what they thought was important.
2	And that's pretty much the methodology: focus
3	groups a couple of times for each one of these
4	projects.
5	Your question raises a question
6	for me, as to how are we going to do that on
7	an ongoing basis. So thanks for asking the
8	question.
9	MS. PACE: Okay. Could we have
10	our next panel come on up? We'll have to,
11	maybe during the lunch break, get a chance to
12	ask more questions.
13	DR. NELSON: Well, I'd like to
14	just answer this other question.
15	MS. PACE: Okay. Go ahead.
16	DR. NELSON: The question about
17	QUAL-Es on the website. We did not put the
18	QUAL-E, just as the cost data, on the website,
19	at this point. It's pretty complicated. But
20	what is on the website is an estimator of, if
21	you have a procedure or not, what your
22	expected out-of-pocket and insurance expenses

	Page 157
1	are going to be. So there is that kind of
2	proactive cost information. Satisfaction is
3	there, yes.
4	DR. BASCH: Hi again, I'm Ethan
5	Basch, Memorial Sloan Kettering Cancer Center.
б	I'm an oncologist and an outcomes researcher.
7	I run a research program focused on
8	informatics and patient-reported outcomes. I
9	am delighted to be here. Thank you very much
10	to the organizers for this invitation, and
11	many of us here are quite excited to see this
12	topic being discussed with such methodological
13	rigor.
14	I also stand between you all and
15	lunch. I often find myself in this position
16	at meetings, probably because I'm a New Yorker
17	and I talk fast. So you know, I can just
18	speed us along. We have a little over an
19	hour, and so I'm just going to set up our
20	session here very briefly, and then hand it
21	over to our panelists.
22	So, understanding the patient

	Page 158
1	perspective, or their experience with care,
2	involves more than just developing a
3	questionnaire. It's really a whole package,
4	right? It's the questionnaire, but also the
5	way that it's administered, the way that it's
6	interpreted, and then how it's acted upon.
7	Our panel now is going to focus on
8	the second piece of this: how the
9	questionnaire is actually administered once
10	it's been developed. And this is vitally
11	important for a couple of reasons. The first
12	is that how instruments or questionnaires are
13	administered can actually affect the
14	information that you get back, right? How you
15	ask the question affects the answer that you
16	get, and we really need to be very careful
17	that we don't alter the meaning of what we're
18	getting back.
19	But the second reason, which I
20	think is actually the most important, is
21	around missing data, missingness. There is a
22	real risk in real-world populations of having

	Page 159
1	systematic missing data that's not at random
2	from particular populations: populations at
3	risk, populations who are traditionally
4	underrepresented or hard to reach, those who
5	are the sickest. Oftentimes, the patients
6	whose perspectives we may care about
7	particularly. And if we're not careful in the
8	way that we administer our questionnaires, we
9	can exclude those patients and lose their
10	perspective.
11	There's another issue, which is
12	that practices that are particularly good at
13	eliciting responses from their sickest
14	patients may actually look worse than those
15	practices that actually don't get as many
16	responses back from their sick patients. So
17	there are all sorts of biases that can be
18	introduced by the way the questionnaires are
19	administered.
20	So our panel is going to focus,
21	really, on three broad conceptual areas around
22	administration of questionnaires. The first

	Page 160
1	are methodological issues. Methodological
2	issues are things like the mode of
3	administration. We've heard a little bit
4	about IVRS automated telephone administration,
5	there's web administration, good old fashioned
6	pencil and paper.
7	There are true scientific or
8	methodological issues that are related to
9	mixing these up within a population, to
10	developing a questionnaire in one mode and
11	then converting it, or looking at equivalence
12	in another mode, and so on.
13	There's an area of increasing
14	interest called CAT, or Computerized Adaptive
15	Testing. David Cella's about to give us a
16	demonstration of this in action using an
17	electronic questionnaire, so I'll leave it to
18	that, and it will also be discussed by one of
19	our panelists.
20	And then the second issue is
21	feasibility. So particularly with a very
22	large implementation, in a large population,

	Page 161
1	substantial infrastructure has to be
2	developed. Personnel need to be trained and
3	put in place. This can be cumbersome. It can
4	be complicated. And it needs to be
5	sustainable. And there are real barriers and
б	lessons to be learned from other contexts, so
7	we'll be highlighting those.
8	And then the third issue is around
9	community or population engagement, patient or
10	person engagement. And this really has to do
11	with enlisting populations as our partners.
12	As we've heard already, there are focus group
13	approaches, but there are also community
14	outreach approaches. With some of these very
15	large engagements, there's a real need to
16	engage people or patients as our active
17	partners. So, methodology, feasibility, and
18	patient engagement.
19	We have three learned panelists
20	today. I won't belabor their introductions.
21	Their full bios are in the distributed
22	materials. We have Lewis Kazis from Boston

Page 162 University. He's a professor of health policy 1 2 and management who directs the Center for Assessment of Pharmaceutical Practices. 3 We have Richard Bankowitz from Premier Health 4 5 Care, who is the chief medical officer, an internist and an informaticist. And then from 6 7 the Patient-Centered Outcomes Research 8 Institute, Lori Frank, who's the director of 9 patient engagement research. 10 I'll stop there, and once again introduce Dave Cella, my old friend, who's 11 12 going to give us a demonstration of CAT in action for about 20 minutes. 13 14 DR. CELLA: It's me again. Thank 15 you, Ethan. This is going to be the densest, 16 most technical part of the day, so bear with 17 me. 18 Before I get to CAT, I thought I 19 would come back to the paper and review some 20 of the key points made in the paper for those 21 of you who might be seeing or hearing some of 22 these things for the first time. Reminding

	Page 163
1	you this is a session for methodological
2	issues, so forgive me in advance for getting
3	into what might seem like some technical
4	details.
5	So I'm going to talk about method
6	and mode of administration, and also the
7	source of data. And it's important to get
8	into this to some degree, because decisions
9	have to be made about the method by which you
10	get these data, and there are costs and errors
11	associated with surveys, however you go about
12	doing them. It's important to select the most
13	appropriate method for a particular question,
14	and to try to stick within that method when
15	possible. We can come back to that.
16	And most of all, know the impact
17	of a particular methodology that you're using
18	on errors and costs. Methods and modes differ
19	along various dimensions, which the paper
20	covers; that is, the degree of interviewer
21	involvement from none to complete, sometimes
22	something in between, the level of interaction

	Page 164
1	with the respondent, or the person providing
2	the information, the channel of communication
3	that gets used, and also the degree of
4	technology.
5	One way to look at that is to
б	start from the source, so the source is either
7	going to be the person himself or herself, or
8	a proxy or observer on behalf of that person,
9	usually selected as a second choice, but
10	sometimes an essential one. And then mode, in
11	this context in the paper, at least, we
12	referred to mode as the recorder of the
13	information.
14	So if the person is providing her
15	information directly on a piece of paper or on
16	a computer screen, that's self-administration.
17	If the information is collected by talking to
18	another person, that's interview-administered.
19	We'll use that distinction for mode for this
20	context, at least. And the method, then,
21	would relate to whether you get that on paper,
22	whether you get it on a computer, or over the

Page 165

1 telephone.

2	So, proxy reporting. What are the
3	pros and cons? It's useful, particularly when
4	it's difficult, or not even possible, to
5	obtain PROs directly from the patient. It
6	allows, therefore, broader inclusion and a
7	more representative range of patients. It
8	minimizes the missing data problem that Ethan
9	alluded to, increases the feasibility of
10	longitudinal assessment, because you may be
11	able to start with patient self-report, but
12	then need to move to proxy, which is better
13	than moving to nothing.
14	And so in that regard, proxies can
15	substitute, or they can complement, patient
16	assessment. There are situations where you
17	might want both to be done concurrently. That
18	may be a luxury in some settings, but it's
19	something that a strong case could be made for
20	that. You can involve proxies to assess
21	patients as they think the patient would
22	respond; that is, the proxy responding for

	Page 166
1	what they would believe, if the patient were
2	asked the questions, what the answer would be,
3	versus the proxy giving his or her own
4	perspective on the patient, which can be
5	different than what they think the patient
6	would say. "I think my husband would say he's
7	just fine cognitively, but I've noticed
8	slippage" would be an example.
9	Evaluating agreement between
10	patients and proxies is something that can and
11	should be done. Usually in the literature
12	there is better agreement it's never great,
13	but there is better agreement when the rating
14	is of something observable, like physical
15	function or activities of daily living, being
16	able to do things or function in the world,
17	and less agreement when it's about something
18	mental or in the social realm, such as pain or
19	cognitive status and emotional status.
20	The magnitude of the disagreement
21	can be minimized with careful attention, but
22	keeping in mind that disagreement between them

Page 167 sometimes is actually useful, as I alluded to 1 2 earlier with the example of someone with early cognitive impairment. 3 So, how about mode, that is, the 4 5 recorder? So, let's just consider the objectives of the assessment, and then the 6 7 resources that you have available. So, there 8 are advantages to self-administration. One is 9 cost. You don't have to pay an interviewer. 10 You often get better disclosure, or more disclosure of issues and problems on a non-11 12 interview self-report, and people can proceed 13 at their own pace. 14 Disadvantages are that there's more potential for missing data, and it really 15 16 does require that you have up-front careful attention to survey design, using best 17 practices in survey design, because it's very 18 19 easy to do bad surveys, and not so easy to do 20 good ones. 21 Interview administration has 22 advantages of allowing you to not worry so

	Page 168
1	much about survey design, because the
2	interviewer can make up for the problems in
3	the design, and it's useful for patients that
4	have reading problems or writing problems or
5	vision problems. The disadvantage is, of
6	course, the cost and the potential for bias,
7	because the interview is a social exchange,
8	and in that social exchange that can influence
9	the way people report how they're doing. And
10	they tend to under-report in an interview,
11	compared to self-administration.
12	Concerns about the effects of mode
13	on data quality. So, the reliability is
14	actually high for both. That's good news.
15	Response effects tend to favor self-
16	administration, but they're inconsistent. We
17	weren't asked to make a recommendation, but if
18	I were I would recommend, when possible, self-
19	administration over interview.
20	Just to kind of run through this
21	fairly quickly, the paper and pencil versus
22	electronic, if you consider electronic to be

	Page 169
1	either by computer or by telephone and of
2	course, there's a range of electronic
3	administration options.
4	Paper and pencil has low start-up
5	costs but more downstream cost issues related
6	to data entry errors, scoring challenges, and
7	getting it incorporated into electronic health
8	records. So you may save money up front but
9	lose it later.
10	Electronic has advantages of being
11	interactive, very practical, more integrated,
12	easy to incorporate into the electronic health
13	record, but there's the up-front cost that's
14	incurred by setting up electronic data
15	capture.
16	There is a potential for
17	differences between paper and pencil versus
18	electronic based upon things like the
19	impersonality of the method, the cognitive
20	burden on the patient, who may find it easier
21	to use the tablet I find it interesting
22	that we use the word "tablet" in the medical

	Page 170
1	setting for small computers Control over
2	the questionnaire, which can be more easily
3	managed in some settings when it's paper, and
4	communication style.
5	The increasing evidence of
б	evidence equivalence is encouraging. That is,
7	there aren't a lot of differences between
8	different methods of administration. As new
9	methods are developed, it's critical to
10	compare them to existing methods.
11	Probably the most vulnerable is
12	telephone interview administration. First of
13	all, for example, getting an in-clinic
14	assessment and then having people call up on
15	the phone and get information later is the
16	most vulnerable to having a systematic bias,
17	where you look like you're improving because
18	you're having that social exchange. But apart
19	from that, if you're careful about the
20	longitudinal picture, you can minimize if not
21	reduce this bias. And across these methods,
22	patient privacy is always a concern.

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1	So we looked at this, and PROMIS -
2	- now, PROMIS, to those of you who don't know,
3	is the Patient-Reported Outcomes Measurement
4	Information System. It's a large, nearly 100
5	million dollar investment over an almost ten
6	year period from the NIH to develop generic
7	but responsive patient-reported outcome tools
8	in various domains that cut across multiple
9	chronic conditions.
10	And within that project I'll
11	say more about it later with the CAT demo
12	we looked at a mode of administration, or
13	method of administration by this paper's
14	terminology, study, comparing paper and pencil
15	to computer to IVR, Interactive Voice
16	Response, and to PDA, to handheld device or
17	smartphone.
18	And we found, happily, that there
19	were no meaningful differences found between
20	modes of administration. Now, interestingly,
21	remember what I said earlier about interview
22	tending to boost up scores. The IVR was done

1	Page 1/2 by a computer. And this is my belief; it's
2	not something we can prove. But I believe
۔ ۲	that the reason the IVR was equivalent to
5	paper and pongil and computer which is great
4	paper and pencii and computer, which is great
5	news for PROMIS, is because the respondent
6	knows it's not a person they're talking to.
7	They know that they're interacting with a
8	machine, and therefore they're treating it, I
9	believe, more like an impersonal exchange, and
10	they're providing information. So it was not
11	a live interviewer.
12	This less than one and a half
13	points on a hundred point scale just
14	illustrates that the vertical dotted lines
15	represent what would be, even in the most
16	conservative sense, an important difference of
17	two points. That's two tenths of a standard
18	deviation either side of the average. The
19	estimates, whether you're comparing PC to
20	paper and pencil or to IVR, or to PDA, for
21	fatigue, physical function and depression were
22	always virtually identical to the PC

Page 173 1 administration. 2 And I think this came up earlier, as well, and somebody alluded to it. 3 We did ask what they preferred, and people preferred 4 5 the computer administration. They like it, and I agree that our experience with tablets 6 7 is quite positive. They're really easy to use 8 for people that you might otherwise have 9 literacy concerns about. 10 So how about the setting? Get it in the clinic, get it at home. One of the 11 12 bigger problems is mixing the two. Although it can be done, it should be done with 13 14 caution. The strengths of getting it in the clinic are you're getting the real-time 15 16 assessment, it's easy to implement electronic administration because you can feed it right 17 into the electronic records. 18 19 The limitations were, as we heard 20 earlier, impact on clinic flow, interruptions 21 in the assessment based upon clinic flow. We 22 once had a study that we couldn't get done in

Page 174 the waiting room because they were so 1 2 efficient hitting one of their other performance measures, and not having long 3 waiting times, that the waiting time we 4 5 anticipated to fill out the questionnaires wasn't there, so we got missing data because 6 7 of the group hitting on the waiting time 8 performance. And patient distraction, anxiety 9 can be a problem in clinic, as well as staff burden. 10 In the home setting, the strengths 11 12 are that it minimizes impact on clinic flow, minimizes staff burden -- so, sort of the 13 14 opposite strengths on the home side. But there are limitations to accessibility and 15 16 privacy and security and patient safety of an anxious patient, or if an alert comes up and 17 the patient's at home, you have to engineer a 18 system to take care of that. 19 20 Last couple of things. Ethan 21 mentioned missing data and how to manage that. 22 There was a fair amount in the paper about

i i	
	Page 175
1	that. I'll just say that there can be bias
2	introduced by missing data. There often is
3	bias introduced by missing data. I won't go
4	through the methods to do that, to help enable
5	some time for discussion.
6	And there can also be this
7	influence of, over longitudinal assessment,
8	patient adaptation or even response shift,
9	where the patient's own sense of what a number
10	means on a scale changes over time.
11	And you may then think that you've
12	measured change, when in fact you're actually
13	measuring the patient's internal barometer for
14	what an 8 means on pain, because they never
15	knew what a 10 could be until they had a 10,
16	and so now their former 10 is now an 8, as an
17	example.
18	So this leads into the CAT demo.
19	Most things that you've used in the past, and
20	we've all used in the past, have been built on
21	classical test theory, which estimates a
22	person's level based upon a summing up of all

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1 the questions they answer, like the way the 2 SF-36 is scored. And that produces a test-3 dependent measure. You have to ask all the 4 questions, and you really are dependent on 5 administering that entire test.

Item response theory is test-free. 6 7 You can create different tests from pools of 8 questions and estimate the underlying thing 9 that you're measuring, whether that's pain, or 10 depression, or fatigue, physical function, et It enables you to do a customized 11 cetera. 12 assessment that includes Computerized Adaptive Testing, in which you can tailor the questions 13 14 to the individual that you're measuring. 15 So you can have shorter questionnaires that maintain good precision or 16 17 accuracy, even at the individual level, and 18 you don't have to have those long tests to do 19 And patients don't have to complete the it. 20 same sets of questions along the way. Thev 21 can have different questions administered at 22 different times, if you prefer to have that,

Page 177 1 or if the CAT selects that. 2 So the demo, this is just to give you the framework for PROMIS, this divide into 3 4 physical, mental and social health, and then 5 within each of those areas there are as many as 40 different banks across pediatrics and 6 7 adult, on the physical side measuring symptoms 8 and physical function, on the mental health 9 side measuring various affects, principally 10 negative affect but evolving positive affects, behaviors and cognitions, and on the social 11 12 health side measuring social relationships and social function. 13 14 So I mentioned this pool of They're calibrated. If you have 15 questions. 16 a calibrated set of questions, meaning that 17 every item is a measure of that underlying thing, that underlying trait, that's called an 18 19 item bank. And when you have an item bank of 20 calibrated questions, any subset, including 21 one item from that bank, can be used to 22 provide a score for that domain. I think that

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1	has a lot of possibility in this kind of
2	setting, where you might want to have
3	provider-based measures of something like
4	depression or fatigue or physical function
5	that don't require long assessments.
6	The metric for PROMIS is a T-score
7	metric with a mean of 50, standard deviation
8	of 10. It's referenced to the U.S. general
9	population, 2000 census demographics.
10	So the tools from PROMIS are
11	derived from item banks. They involve
12	Computerized Adaptive Testing, which is a
13	dynamic testing I'll show you an example of
14	that using fixed-length forms, or you can
15	do health profiles of 29, 43, and 50 item
16	length. And then there's this global health
17	index that Dr. Mort mentioned earlier, which
18	is 10 items measuring physical and mental
19	summary scores.
20	Okay. So, here's how the CAT
21	works. We assume from the beginning
22	remember, it's referenced to the general

Page 179 population, mean of 50, standard deviation of 1 2 10, so that's what's represented in the lower panels, here. That's a distribution of around 3 50, a normal distribution of depression we 4 5 assume in the general population. So we're just going to assume that any given person at 6 7 the start of a test has a score of 50, and 8 there's a large confidence interval around 9 that score. 10 The best item in the depression bank to start the CAT is, lo and behold, the 11 12 question over in the top right, "I felt 13 depressed." And then the answers are never, 14 rarely, sometimes, often, always in the past 15 week. 16 The curves you see in the top 17 right show you the probability of responding 18 never, that's the black, rarely, that's the red, sometimes, that's the green, often, 19 20 that's the blue, and then always, that's the 21 light blue. So the probability of responding 22 each of those answers increases as you get

	Page 180
1	more depressed, so the more depressed you are,
2	the more likely you are to say you're
3	frequently depressed.
4	And the lower plot shows you how
5	much information that item has on that same
б	metric. So it asks that question, the person
7	gives an answer. And now we'll just run
8	through the first question, the first answer.
9	The person says "rarely." That statement has
10	a T-Score of 52, the standard error's a 4, and
11	finds the next question that's going to be
12	most informative, in this case "I felt like a
13	failure." You see the response characteristic
14	curves and the information curves that the
15	computer knows. That's why it picked that
16	question.
17	The person says rarely, it
18	estimates the score of 53, a little more
19	depressed. Standard error goes down to 3.
20	Then it picks the next question, "I felt
21	worthless," says rarely, and then estimates
22	55, standard of 2.
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1	Now, we can go on and on, and if
2	you keep going that's three questions asked
3	so far. If you keep going on, it goes on to
4	eight questions, but you'll see the estimate
5	didn't change really much at all, vastly,
6	between 54 and 55. So we asked eight
7	questions, but really only needed to ask three
8	in this case, and got the same estimate. So
9	with three questions, got a very precise
10	estimate of this person's depression. That
11	takes about 15 to 20 seconds.
12	Now, the last couple of things
13	that I want to show you because I think it's
14	pretty germane to this discussion. We have a
15	fatigue item bank as well in PROMIS, and you
16	can imagine these different programs in
17	cancer, arthritis, heart failure, joint
18	replacement, pain management, using different
19	methods, different items, CAT's different
20	short forms. You're going to get the same
21	metric and the same meaning.
22	The PROMIS investigators did this

	Page 182
1	in a research setting in COPD, heart failure,
2	low back pain, depression and cancer, and in
3	each case measured fatigue, so I'll show you
4	the fatigue example. And this is an
5	animation, so you've got to kind of go quickly
6	through it.
7	So it starts, remember, with mean
8	of 50, standard deviation of 10, to remind you
9	of that. COPD patients starting over at the
10	lower case, stable are around 56, exacerbators
11	are around 63, and patients that go from
12	exacerbation to stable actually, lo and
13	behold, go from 63 down to 56, which you'll
14	see down there under the dotted line. Heart
15	failure transplant patients start at around
16	58, and drop down to around 47.
17	Depression patients start up over
18	60, more than a standard deviation, and get
19	better with regard to their fatigue when their
20	depression is treated, after one month and
21	then after three months. And now back pain,
22	the same thing with back pain. So in all

	Page 183
1	these cases, you have different clinical
2	areas, but the same metric on fatigue, being
3	able to compare changes.
4	You see, they're all starting more
5	fatigued than the general population, and all
6	moving in the right direction after treating
7	the clinical problem. Same thing with cancer,
8	but we'll move ahead.
9	This is the last concept I want to
10	put forward, because I think it's also pretty
11	relevant to what we're looking for in this
12	context, and that's a PRO Rosetta Stone, or
13	PROsetta Stone, which is a project that we
14	have to link many of these different measures
15	PH29, CESD with the PROMIS depression
16	measure, as an example. We've done that. We
17	haven't published it yet.
18	And therefore, you can express
19	you can administer the PH29, you don't have to
20	give that up. But you can express it as a
21	metric. We heard earlier from Dr. Burstin
22	that NQF does not endorse the instruments;

Page 184 1 they endorse performance measures. This is a 2 way one could think of it, that this metric of the mean of 50, standard deviation of 10, 3 referenced to the general population, is a 4 5 potentially endorsable metric that you can get 6 by asking PROMIS questions, or PH29 questions, 7 or CESD questions, but you're putting them on 8 that common metric I showed you with fatigue. 9 This is a sample from work that we've done, comparing a fatigue questionnaire 10 that we developed earlier in the cancer 11 12 setting to the PROMIS fatigue T-Score. You can look them up and use these in your 13 14 reporting. 15 I think that's the last slide. 16 Thank you. 17 DR. BASCH: Thank you. Great. In the interests of time, we're going to move on 18 19 to our first speaker. Lewis Kazis, why don't 20 you come up to the podium to speak, so folks 21 can see you? 22 And while you're coming up, I'm

	Page 185
1	reminded to mention that, in addition to
2	PROMIS, which is an NIH initiative, there is
3	also a second government initiative under the
4	NCI called PRO-CTCAE that some of us in the
5	room have been involved with, that uses some
6	advanced methods to develop questions to allow
7	patients to report on issues related to
8	adverse events, or safety and risk, for anyone
9	who's interested.
10	DR. KAZIS: Thanks, Ethan. I just
11	want to mention that it's a delight to be here
12	today, in a conference that's really dear to
13	my heart. I've been involved in the use of
14	patient-reported outcomes in their
15	development, in the methods, and in their
16	implementation in the context of performance -
17	- for more than 25 years. And in fact, BU
18	just gave me a clock for being at BU for 25
19	years, so that sort of reminded me how long
20	I've been at it.
21	What I wanted to mention before
22	going into what I was charged with talking

	Page 186
1	about today was that the VR-36 and the VR-12
2	were developed in the VA under the support of
3	the Health Service Research and Development
4	Service. And the VA, I think, has been at the
5	forefront of patient-reported outcomes and
6	performance measures for many years, going
7	back at least 20 to 25 years, when in fact
8	performance measures in the VA took on real
9	import in terms of VISNs and their
10	organization and resource allocation, and so
11	forth. And I think the whole move in that
12	direction began with Ken Kaiser, who was in
13	fact the founder of this organization.
14	So the VR-36 and the VR-12 have
15	been adopted by the VA in terms of some of the
16	assessments that they're currently doing and
17	have done historically in the area of
18	performance, and have been adopted by CMS and
19	the Medicare Advantage program specifically in
20	terms of principal endpoints in their
21	evaluation. The VR-12 is now used in
22	highlighting those particular plans in a

Page 187 particular two-year cycle that are either 1 2 negative or positive outliers. We've also recently developed and 3 4 published a utility metric that's generated 5 from the VR-12 that allows one to begin to look at cost-effectiveness in the context of 6 7 plans, so that information is out there. And 8 also, it's in the public domain, and free of 9 charge, in terms of algorithms, imputation, and contextual fixes, as it has been supported 10 by the federal government over many years. 11 12 So my charge today was to talk about the issue of bridging measurement tools, 13 and the very first slide is what I consider to 14 be a binding framework for the use of legacy 15 Those are the historic measures 16 measures. that David Cella talked about, and relate 17 18 specifically to a set of items in a particular 19 questionnaire, like the VR-12. 20 Just to mention that the IRT 21 approaches have informed legacy measures, and 22 have been, I think, an important methodologic

Page 188 advance in terms of allowing us to perfect and 1 2 come up with even more precise legacy tools. 3 And clearly, I think the legacy measures have informed the development of item banks, as 4 5 they have been used in the context of CAT, the Computer Adaptive Test. And clearly, I think 6 7 this becomes a very important aspect. 8 So there is clearly synergies 9 between legacy measures, IRT, and the item 10 banks that they have helped to inform. Ι think as we move forward, the more bridges 11 that are established between legacy measures 12 and item banks, the better. 13 14 As I see it, there's no real silver bullet in terms of any single 15 16 assessments, or even bank of assessments, that 17 will work totally in terms of the complexity 18 of our health care system, and I think one 19 needs to move in the direction of bridges 20 that, in fact, tend to combine the use of 21 assessments that, in fact, have been used for 22 many years, the legacy measures, and the newer

	Page 189
1	CAT models that are out there.
2	So I'll just mention a couple of
3	points in terms of what I consider to be the
4	advantages and disadvantages of the legacy
5	measures, and then talk very briefly about the
б	IRT CAT measures.
7	The legacy measures have been
8	extensively tested for reliability and
9	validity across many settings, over many years
10	and populations. A good example is the VR-12,
11	which has now been administered to well over
12	5 million individuals in the VA, outside the
13	VA, in terms of CMS and the Medicare Advantage
14	program, and in other systems of care. In an
15	average week, I receive about six requests for
16	the VR-12 with their scoring algorithms.
17	Fewer resources now are needed to
18	implement the legacy measures compared to CAT,
19	and that clearly is an advantage, because the
20	CAT measures do require resources in terms of
21	their development implementation in clinical
22	settings. The expertise to implement them has

	Page 190
1	matured, and they can be integrated with new
2	technologies, and have been in the context of
3	the internet.
4	Disadvantages, of course, include
5	the time to complete the instrument that David
6	mentioned. It's usually longer than the CAT.
7	Instruments are less flexible to update and
8	calibrate compared to the CAT, and they
9	require larger samples to avoid spurious
10	results.
11	If one looks at IRT and CAT, the
12	advantages clearly are, they estimate personal
13	level traits within subsets of items, they
14	usually require smaller sample sizes, and
15	they're less vulnerable to floor and ceiling
16	effects.
17	The disadvantages, I think,
18	clearly have been controversial, and some of
19	them involve the differential item
20	functioning. That calculation may be
21	problematic for multidimensionality
22	assessments, and that's where the probability

	Page 191
1	of responding in a different category varies
2	across different subgroups, given equivalent
3	levels of the underlying attribute. And an
4	example of that would be age, for example, or
5	gender, where in fact the DIF calculation may
б	not be what we would want it to be.
7	So clearly, there's no silver
8	bullet here. The IRT CAT is an important
9	methodology to be implemented, but there are
10	limitations in its use. They do require
11	front-end technology to implement the
12	instruments, and additional assistance is
13	usually necessary to facilitate successful
14	patient-technology interaction. So there is
15	a resource-intensive aspect to its use.
16	Clearly, I think, real advantages
17	are, it's useful in assessing change, there's
18	greater precision of measurement when compared
19	to the historic measures. There may be high
20	start-up costs, and the software and hardware
21	is commonly proprietary and expensive. So
22	clearly, there are advantages and some

1 disadvantages. 2 The other issue is the computer literacy of the population that one is dealing 3 with, and whether the CAT method would require 4 a population that's computer literate. 5 So one 6 has to consider populations where, in fact, it 7 may not be as advantageous. 8 So I do have more slides here, 9 which will be in your packet. When you 10 testify before the Congress, you usually say "It's going to go into the Congressional 11 12 Record." 13 So, let me summarize here. The 14 issue here is that I think there's no silver bullet in terms of one assessment tool, or 15 16 even a simple set of assessment tools, that 17 will work in the context of a very complex 18 health care system. I think hybrid approaches 19 become really necessary, that bridge legacy 20 and IRT CAT approaches for purposes of 21 application to systems for measurement 22 performance, so that's really important. Ιf

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1	you take away anything from this talk, I think
2	the issue of flexibility and hybrid-ness
3	becomes really important in terms of what's
4	adopted and what's going to be used in a very
5	complex clinical setting.
6	Mixed mode approaches are
7	necessary, so that flexibility in the
8	protocols is possible in real world settings.
9	And David Cella, I think, did an excellent job
10	talking about the different modes of
11	administration. And clearly, I think, for
12	those non-methodologists, there needs to be
13	fixes in terms of the empiric data that, in
14	fact, might be biased by whether, in fact, the
15	administration is done at home, whether it's
16	in the clinic, or whether, in fact, it's face
17	to face, whether it's through computer, and so
18	forth.
19	Those things can impact on your
20	results, and one needs to adjust for those.
21	There are contextual fixes. We've spent many
22	years developing contextual fixes in the

Page 194 development of the VR-12, so that if there is 1 2 a user out there, we have an algorithm, and those fixes can be made, so that when one 3 generates a score from the VR-12, that metric 4 5 can be considered to be reliable. 6 So, mixed mode approaches are 7 necessary, and there need to be fixes for 8 these things. And then the issue of missing data, which is a fact of life in real world 9 10 settings, adjustments for missingness is required to adjust for bias in results. 11 We've 12 developed an algorithm called the Modified Regression Estimate which, in fact, controls 13 14 for missingness. 15 So if you were to have as few, for 16 example, as three items present in the 17 administration, when you've administered the VR-12, one can generate some scores on the 18 19 basis of that. So, one needs to consider 20 that. One needs to consider the biases that, 21 in fact, would be generated as part of that 22 missingness.

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1	And that's all I have to say.
2	DR. BASCH: Great. Thank you very
3	much. So, Richard, you're up next.
4	DR. BANKOWITZ: Thank you. I'd
5	like to speak about the experience that some
б	of our premier members are obtaining in
7	implementing some of these instruments. We
8	are an alliance of 2,600 hospitals across the
9	U.S., and we try to accomplish a lot in a
10	collaborative methodology. So we now have an
11	ACO implementation collaborative consisting of
12	30 health care systems, and in that context of
13	that laboratory we are trying to gain
14	experience with some of these instruments.
15	So we're looking at a variety of
16	things. We have two of our members, Fairview
17	and Geisinger, who are looking at the
18	Dartmouth Institute Primary Care patient-
19	reported measures pilot. We have two of our
20	members who are looking at the Southeast
21	Minnesota Beacon Community and Mayo Clinic
22	patient-reported outcomes. And then we've got

	Page 196
1	three South Coast, Bay State, and St.
2	Francis that are trying to implement the
3	Dartmouth Institute "How's Your Health?"
4	We've also been approached by the Gallup-
5	Healthways, to see if we'd like to take up
6	their well-being index, but so far that's in
7	the very early stages.
8	So I'd like to report on some of
9	the very early information we're getting in
10	the use of the Dartmouth "How's Your Health,"
11	and I think that might help inform some of the
12	methodological questions.
13	So this is very early, and we've
14	got a very small sample size, but I think
15	we're getting some very interesting
16	information from it. First of all, the data
17	comes in in a variety of methods, so some are
18	filled out in the doctor's office, with paper
19	and pencil. Some are done via the internet,
20	before the patient appears. And none of these
21	three systems has anything like the
22	sophistication that Gene Nelson showed you or

	Page 197
1	that Liz Mort showed you with the data
2	infrastructure.
3	So one big problem was, what do
4	you do with the data? If it's filled out over
5	the internet, how do you even get it to the
6	physician? There's a concern about simply
7	using email that's not secure, so you need to
8	have a secure email server. One of the
9	institutions is trying to put it on their
10	portal, but then the question was, how do you
11	get it to the right physician? It's fine that
12	it's in our portal, but how do we make sure it
13	goes to the right physician at the right time,
14	so that it gets incorporated into the record?
15	None of these systems can
16	integrate with the EHR a the moment, so the
17	best they can do is scan a document and that
18	goes into the EHR as basically a photograph.
19	I mean, you can't search it or do any kind of
20	structured analysis with it. So that's a big
21	problem, just in terms of implementation.
22	But we're getting some very

	Page 198
1	interesting feedback from both the physicians
2	and the patients. Some of the feedback we've
3	had from the providers and we only have
4	three, but they've said things like "The use
5	of this instrument really establishes rapport
6	with the patient." "It gives me a jumping-off
7	point for a discussion." It helped me
8	identify patients who had inadequate knowledge
9	of their condition." "It helped me identify
10	problems at home that I was unaware of,
11	problems with their feelings and social
12	phobias," so quite a lot of information. It
13	provided risk stratification for future
14	hospitalization," so maybe identifying
15	patients of particular risk. "It enhanced
16	patient empowerment." "The patients feel more
17	included." "I can identify confident
18	patients, and vice versa."
19	And then one physician said "The
20	most value came from identifying patients who
21	felt unable to manage their help problems.
22	This was really a good use of the tool, but it

	Page 199
1	took a lot of office time." So it's not
2	necessarily the case that just having this
3	information in front of you is going to make
4	the physical faster. It often makes it go
5	longer, because you've got more issues to deal
6	with.
7	The patients had a variety of
8	responses. First of all, most of them said
9	they would recommend it to others. 85 percent
10	said they would definitely recommend the How's
11	Your Health survey to other patients. One
12	patient said "I took the survey, and I'm
13	healthier than I thought I was." And that's
14	interesting, and I think it also has
15	implications for response shift. If the
16	instrument itself is making people have a
17	different expectation of their health, that's
18	an interesting finding.
19	The patients say "I'm glad to know
20	my physician was interested in what I'm
21	thinking." "It's good to have the information
22	available before I see the doctor." "I learned

1	new things." "It gives me time to think about
2	the answers to the questions." "I think it
3	helps patients who don't ask questions while
4	they're at the office." "I liked the reading
5	materials." And then some said they wished
6	they had more ability to put explanations in.
7	So as I think about these
8	responses and they are limited I think
9	there are a couple of lessons, maybe, to be
10	learned. One, as we discuss these
11	methodological issues, I think it's important
12	that we not let the perfect become the enemy
13	of the good. And I think it really depends.
14	The first question you have to ask is "What
15	are we going to use the information for?"
16	Because that may dictate how precise we need
17	to be, and it may dictate the operating
18	characteristics of the test that are required.
19	So as I think about this concept
20	of useability, I think it's going to be the
21	most important concept as we go through the
22	measures endorsement process. So it may be

Page 201 not precise enough to say this is a 1 2 performance measure. Is it a performance measure for internal performance improvement? 3 4 Is it a performance measure for transparency? 5 Is it a performance measure to compare two institutions? I think that's an important 6 7 question. 8 And so, as I thought about these 9 responses from the physicians and the 10 patients, they tend to fall into two classes. Class one is actually dependent on the answer, 11 12 so we found some patients that are at high risk, or we found some patients that don't 13 14 know a lot about their health, and we can act on that. But then there's a second class 15 16 which is really not dependent on the answer: establishing the rapport, being more included, 17 18 having the patient feel the physicians are 19 more engaged. That takes place just by the 20 process of the instrument alone. 21 So, how would we incorporate those 22 two things into performance measures? It came

Page 202 I think of 1 up earlier as a structure measure. 2 it almost as a surgical checklist. It's something that should be done. 3 I'm not sure we would take each item on the checklist to 4 5 compare institutions. Institutions might want 6 their own running tallies, so they know if 7 they're getting better. But the use, I think, 8 is really going to be key. 9 So that's one challenge, and I 10 think the biggest challenge. The second challenge, as I think about these measures --11 12 and this has also come up today. We're moving from measures of sickness and illness to 13 14 measures of health and well-being, which I 15 think is a very good progression. But I think when we do that, we have a dilemma. 16 Because as we move to those measures of health and 17 18 wellness, we then begin to have shared 19 accountability, right? 20 So yes, the ACO, the health home, 21 is responsible for some things. But then we 22 have the school, we have the community, we

	Page 203
1	have access to fresh food and playgrounds. We
2	have a lot of items that impact health and
3	wellness. So how do we apportion that
4	accountability? It's going to be a very
5	important question. Not one of the
6	traditional methodological questions, but I
7	think a key one going forward.
8	So, I'll stop there.
9	DR. BASCH: That's great. Thanks
10	very much. So we're going to finish up with
11	Lori, and then we'll take some questions from
12	the audience.
13	DR. FRANK: Great. Thank you,
14	Ethan. So now I'm between you and lunch, and
15	also between you and the audience engagement
16	piece, so I'll move quickly through this.
17	I do want to discuss what patient
18	engagement means, how it is and is not
19	currently being implemented in the course of
20	PRO development and evaluation, with the hope
21	that reframing patient involvement in PRO
22	research can improve measure development and

Page 204 1 testing and enhance the value of PROs for use 2 in clinical settings and for performance measurement. And I use the term involvement 3 very mindfully, a point I'll return to in just 4 5 a moment. 6 PROs offer one way to capture 7 outcomes meaningful to patients. They are not 8 the only way. They don't always succeed, and 9 they're not the only way to do so, which I think is a point we all need to keep in mind. 10 When I was in kindergarten, I 11 12 remember we were promised that by the time I was in sixth grade we would have the ability 13 14 to make phone calls to people and actually see the faces of the people on the other end of 15 the phone. And I'm glad the technology is 16 finally here, but I still carry with me the 17 disappointment of all that delay, and the lost 18 19 opportunity, with the length of time it took 20 to bring that to be. And that's how I feel 21 about use of PROs generally, but method of 22 administration for PROs specifically.

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1	In the last century, I was part of
2	a panel on the promise of ePRO, I think with
3	some people here. And again, it's been a bit
4	disappointing, the rate of adoption. I think
5	that patient engagement might be a way
б	forward, and I'm particularly interested in
7	how that can apply to the tremendous
8	contribution that the PROMIS initiative stands
9	to make, if only we can get the uptake there,
10	like we need it.
11	I also want to say that I think
12	that I appreciated David Cella and his co-
13	authors' paper, with its thoughtful
14	consideration of all the methodologic issues
15	that we need to think through before going
16	full bore towards PROs in performance
17	measurement, but before we continue down this
18	track, or in keeping with the innovative
19	technology theme, the high-speed MagLev, I
20	think there are a couple of other trains that
21	need to be connected, and those would be
22	patient-centeredness and patient engagement.

	Page 206
1	In his 2009 Health Affairs piece,
2	Donald Berwick defined patient-centered care
3	as "the experience of transparency,
4	individualization, recognition, respect,
5	dignity, and choice in all matters related to
б	one's person, circumstances, and relationships
7	in health care." I think that there's a lot
8	in that definition, and a lot actually in that
9	piece, that's valuable as we consider the role
10	of engagement in improving measurement.
11	We do need to make that
12	distinction between patient-centered clinical
13	care, as he's talking about it in that piece,
14	and patient-centered research. For research,
15	we need to further differentiate between
16	clinical research and methods research, and
17	right now, as you know, PCORI is funding
18	clinical research, but we did just release the
19	funds for the methods research. And out of
20	the 50 funded projects, 11 of those dealt
21	with PROs. Nine of the 50 deal with Computer
22	Adaptive Testing or other technologies. So we

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1	are moving forward, but I think that there's
2	a role for funding agencies here in this
3	dissemination and uptake.
4	I would add to clinical care, and
5	to research, when we're thinking from a
б	patient-centered standpoint, performance
7	measurement, obviously. What is the value to
8	adding engagement to a performance measurement
9	view?
10	In their discussion about the
11	paper, about the potential for PRO use in
12	clinical care, David and the co-authors
13	mentioned patient-provider communication and
14	identifying patient needs in a timely manner.
15	I think it helps to view those
16	sorts of statements from a patient-centered
17	perspective. Improving communication is a
18	form of patient engagement, which enhances
19	patient-centeredness. Identification of
20	patient needs ensures patient-centeredness.
21	So together, the engagement and patient-
22	centered orientation, from the clinician and

	Page 208
1	from the health system, can improve health
2	outcomes.
3	And I think that was well
4	catalogued, some of the empirical evidence for
5	that, in the paper. And certainly there's
6	evidence of the value for patient involvement
7	in improving content and construct validity of
8	our measures. But I suspect that, without
9	going further, we will miss out on some
10	opportunity for some more meaningful
11	information that we could get to improve our
12	measurements. So it's an exciting
13	opportunity, and I'll say more about that in
14	a moment.
15	I just wanted to review, then,
16	principles of engagement. You heard some in
17	the quote from Donald Berwick. Trust and
18	transparency, leading to respect. Partnership
19	and collaboration, including co-learning and
20	communication. There's an inescapable
21	interactive element to patient engagement, a
22	relationship element, which is why shared

decisionmaking can be considered a form of
patient engagement.

3	So I have this virtuous cycle here
4	of engagement, as just a way to show us that
5	there's engagement in research. Right now, a
6	lot of what's happening in PRO methods
7	research is involvement, where patients are
8	subjects, but this is a giant step back and
9	showing an enterprise view of truly engaging
10	patients at all phases of the research
11	process, and not just as subjects. And the
12	idea is that there's some measurement value
13	that we can recognize with this view.
14	The next slide shows the same
15	schematic, but using performance measurement,
16	then, as the organizing principle. And there,
17	too, I think few have so far contemplated
18	we've heard from some this morning, thankfully
19	what taking this engagement view can really
20	do to improve the methods behind performance
21	management. It can really anchor us.
22	So this morning, Lisa Lentz

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1	mentioned patient attribution. I think this
2	framework can handle that. Linda Wilkinson
3	mentioned culture. Who's defining culture?
4	I think this engagement framework can help
5	with that. On the first panel, we talked
б	about walking in the patients' shoes.
7	Certainly, this is a framework that helps us
8	to achieve that.
9	How much collaboration do patients
10	really want? Nobody knows the answer to that.
11	We don't have good data. But the idea is that
12	there's an ethical argument to including
13	patients, engaging patients this way. We're
14	at the upward ends of our ability to use
15	empiricism here. I heard a lot of good,
16	empirical questions. Is clinician performance
17	improved by use of PROs, for example, one of
18	the questions raised this morning. But
19	there's the idea that we need to accept the
20	principle of engagement before we can move
21	forward for some of the methods improvement.
22	In Table 3 in the paper, it's

Page 211 1 important characteristics and best practices 2 to evaluate and select PROs as performance 3 I would suggest that we add patient measures. 4 engagement in development and testing as one 5 of those important characteristics. We still need to develop metrics for patient 6 engagement, so there's a lot of work to be 7 8 done, but I think that that would help us to 9 reframe in a positive way. 10 Under content validity, perhaps that evaluation, whether the outcomes are 11 12 patient-centered or not. For performance 13 measurement, they need not always be, but 14 asking the question might help to improve our 15 output. In the discussion specifically of 16 method of administration, the authors 17 reference patient burden. How do we know 18 19 what's burdensome to a patient? We're 20 inferring, and certainly as researchers we're 21 also patients, so we can figure this out. But 22 our special knowledge as researchers, we have

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1	to remember, might actually disadvantage us to
2	understanding the patient view. So
3	incorporating patients into the research team,
4	then, is a way around this conundrum.
5	So I'd say consider a continuum
6	from low patient input to high, proximity to
7	patient voice to distance to patient voice,
8	and think about what we're doing. A
9	psychometric evaluation study, where is it on
10	that continuum? The patients are certainly
11	providing input, but through channels that
12	have been engineered by the researchers.
13	Cognitive interviewing is bidirectional.
14	We're talking to people. It's qualitative.
15	But here, again, patients go off-topic all the
16	time, and it's actually our job to keep them
17	in the channels that we, as researchers, have
18	engineered.
19	Focus groups, another great
20	opportunity to collect patient input, and
21	there's a lot of value to be derived from it.
22	But there, too, we're missing an opportunity,

	Page 213
1	by limiting ourselves to these methods, to
2	really sit down and get the full benefit of
3	researcher wisdom plus patient wisdom
4	together. So on that continuum, then, putting
5	the patient at the center would be patient-
б	centered outcomes research.
7	A lot of barriers noted in the
8	paper for use of PROs, I think many of those
9	might be system-centric and not patient-
10	centric. Just a point to note.
11	Of interest, the authors say "For
12	those developing or modifying measures
13	according to principles of universal design,
14	they're encouraged to consult with relevant
15	experts." Well, who are those experts? Will
16	it include persons with disabilities? Is it
17	going to be about us without us, as people
18	say? But it's another excellent opportunity
19	to improve measurement through engagement.
20	One idea, then, is to create a
21	task force on measurement error and invite
22	patients to participate. Are there some

Page 214 things that we could learn about improving our 1 2 methods from the patients, that we just haven't thought to ask? I think that method 3 of administration is a great entree into this 4 5 particular type of thinking. A quick point. There were some 6 7 questions specifically about proxies. The 8 FDA, as you know, has a taxonomy of PROs, 9 ClinROs, observational measures. I think in 10 the case of proxies, we could come out with a 11 better taxonomy. There are true proxies, 12 people who really can accurately report for the individual. Some parents can really tell 13 14 when their child is fatigued, for example. There's quasi-proxies, people who can report 15 but with non-ignorable error. Then there's 16 just poor proxies, people who don't do it 17 18 well. 19 And to Mary's point earlier, I 20 think we need to always be mindful, are we 21 treating the reporter as a proxy or as an 22 informant? Someone who can have some insight

Page 215 into the patient, but not complete patient 1 2 reporting in their stead. And Ethan reminded me, too, about always going to the proxy in 3 4 the case of kids, or in my area, for those 5 with cognitive impairment and dementia, when actually there's the possibility to obtain 6 7 accurate reporting. 8 And the question here is about 9 truth. How do we know that we've gotten to 10 the truth, to the accuracy? To a certain extent, I think we've been a little lazy in 11 12 the field, and more phenomenological research, which is a form of patient engagement, can 13 14 help really get us to that truth of what's accurate. When do you need the proxy, and when 15 16 is the patient truly the accurate reporter? 17 Missingness was also raised, and 18 my only point here is that missingness might 19 be a form of revealed preference, and there, 20 too, engaging patients as part of the research 21 team could help lead us to a wider 22 understanding of causes of missingness.

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1	Some view patient engagement as a
2	shift in the power relationship. If you think
3	about it, the patient completing the survey in
4	the parking lot holds a lot of power. They're
5	going to ruin our study. They're going to ruin
6	our performance measurement. So let's
7	acknowledge the power that each party has
8	here.
9	It's a scary notion, to think
10	about giving away this power, but I think it's
11	one that's worthwhile and that can help us
12	with improving our PRO measures, and improving
13	our measurement overall.
14	DR. BASCH: That was terrific.
15	Thanks so much, Lori.
16	You know, I should mention Lori
17	and Mary Tinetti, who's here, and I, have done
18	a fair amount of work within PCORI around
19	patient engagement, including issuing a couple
20	of contracts to do a landscape overview and a
21	systematic literature review around methods
22	for patient engagement. And our conclusion at
Page 217 the end is that we really do need systematic 1 2 research on approaches to engaging populations that will be informative to the scientific 3 enterprise. I really do see a lot of synergies 4 5 between PCORI's interest here and NOF's interest here, PCORI on the research side. 6 7 So we have about 15 minutes for 8 0&A. Just to set this up before we start, we 9 really do want to focus on administration 10 We recognize that many of the themes methods. cross over to other areas, but that really is 11 12 our focus. So we have Lewis, who talked about scientific challenges, Richard, who talked 13 about implementation issues, and then finally 14 Lori talking about the special challenges in 15 developing PRO measures for performance 16 17 evaluation, because we need to actually engage 18 with those from whom we're gaining 19 information. We'll start in the front. 20 DR. FIHN: So, this isn't 21 specifically about administration, but one of 22 the themes here, at least that I've heard, is

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1	heterogeneity of multiple approaches. Is that
2	in conflict, ultimately, with sort of
3	organizational imperatives right now, in terms
4	of accountability measures? What we see a lot,
5	where we try to convey the complexity of
6	measurement, at the end of the day what often
7	trumps is comparables in a very competitive
8	marketplace, and the question of sort of how
9	those trade-offs will work out when we develop
10	a very complex and rich system of measurement.
11	And at the end of the day, for accountability
12	reasons, not for improvement reasons, but we
13	didn't name that as one of the goals here,
14	there's going to have to be some
15	reconciliation for comparability across
16	systems and organizations, or even within
17	systems.
18	So, how does this all play out?
19	DR. BASCH: From the panel?
20	DR. FRANK: I think the PROsetta
21	Stone is a great example of the way to begin
22	to really cross communicate.

	Page 219
1	DR. BASCH: Could you be a little
2	more specific about what you mean by
3	heterogeneity? Do you mean heterogeneity
4	across patients or across contexts, or do you
5	mean the measures themselves?
6	DR. FIHN: Yes.
7	DR. BASCH: You mean the measures
8	themselves. So, go ahead, Lewis.
9	DR. KAZIS: I think it's an
10	excellent question. We were involved in a
11	study done a few years ago that was published
12	in Health Services Research comparing the
13	Veterans Administration to the Medicare
14	Advantage plan. And we looked at mortality,
15	and then we looked at measures of outcome
16	using the VR-12. In that context, the VA
17	actually did better in the adjusted analyses.
18	In terms of the differences, they were quite
19	dramatic. And for those that would be
20	interested in discussing that further, I'd be
21	glad to talk about what, in fact, we
22	hypothesized as why there differences, but the

Page 220 1 VA did a lot better. 2 Now, in that context, we had the luxury of similar assessment tools across the 3 two systems. Going forward, I think that it's 4 5 going to be a real hodge podge in terms of the assessments that are used nationally, 6 7 depending on the organization and what's 8 adopted, and so forth. 9 I think what is absolutely 10 necessary is that there are adjustments that are developed to deal with those differences, 11 12 differences in assessment tools that are used. I think David Cella can speak to the IRT and 13 14 CAT, which I think will allow for item banks that, in fact, might permit comparisons across 15 16 different systems of care. 17 DR. BASCH: I think Albert had a 18 question. 19 On the topic of missing DR. WU: 20 data and biases that might come with missing 21 data, there's another thing to consider, and 22 that is that there may be biases in present

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1	data. I don't actually have any data from our
2	system on this, but I'll give you an example.
3	I was teaching a course, and we wanted to get
4	student evaluations, essentially. Student
5	satisfaction data. And we wanted to get our
6	response rate up. We always got pretty good
7	response rates. We then made it mandatory.
8	We actually gave people a point on their final
9	grade if they would turn in their evaluation.
10	And what happened to our
11	evaluations? We got 100 percent response
12	rate, and our evaluation went down, because
13	the bias is that people who are more satisfied
14	are more likely to respond. So I think the
15	idea about looking at response rates is
16	something that we do need to consider, and
17	it's just another topic.
18	DR. BASCH: That's a great point,
19	actually. I think at the next meeting we'll
20	have another presenter from the NHS PROMS
21	initiative across England, and this was
22	actually a phenomenon that they observed

	Page 222
1	across the U.K., which is there were generally
2	lower scores for provider systems that had
3	higher response rates, and they've now had to
4	adjust for response bias.
5	Do we have a question over here?
6	Go ahead.
7	DR. GANIATS: I came here this
8	is Ted Ganiats. I came here today open-minded
9	but concerned that we would not be able to
10	come up with accountability measures, and I'm
11	just really happy to say that I was right.
12	(Laughter.)
13	DR. GANIATS: And everything
14	that's been said today is just absolutely
15	fascinating and absolutely wonderful, and it
16	promotes clinical use, it promotes patient
17	engagement, and it promotes quality
18	improvement. But I've yet to see anything
19	that gets to my methodologic concern, and
20	nothing that gets to my practical concern
21	regarding accountability, as was mentioned
22	earlier.

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1	And the reason this is important
2	now is because, if we're able to limit
3	ourselves to quality improvement, that helps
4	address the methods approach that you asked
5	that we discuss during this question and
6	answer period.
7	The methodologic concern that I'll
8	just throw out is that, in general,
9	performance measures come from guidelines, and
10	guidelines come from evidence. And we are
11	bypassing the evidence, and we're bypassing
12	the guideline, and creating a performance
13	measure without the structure of a guideline.
14	So we're going to be inputting into practice
15	requirements prior to the guideline having
16	been created.
17	And if we want to do that for
18	quality improvement, that's fine. But I don't
19	think that's good for us the NQF won't, but
20	who's going to create the quality measure,
21	sans guideline, which the NQF is then going to
22	evaluate without the evidence and without the

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Page 224 1 guideline to support it? 2 It can happen. I hope it happens, and I think it's years down the way. 3 We have the phone without the vision right now. 4 But 5 for quality improvement, I think we have a lot 6 of good evidence that we should be moving in 7 that direction, and that will help us, then, 8 in selecting the methods for the questions, 9 which is what you wanted to address this time. 10 DR. BASCH: Yes. That is a long, complicated question. One could argue that 11 12 guidelines generally describe the phenomena to be measured, as opposed to the measures of 13 14 those phenomena themselves, which is what 15 we're talking about here. But it is a blurry line. I think we probably would have to leave 16 17 that for another -- let that linger with us, 18 a very important --19 DR. BANKOWITZ: Can I speak to 20 that momentarily? 21 DR. BASCH: Go ahead. 22 DR. BANKOWITZ: I think it's a

Page 225 1 great guestion, and it also relates to the 2 question that was asked at the front of the room here. And I think one way to look at it 3 is, we might want to think about leading 4 5 measures and lagging measure. 6 So a lagging measure is a big dot 7 measure. It tells you how well you have done. 8 It's too late to change it, but it tells you 9 how well you have done. So mortality, 30 day 10 mortality might be a lagging measure. And there's no guideline that says "Don't kill 11 12 people," but it is a measurement that is 13 valid. So if we can come up with a big dot 14 measure, then we need to ask these questions about how to we adjust it. 15 16 But we might have leading measures 17 where there might be more heterogeneity, which 18 might vary from place to place, which might 19 not be so well documented. And I think that 20 might be one way to address it. 21 DR. BASCH: Did you want to follow 22 up quickly?

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1	DR. GANIATS: Yes. I mean, just
2	real quick, I've been on guidelines. I've
3	been on performance measures. The 30 day
4	readmission for heart failure, I co-chaired
5	the committee that created that. Why 30 day?
6	Why not 15 day? Why not 45 day? Where's the
7	evidence that we're going to draw the line?
8	And there was no evidence. Personally, even
9	as chair, I didn't like the measure because it
10	is arbitrary, and I think that there are huge
11	problems.
12	Most of NQF-endorsed measures are
13	process measures or structure measures for a
14	reason. There are a few outcome measures, and
15	I think that we have a problem when we are
16	creating outcome measures without the
17	guideline, and we are pushing practice through
18	a performance measure accountability instead
19	of through a guideline process.
20	Believe me, I'm in favor of us
21	being better. I'm just worried about the
22	process. But I'll let others talk now.

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1	DR. BASCH: In the middle.
2	MS. TORDA: Yes, I am Phyllis
3	Torda, from the National Committee for Quality
4	Assurance, and I'd actually like to pick up
5	this thread and the suggestions about
6	structural measures.
7	And I think, as Helen noted in the
8	very beginning, there is a maturity
9	progression from structure to process to
10	outcome, and that one of the things that it
11	might be really helpful for this group to do
12	is to lay out what should guide thinking about
13	structure, process, and outcome measures for
14	patient-reported outcomes.
15	And it does sound to me like we
16	might be getting to the point, based on the
17	presentations, where there is a good evidence
18	base for a structural measure. Structural
19	measures are good at signaling the need for
20	implementation, encouraging implementation,
21	without stifling innovation, because you're
22	not being overly prescriptive. And then, as

Page 228 1 you learn more, you move from structure to 2 process to outcome. 3 So I think there's a progression there. 4 I probably agree that there's a lot of 5 methodological reasons why jumping to outcomes 6 might be premature at this time, but I think 7 that thinking about that progression would be 8 very useful. 9 DR. BASCH: That's a very good 10 point. We're going to go over here, and then we had a comment here. 11 12 Go ahead. 13 This is Jennifer Eames MS. HUFF: 14 with PBGH, and I want to thank the panel for 15 having a discussion on methodology that 16 incorporates the component of useability, 17 because I think we can't really separate the 18 two without knowing how we're going to be 19 using the measure that really influences the 20 methods. 21 And I think there's a general 22 belief of quality improvement, you don't have

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1	to be as rigorous, public reporting, some more
2	rigor, payment, the stakes are higher. And
3	I'd like to challenge that belief in terms of
4	who's using the information for public
5	reporting and payment. You look at the users,
6	and I'll say that purchasers have a much
7	higher tolerance for error in this
8	measurement, and would rather have information
9	now as opposed to waiting for years for it.
10	Also, for consumers, there was a
11	study done by Judy Hibbard and Arnie Milstein
12	who looked at the tolerance for
13	misclassification when comparing providers,
14	and it's much higher amongst consumers, I
15	think, than what public reporting programs
16	usually do. So again, I think this is a
17	really important area, of tying the methods to
18	the useability, and looking at who's really
19	using the information.
20	And per the conversation around
21	using structural measures or checklist
22	measures, I just want to add a word of caution

	Page 230
1	to that discussion. Because I think those
2	measures are good. They're good at
3	encouraging implementation, but they don't
4	necessarily get at the quality of the
5	implementation, and I think that's where the
6	outcomes really come in, and why people are
7	interested in outcomes is it gives a sense of
8	how well the implementation is really
9	occurring.
10	DR. BASCH: We've been given
11	authority to go about five minutes over, so
12	we're going to go to the back here, and then
13	we're going to go to the audience and the
14	phone.
15	DR. PAWLSON: Greg Pawlson, from
16	Blue Cross Blue Shield Association. I have to
17	weigh in on this, the need for guidelines for
18	outcome measures. NQF, and I don't remember,
19	Helen, the exact group, but I remember it was
20	a task force. Superb discussion, and it was
21	written up and published by NQF, about where
22	guidelines really come in.

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1	And there was, I think, a fair
2	consensus that, for most outcomes, you don't
3	need a guideline. Pain, patient-reported
4	experience of care, we've never had guidelines
5	that said "Patients should be treated with
6	respect and trust and so on." And I would say
7	it's the same for many of the patient-reported
8	outcomes that we're talking about.
9	Now, as those get into areas that
10	are more process-oriented and need a guideline
11	like, to bring up one, Ted, hemoglobin Alc
12	levels, then clearly there is a need for
13	guidelines. I think it's a different kind of
14	evidence base that doesn't come out of
15	guidelines, but there is some evidence base in
16	most of the measures that we've been talking
17	about today, that some clinical intervention
18	does have some impact, especially at an
19	aggregate level.
20	You can't hold an individual
21	physician responsible for some of these
22	things. You can for patient experience, but

	Page 232
1	you can't for some of these others. But
2	clearly an accountable care organization, if
3	they don't have any effect on that, on
4	mortality or on readmissions or on a number of
5	other and I should stick to patient-
6	reported outcomesthen I don't know what
7	we're doing in health care, frankly.
8	So I wouldn't be so pessimistic
9	about our ability to have evidence-based
10	not guideline-connected, but evidence-based
11	outcomes with very high face validity, that
12	can now be measured and can show change,
13	especially over time, at an aggregate level.
14	DR. BASCH: I think this speaks,
15	really, to the need for research, rationale,
16	consensus. And to Ted's comment, if you look
17	at a measure for example, in oncology, we
18	look at post-chemotherapy nausea, there are
19	actually guidelines that recommend improving
20	nausea after chemotherapy, but patient-
21	reported outcomes are generally not used to
22	measure that. So in some cases, there are

Page 233 1 quidelines. In other cases, it would be quite 2 easy to develop consensus around those domains 3 that merit measurement. But it does, again, 4 speak to Lori's comment for the need for empiric research in this area. 5 One could argue that, in fact, the 6 7 rationale for developing these measures is, in 8 fact, patient engagement, that engaging with 9 populations to determine what is important to 10 patients as outcomes would then logically lead to the development of measures of those 11 12 outcomes that are important to patients, and then we could do research to demonstrate that 13 14 the measures being developed actually yield meaningful differences in measurement between 15 16 practices, and that's probably the continuum. 17 To the audience? 18 (No response.) 19 MR. CUNNINGHAM: The phone? 20 Operator, can you tell us if we have anyone in 21 the queue for questions or comments? 22 Yes, sir. OPERATOR: As a

	Page 234
1	reminder, you may press star-one to ask a
2	question.
3	There are no questions at this
4	time.
5	MR. CUNNINGHAM: Thank you.
6	MR. BLUM: Hi, Steve Blum with
7	Forest. I just wanted to make a brief comment
8	relative to proxy. There's been some
9	discussion lately about potential utility for
10	proxy or observer-assisted reporting, where
11	there may be an opportunity to either assist
12	with recall or frame the question in a way
13	that the subject would understand, or provide
14	some context for their response, which may
15	address some of the shortcomings with both
16	proxy or patient-reported, maybe get closer to
17	the truth by putting the question within a
18	context that the subject is able to respond in
19	a way that they wouldn't otherwise, if they
20	did it by themselves.
21	DR. FRANK: Yes, and I would just
22	comment that, in the United States, we have a

	Page 235
1	political and a legal system that cherishes
2	the autonomy of the individual, but that's a
3	great example of when shared decisionmaking
4	with the family, being those whom you're
5	sharing it with, comes into play. And that
6	crosses over into measurement, then, as well.
7	Absolutely, it's patient, dyad, or family
8	grouping as the measurement unit.
9	MR. CUNNINGHAM: Are there any
10	other questions from the audience before we go
11	back to Barbara Gage?
12	OPERATOR: There are no questions.
13	MR. CUNNINGHAM: Thank you. Barb?
14	DR. BASCH: Go ahead.
15	DR. GAGE: Thank you. The
16	discussion is changing a little bit. There
17	were comments about, really, the insurer's
18	perspective, although we didn't call it that,
19	when we were talking about accountability and
20	value. And typically the accountability is a
21	measure of reduced readmissions which, while
22	we all talk about it as a measure of quality,

1       much of the force that's behind it is a         2       reduction in the cost.         3       But some of this discussion has         4       just broadened to identify patients'         5       preferences as a value metric, even though an         6       insurer may I mean, that's not a common         7       metric from an insurer's perspective. They're         8       typically more concerned about costs.         9       DR. BASCH: Panel?         10       DR. BANKOWITZ: I think one could         11       also look at the purchaser's point of view.         12       I think large companies who are employing and         13       insuring their populations do want to have         14       access to quality care. They are concerned         15       with the quality of decisionmaking. So maybe         16       if you take one step back in the chain, and         17       look at the purchaser, that might be helpful.         18       DR. FRANK: And I would just add         19       that preference-concordant care may actually         20       DR. BASCH: Richard, to follow up         21       DR. BASCH: Richard, to follow up         22       and to draw that out, would you say that. on <th></th> <th>Page 236</th>		Page 236
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21 DR. BASCH: Richard, to follow up 22 and to draw that out, would you say that, on	20	improve efficiency.
and to draw that out, would you say that, on	21	DR. BASCH: Richard, to follow up
	22	and to draw that out, would you say that, on

	Page 237
1	the payer side, there's actually a preference
2	around improved symptoms, because of its
3	relationship to utilization?
4	DR. BANKOWITZ: To answer the
5	question, I do think that a useful metric from
6	the purchaser's point of view is probably
7	healthy days at work, speed with which one
8	returns to work, this kind of metric which
9	would be useful. I don't know how it plays
10	into patient-reported outcomes, but I think
11	clearly employers are concerned, increasingly,
12	with the physical, mental and emotional well-
13	being of the workforce. So it is becoming a
14	broader, I think, discussion.
15	DR. BASCH: I think we have time
16	for one more, and then we'll finish up.
17	DR. KOTAGAL: Hi, Uma Kotagal from
18	Cincinnati Children's. I wonder if I might
19	pull this together a little bit in a broader
20	context. So if we take children with asthma
21	and they are readmitted, it is not only a cost
22	issue, but it's a missed school day issue, and

	Page 238
1	an absenteeism or presenteeism issue for the
2	parents, and therefore for employers. And the
3	evidence for that is pretty strong.
4	Now, if we want to reduce
5	readmissions for asthma, and we publish this
6	data, it turns out that in parent self-
7	confidence and understanding, recognizing
8	early symptoms of asthma is important. And
9	when we first began this measurement in about
10	45 practices in Cincinnati, with about 15,000
11	children with asthma, half the time the
12	parents reported that they did not feel
13	confident about managing their child's
14	illness.
15	When this got filled in in the
16	waiting room, and the form was given this
17	was a paper questionnaire to the physician,
18	they were shocked at this response. And they
19	said things like "Really? You don't know how
20	to manage it? We've been talking about this
21	for so long."
22	Now, of course, when we recognized

	Page 239
1	that half the parents of these 15,000 children
2	didn't understand early signs of respiratory
3	illness for asthma, or how to prevent a
4	hospitalization, and began to work on it, we
5	not only could reduce our hospitalizations
6	significantly, but we improved functional
7	outcomes for the children, in days missed and
8	so on.
9	So I think it's difficult to think
10	about this conversation in a unidimensional
11	way without recognizing that there's both a
12	developmental sequence to it i.e., we don't
13	quite know how to incorporate all of this
14	there's a research significance to it, how are
15	we going to measure the right thing as what's
16	important. But there's a larger context of
17	connecting the individual, the family, the
18	society and the context. And when we
19	dissociate these pieces, we end up with lots
20	of interesting conversations that don't
21	necessarily result in better health.
22	So I just want to use asthma as an

	Page 240
1	example, to bring together the utilization
2	question, the child question, the parent
3	engagement question, and the employer
4	perspective.
5	DR. BASCH: It's a very nice
б	comment to finish it off. I want to thank our
7	terrific panel and everyone in the audience,
8	and hand it back to Karin.
9	MS. PACE: Just one quick
10	announcement. We have lunch for the expert
11	panel and authors. For the audience, I think
12	you were given as you came in some quick
13	places to go that are within a block of here,
14	to go get some lunch. We'll reconvene in 45
15	minutes, so 1:55. Anyway, thank you again for
16	your participation, and enjoy your lunch. And
17	we'll reconvene in about 45 minutes. Thank
18	you.
19	(Whereupon, the above-entitled
20	matter went off the record at 1:11 p.m. and
21	resumed at 1:55 p.m.)
22	

Page 241 1 A-F-T-E-R-N-O-O-N S-E-S-S-I-O-N 2 (1:55 p.m.) 3 We are going to go MS. PACE: 4 ahead and get started. So I will have the 5 panel take their seats. And Al will start us 6 off. 7 DR. WU: Thanks. You almost said, 8 "Take your sleep." And I realized that we are 9 post-lunch. So we will try to keep this 10 lively. So this is the session on 11 12 selecting patient-level PROs. I have to check 13 my notes. I am Albert Wu. My institution 14 thinks I'm from the Bloomberg School of 15 Health, but I am listed here as being -- I 16 think our corporate member is the Johns 17 Hopkins Health System. So we have been -- we, like quite 18 19 a lot of other big academic medical centers, 20 have recently decided to go with a large 21 vendor-provided electronic health record. And 22 so we are now scrapping our legacy system that

Page 242 1 has actually been working reasonably well 2 finally after 15 or 20 years. And we are faced with a number of 3 choices. And one of the choices that we are 4 5 faced with is -- well, it's an opportunity, really, to incorporate patient-reported 6 7 outcomes into the electronic health record. 8 And part of the reason is that our product 9 comes with a built-in patient portal that has a couple of PROs built in, the PHO-9 and the 10 RAND-36, a close cousin of the VF-36, I think. 11 12 But those are the only things that 13 are built in. And we now have the opportunity 14 to customize our system to include other PROs. So the question is, which ones? 15 16 For those of you who are not among the cognoscenti of this field, there are 17 thousands of PROs, dozens of generic measures, 18 19 quite a few utility-based measures, and then 20 hundreds and hundreds of specific disease or 21 treatment-specific PROs. And so which of 22 these are we going to include in our

Page 243 electronic health records? 1 2 These conceivably will be used for research in the future, which we're certainly 3 4 very concerned about. They could also be used 5 for quality measurement, internal quality improvement, and ultimately for 6 7 accountability. So we've sort of got our eye 8 on all of those things. 9 There are a number of issues we 10 are confronting, one of which is that there 11 are many proprietary measures that are among 12 the best tested, not a surprise, really. Should we be using these? Are we going to 13 14 have to pay for them? Can we get a site license for our five hospitals and God knows 15 16 how much in total dollars going through or are we going to pay on a per-use, per patient-use 17 basis? 18 19 How do we know whether a tool is 20 good enough for research? And, perhaps a 21 little more problematic, how do we know which 22 are good enough for clinical use? And, not

Page 244 identical to that, which are most suitable for 1 2 use for making comparisons across organizations? Are there tools that have 3 4 known properties so we know how they are 5 related to other variables, particularly things that are complicated, like patient 6 7 personality? Do we know anything about how 8 personality is related to the scores that 9 people give? 10 We have suspicions. And Ted Ganiats was sort of voicing a little bit about 11 12 Some of my patients have profiles of that. patients who have sort of a very similar 13 14 personality profile, maybe because they are nicer than I am. And so how do we take that 15 16 into account or can we? 17 We understand that tools need to 18 be blended for research use and clinical use 19 and quality use. Which are the most 20 acceptable to both patients and providers? 21 Because, if nothing else, very selfishly, that 22 is going to affect whether people give good

	Page 245
1	answers, whether they give valid answers,
2	whether they give reliable answers, whether
3	they take it all seriously. This is another
4	way of saying that it has got to fit into the
5	work flow, but patients and providers are a
6	part of the work flow. So selection is
7	important.
8	We would like things to be
9	interpretable, both by patients and by
10	providers and ultimately by others we may be
11	accountable for. We would like them to be
12	actionable, if possible. So I hope we talk
13	about some of these things. I am sure we
14	will.
15	You have slightly detailed files
16	in the back of your materials, but we have got
17	a terrific panel of reactors, each of whom is
18	going to speak for seven minutes. And I will
19	try to be mindful of time.
20	Jim Bellows from Kaiser
21	Permanente; Gene Nelson, whom you have already
22	heard from but you are going to get a little

	Page 246
1	bit more from, from Dartmouth; Kalahn
2	Taylor-Clark from the National Partnership for
3	Women and Families; Ken Ottenbacher from the
4	University of Texas at Galveston. And, even
5	before that, I think David is going to tee
б	things off for the rest of our discussion.
7	MEMBER CELLA: Sorry. It's me
8	again.
9	(Laughter.)
10	MEMBER CELLA: Okay. Well, I
11	think we're getting into some things that many
12	of us have been waiting to talk about: how to
13	select PROs for performance measurement.
14	I think it is fair to say we
15	probably could all agree that we want
16	instruments that measure person or
17	patient-reported outcomes in a standardized
18	way and that we can know something about the
19	properties of the questionnaires.
20	There are a lot of guidance
21	documents available to address attributes of
22	patient-reported outcomes used in research,

	Page 247
1	but there is little guidance regarding
2	attributes for patient-reported outcomes to be
3	used as performance measures.
4	So we drew from one of the more
5	frequently, perhaps the most frequently, cited
б	guidance on user PROs in research. And that
7	is the medical outcomes trust.
8	So you will see in table 3 of the
9	paper and text accompanying it an outline or
10	structure that draws heavily from the medical
11	outcomes system original criteria.
12	So next slide. So there are some
13	differences, but before I get into maybe a
14	couple of the key differences in selecting
15	PROs as performance measures versus research,
16	there are I think more similarities than
17	differences in terms of wanting something that
18	is reliable and valid and interpretable, et
19	cetera. And we'll come to that.
20	But one thing that's pretty
21	different about performance measures, unlike
22	research, is that it is really important to

	Page 248
1	have short length. And the second thing that
2	is pretty obvious is that the stakes are
3	different and the stakes are higher in use of
4	PROs as performance measures than in most
5	research studies.
б	Established PROs have a lot more
7	evidence behind them in terms of their
8	usefulness as performance measures than the
9	newer PROs, the ones we have talked about,
10	like using IRT, but the newer ones tend to
11	have better measurement properties. So you
12	have this always-present tension between going
13	with something that has been around a long
14	time many have used, familiar with, lots of
15	literature, like the SF and VR tools. They
16	are limited in being static measures that are
17	scored using classical scoring methods that do
18	require you to administer the entire thing and
19	not have flexibility around that.
20	Future direction, which I talked
21	about this morning, in IRT-based measures,
22	like PROMIS, is a contrasting way to look at

Page 249 it. 1 2 Next slide. So what we're going to do now just to sort of get the discussion 3 going is to go through the criteria in table 4 5 3 and review recommended characteristics for PROs as they could be useful in performance 6 7 measures. And we're going to pick on the Western Ontario and McMaster Universities' 8 9 osteoarthritis index, or WOMAC. 10 Many of you are I'm sure familiar with that. It's one of the instruments that's 11 12 been around for a while. It's been used with 13 knee and hip osteoarthritis. It's got 24 14 questions covering the range of the last one to 14 days, Likert-type with 5 discrete 15 choices and a 100-millimeter visual analogue 16 format is available as well. 17 There are three sub-scales: 18 one 19 on pain, one on disability, and one on joint 20 stiffness. 21 Next slide. So we start with the 22 characteristics of a good instrument having a

Page 250 1 conceptual and measurement model. In other 2 words, the documentation of an instrument that we ought to be looking for should include a 3 4 description of the concepts that are being 5 measured and the intended populations for which they would be used and how those 6 7 concepts organize into a measurement model. 8 The target of what you are 9 measuring, the PRO you are measuring, should 10 be a high priority for the system or it's probably not going to be sustainable. 11 12 And so if you look at WOMAC as an example, actually, it does not do so well 13 there. It is more one of these long-term, 14 has-existed-for-a-long-time instruments where 15 16 the factorial validity has not held up, has not been deemed to be adequate from a 17 18 conceptual and measurement model standpoint. 19 But its grades get better as we 20 So let's go to the next slide. move on. 21 Reliability. The internal consistency should 22 be at least .7 or above for group-level

	Page 251
1	comparisons or use and .9 or above for
2	individual purposes. And also that is the
3	internal consistency and also the other aspect
4	of reliability. The more commonly referred to
5	one is stability or reproducibility.
6	It often depends upon the time
7	window, shorter, of course, being better
8	because people don't change. You want to be
9	testing people at two points in time where
10	they don't change to show that something is
11	reliable as a rule or applied to the same line
12	twice.
13	So the Cronbach's alpha for the
14	sub-scales are quite good on the WOMAC, from
15	.86 to .98. So that's great. And the
16	stability has been adequate for pain and
17	physical function but less so for the
18	stiffness sub-scale if you look at the
19	literature.
20	Next slide. Next is validity,
21	three main types: content, construct, and
22	criterion validity. A limited number of

	Page 252
1	instruments have been validated and with the
2	validity of these sorts in the context
3	performance measurement.
4	The WOMAC development involved
5	expert clinician input and survey input from
6	patients as well as a review of existing
7	measures. So it's got good content validity.
8	And the scores correlate well with
9	satisfaction with arthroplasty and other
10	clinical outcomes. So the validity looks
11	pretty good on the WOMAC.
12	Next slide. Responsiveness. So
13	it's an aspect of validity. You want to be
14	sure that what you are using is going to pick
15	up important change or be responsive to it.
16	It is important in performance measurement,
17	obviously, because there is an expectation
18	that you will detect change or hopefully
19	improvement or there may be consequences
20	associated with it.
21	And if you are going to expect to
22	tie action to scores, then you do want to be
	Page 253
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1	able to be sure that the scores will change as
2	a result of action. So if you're going to
3	have actionable assessment, then you want to
4	be able to make sure the assessment actually
5	is responsive.
6	And the WOMAC has adequate
7	responsiveness and ability to take change in
8	response to focused clinical interventions.
9	Okay. Next slide.
10	Interpretability, which really comes out of
11	experience with the measure and applying it in
12	context. You need to know what a low and a
13	high score represent; what is the average; and
14	what is the standard deviation; what is the
15	referenced population that you are pulling the
16	average and standard deviation from; and what
17	is a meaningful difference; and sometimes, you
18	know, if it's know, what's the lowest likely
19	meaningful difference, or a so-called
20	minimally important difference; and how do you
21	know when a change over time is meaningful in
22	a person; how do you know when a change over

	Page 254
1	time is meaningful in a group, a group of
2	people.
3	We talked about this earlier. For
4	performance measures, if different PROs are
5	used for the same concept, it's going to be
6	important to have a link or a crosswalk that
7	allows you to be able to interpret scores on
8	one instrument in relation to what they would
9	be on another or how they might relate to that
10	same underlying trait or thing that is being
11	measured, like depression or physical function
12	and to apply the criteria that you learn and
13	use for determining what is clinically
14	meaningful in this setting.
15	Now, the WOMAC does have
16	population-based age and gender norms. They
17	do have a published minimally clinically
18	important improvement that I use. And you can
19	use the WOMAC to translate into utilities for
20	economic evaluation. So because it has been
21	around a long time and been used a lot, it
22	does have good interpretability behind it.

1	
	Page 255
1	Burden is the next item. And that
2	relates to the time and the effort and other
3	demands on the respondent as well as on the
4	administrator, on the clinical staff.
5	Performance measures, PRO
6	assessments then probably in this context do
7	need to be as brief as possible. And
8	reporting should be done in real time.
9	There is a short form available
10	for the WOMAC. And the average time to
11	complete it is a little under five minutes.
12	So it seems to do well in that criterion as
13	well.
14	Next slide. Alternatives modes
15	and methods of administration. We walked
16	earlier. Several people have commented that
17	it is important to be able to be as flexible
18	as possible without being blind to the issues
19	that one needs to consider.
20	There are validated mobile phone
21	and touch-screen platforms for WOMAC. So it
22	does seem to have a good means of alternative

Page 256 modes available. 1 2 Next slide. And cultural and language adaptations, again, hopefully done in 3 a way that is responsive to getting truly, not 4 5 just literally equivalent translations but semantically equivalent translations on 6 7 culturally fair, if not equivalent, 8 translations to be able to use across people 9 of different cultures and languages. The WOMAC is available in dozens 10 11 of languages. So that's also a good class, a 12 passing grade. Next slide. This is the last one, 13 14 which is in the context of electronic health records, critical features of performance. 15 Measures will be the interoperability of the 16 measure, having automated real-time 17 18 measurement and reporting capabilities. You 19 can get that instant report and not be in the 20 way of the clinic flow; instead, perhaps even 21 facilitate it and preferably sophisticated or 22 at least stay to our analytic capabilities

	Page 257
1	with the information that is brought into the
2	EHR.
3	Electronic data capture of WOMAC,
4	which is available, should allow for fairly
5	easy integration within the health record. So
6	I'll pass on that one as well.
7	Go to the next slide. That may be
8	the last one. I thought it would be useful
9	just to kind of run through. That's the
10	table, table 3. Maybe we should have a tenth
11	criterion of actionable from the discussion
12	and maybe have some discussion about that.
13	And my thanks to the developers
14	and validaters of WOMAC for allowing me to use
15	them as a guinea pig for this introduction.
16	Thanks.
17	DR. WU: Thanks, David. And
18	thanks for keeping us on time.
19	So who Jim, are you it's
20	time. So Jim is going to talk to us about a
21	couple of things, characteristics that
22	identify PROs as suitable for use as

	Page 258
1	performance measures, relevance for use of
2	PROs that are developed for controlled
3	research to be used in clinical practice. And
4	who knows? Maybe more.
5	MEMBER BELLOWS: Thank you.
б	So the space of curmudgeonly
7	having been taken, I'm going to venture into
8	slightly provocative and talk a little bit
9	about what I see as the real importance of
10	useability, including actionability, which you
11	just mentioned, and meaningfulness in this
12	space. And perhaps they're even greater
13	importance than some of the other technical
14	aspects we talked about.
15	So when I look forward from where
16	we are now, I see two visions of how the whole
17	PRO enterprise might develop. And, on the one
18	hand, I see a vision much like what they've
19	done at Dartmouth, which to me is a thing of
20	such incredible beauty that I almost wish I
21	could get back pain and go to New Hampshire
22	and experience the Dartmouth model with all

	Page 259
1	the integration of the clinical care that we
2	have seen.
3	I know that in Kaiser Permanente,
4	we have a couple of uses that are working out
5	terrifically, the use of PHQ-9 to drive a
6	treatment model for depression, which is
7	really based on treatment to remission,
8	instead of counting how many medications we
9	are doing or how many follow-up visits we are
10	having, really has the potential and is
11	transforming our depression care.
12	We're working with an instrument
13	we use after total joint replacement that is
14	being terrific in helping us identify the
15	people who need the most follow-up. So that's
16	the part of the vision I really love.
17	I see another part of the PRO
18	transformation off into the future that could
19	look not nearly so nice and that could look
20	more like patients feeling spammed basically
21	by their clinical systems.
22	Here are some of the evidence

	Page 260
1	points I have that bring that vision to bear.
2	One is that I know that in all of the surveys
3	that we do in our system, our customer, our
4	patient experience and care experience
5	surveys, our responsive rates are trending
6	notably downward over the last few years on
7	CAHPS and HCAHPS and those satisfaction
8	surveys.
9	I know that our responses to
10	clinical reminders, whether it's they'll get
11	your colonoscopy or breast mammogram or
12	whatever, our responses to those are going
13	down over the years. And we're going more
14	quickly through each new technology.
15	When we first knew how to use our
16	computers to send out letters on paper, it was
17	like a great thing. And people responded.
18	And then they stopped. And then we started
19	using IVR. Oh, that's so cool. People
20	respond to IVR. And then they stopped. And
21	then it was email. And then it was text
22	messaging. And with each one, there's a

	Page 261
1	shorter and shorter message.
2	(Laughter.)
3	MEMBER BELLOWS: And so my fear is
4	that if we're not judicious about how and
5	where we use patient-reported outcomes, the
6	patients will start to feel spammed by us
7	asking all of these questions in much the same
8	way they do in other things.
9	The business of patient-reported
10	outcomes is so important and so precious to us
11	I think in a clinical context that we need to
12	be careful and judicious about how we proceed
13	so that we don't push patients over their
14	limits and get them to the point where they
15	stop responding.
16	I know for myself, I am at the
17	point where when online surveys pop up in the
18	middle of an internet experience, I just
19	dismiss, dismiss without even thinking about
20	it and similarly. And I don't want to get
21	there with patient-reported outcomes.
22	So how do we avoid that? To me

	Page 262
1	one way to avoid that is that I think the
2	traditional formula in a room of moving toward
3	performance measure would be to consider the
4	reliability and validity of measures first and
5	only secondarily their usability and
6	feasibility.
7	And I would propose that for the
8	patient-reported outcome space, that we make
9	the useability of measures; in particular,
10	their meaningfulness and their actionability
11	by clinicians and patients, of paramount
12	importance and not even consider a use for
13	performance measure until it has been
14	demonstrated that it can be used productively
15	in a clinical system, that it can be
16	appreciated and acted upon appropriately at
17	scale and in real time and only then move on
18	and that if we get ahead of ourselves and
19	start pushing out a plethora of measures that
20	are coming not from the position of
21	improvement but of accountability and payment,
22	that we will end up in a space that is not

Page 263 ever what we intended. 1 2 So I think that is the basis of my 3 idea. So I guess there were a couple of 4 specific questions. From the research 5 context, most of the measurements we have that have the greatest validity have the most 6 7 number of items on the scale, duh. They're 8 most valid if they are really big patient 9 populations. But it's those measures that 10 have a lot of items on a scale and go to a really big population that are going to most 11 12 saturate our patients' willingness to respond. So to me moving judiciously means 13 14 going to narrowly targeted patient populations that have a specific episode of care where the 15 care is very salient to their needs. 16 That's 17 like the people who have had a total joint 18 replacement or CABG or whatever and are very 19 interested in what is going on with that care 20 and then, departing from the practice that has 21 been so common in research but going with 22 extremely short instruments that everybody can

Page 264 1 understand. 2 So it's a little bit different than the typical criteria, but that's what I 3 think will serve us best in the long run as we 4 5 develop and build. 6 Thank you. 7 DR. WU: Thanks. That was very 8 timely. I remember a time when I used to 9 answer my telephone at home. 10 (Laughter.) But those days are long 11 DR. WU: 12 gone. And so I think that this patients 13 feeling spammed notion is one that is going to 14 stick with me. 15 Next we've got Gene Nelson again. 16 Gene, are you ready to go? 17 MEMBER NELSON: Ready to go, 18 right. I am not as good at being 19 curmudgeonly. So I won't try. 20 The first question was, when can 21 general health status measures be utilized? 22 And when should condition-specific measures be

	Page 265
1	utilized?
2	And in general, I think at this
3	point in time, it's wise to use both general
4	and condition-specific measures when you are
5	focusing on a particular clinical population
б	so that we can start to learn what are the
7	benefits and drawbacks of both. So conditions
8	such as spine problems and heart failure and
9	total joint replacement, depression would be
10	good candidates for both general and
11	condition-specific.
12	I think it's very important to use
13	general health status measures under some
14	conditions. So, for example, at Dartmouth
15	Hitchcock 76 percent of heart failure patients
16	have two or more co-morbid conditions. The
17	median is four. So to look at the whole
18	patient, it makes sense to use a broader
19	general health status measure that captures
20	physical health and mental health and
21	function.
22	Also, when screening for problems

	Page 266
1	that may be important but can easily go
2	undetected, go to use a general measure, so,
3	for example, people with open heart surgery or
4	AMI recovering or postpartum, it's easy to
5	miss mental health issues or in the new annual
6	wellness visit that pays for prevention that
7	Medicare is offering for the first time,
8	they're screening for both functional problems
9	and health risk problems. And so using
10	general and specific measures is helpful,
11	specifically there a depression measure as
12	well as a general functioning measure as well
13	as health risk indicators based on health
14	behaviors.
15	The second question is, are there
16	any setting-specific issues for selection of
17	PROs? Short answer, yes, many. First, what
18	are the clinical populations that are being
19	cared for there that matters to them? What
20	are their needs? So, really, knowing your
21	patients and then tuning the use of PRO
22	measurement to the common likely issues for

	Page 267
1	the patients and then tuning the measures to
2	the work flow, as mentioned earlier, to try to
3	create a richer and more useful information
4	environment for both the patients and the
5	clinical team. So it's easy to say but design
6	in and design it well so you get the
7	useability is not like falling off a log.
8	There are also issues of patients'
9	acuity and cognitive abilities as well, of
10	course, that does vary pretty dramatically
11	from setting to setting or point of time
12	within settings.
13	The third question was, what
14	conditions would be most sensitive to
15	measuring changes in patient health status and
16	outcomes? So here chronic conditions, such as
17	mentioned earlier, heart failure, depression,
18	ischemic heart disease, Parkinson's disease,
19	low back pain, osteoarthritis, rheumatoid
20	arthritis. All of these tend to have an
21	impact that rolls through the person's
22	well-being, physical, mental, and roll

	Page 268
1	impairments, all fairly likely.
2	So certain chronic conditions
3	would potentially be good starting points and,
4	as mentioned earlier, by any other surgical
5	conditions. Total joint arthroplasty,
6	bariatric surgery might be a really good
7	place, open heart surgery, spine surgery.
8	The third one is a little bit
9	different in terms of most sensitive to
10	measuring changes in outcomes. And that's
11	people that are not necessarily in serious
12	trouble yet, but they're at high risk of
13	avoidable death or of the onset of disease or
14	the accumulation of new diseases.
15	So health risk status measurement,
16	including health behaviors, and biometrics for
17	people, such as cardiometabolic syndrome, or
18	minor hypertension but at risk for other
19	conditions or high health risk behaviors.
20	So screening for avoidable risk of
21	death or onset of disability would be an area
22	where risk measures could be sensitive. We

	Page 269
1	estimate that about 5 percent of the
2	population aged 30 to 49 account for about 25
3	percent of the risk of avoidable death. So
4	there's a lot potentially there.
5	We haven't talked very much about
6	health behavior measures and health risk
7	today, but I think if we wish to go upstream
8	to promote health and to prevent disease and
9	disability, very fruitful area.
10	Last question was, what is the
11	variation in patient-level scores related to
12	clinical interventions? I put together rather
13	eclectically one slide here that shows for
14	some general health status measures, this
15	is from the sport trial the differences in
16	people having surgery or not having surgery on
17	a zero to 100 scale of physical function.
18	And so a 44 versus 30, 23 versus
19	32, for example, herniated disc and stenosis,
20	depression, the PHQ-9, as many people
21	recognize, that a certain degree of elevation
22	is indicated.

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And then getting to remission
means less than five, a score of less than
five. And some health systems and some
providers are much more successful than others
doing that. Within our Dartmouth Hitchcock
system, we have tremendous variation at the
clinical pod level on this measure. Carpal
tunnel syndrome using a disease-specific
measure, 3.1 down to 1.8, by people that are
looking at patients with the problem suggest
very substantial improvements, et cetera.
So a lot of the work that has been
done on clinical populations using either
generic or condition-specific measures and
associated with different interventions and
different kinds of health care can show very
substantial differences that would make a
large difference in how a person is doing and
feeling physically, mentally, and in their
role.
DR. WU: That was great. Thanks.
I like this last slide.

Page 271 I do wonder, for screening 1 2 purposes, a lot of the conditions that people have might sort of result in some general 3 depression, some haloed depression of 4 5 everything, but you would only suspect that 6 something is going on but not know what it is. 7 And I wonder if sort of something 8 which is generic but very comprehensive might 9 be a better screening test, I mean, something 10 like the old SCL-90, which went through a whole laundry list or review of systems of 11 12 I wonder if that is something that systems. would be better for that purpose. 13 14 But shall we go on to Kalahn? 15 DR. TAYLOR-CLARK: Sure. Thank 16 you. 17 I have to say that much of this 18 conversation has brought me back to nearly 15 19 years ago. I have a Ph.D. in health policy 20 and health economics. And the first day of 21 the program, we walked in. And the professor 22 said, "So, you know, we're going to calculate

	Page 272
1	these qualities."
2	And I said, "Well, what if a
3	quality falls below zero?"
4	And the professor looked at me
5	really strangely and said, "What do you mean?"
б	I said, "Well, what if somebody is
7	living below a zero and actually living worse
8	than death?" because zero was death. And that
9	was when I realized I needed to be part of the
10	patient community and the consumer community
11	to talk through these issues a little bit
12	better because I felt that the economics
13	weren't exactly measuring what I was hoping to
14	measure through the patient perspective.
15	So that brings me here today. And
16	I appreciate the opportunity to speak on the
17	consumer side.
18	I was asked to actually address
19	only one specific question, which was what
20	measures are important to patients. You know,
21	I kind of went through this a lot, especially
22	as we were sitting there and having the

	Page 273
1	discussion at our table about what would
2	really be important to patients but what is
3	also useable and feasible for the system to do
4	so. I'm always thinking about that balanced
5	perspective in providing this perspective to
6	you.
7	The first thing I will say is that
8	obviously and this has been brought up many
9	times today that the measures that have
10	been put forth so far through CAHPS and others
11	have been really useful for research purposes
12	but not necessarily as meaningful to patients.
13	That is something that has been brought up,
14	but that needs to be reiterated as we think
15	through what we are going to use for measures
16	of both quality improvement as well as
17	accountability in public reporting.
18	That is going to be
19	extraordinarily important when we think about
20	how patients actually read what this measure
21	means and then are able to use that for
22	decisions on terms of their preferences or in

	Page 274
1	terms of their decisions about the providers
2	and the treatments that they receive.
3	So I want to put that forward
4	because a lot of the measures that we think
5	about might not even necessarily exist in many
6	of these validated instruments. I hate to say
7	that because I hate to take two steps
8	backward. But I do think that there are ways
9	that we can think through this.
10	So the measures that we have
11	really been thinking through are some of the
12	ones that actually were mentioned. So
13	expensive surgical procedures certainly are of
14	import.
15	Shared decision-making,
16	particularly in maternity care, these are
17	measures that are both of import, obviously,
18	to purchasers but also very much to consumers.
19	And really thinking through some of those
20	measures will be important measures of
21	depression, as Gene mentioned.
22	But I wanted to also say that the

Page 275 measures of patient experience shouldn't 1 2 completely be excluded. I think we have been mostly talking about patient-reported outcomes 3 today as levels of functional status and some 4 5 of these other types of measures. But I want to reiterate that patient experience is 6 7 extraordinarily important to patients. 8 I will give you an example. In my 9 former life, I was a research director at the 10 Brookings Institution, where we were looking at a pilot study where we worked with a major 11 12 health system that was now going to become an accountable care organization. 13 14 One of the points that they made, they said, you know, we really need better 15 16 measures of patient experience because what we 17 are finding is that some of the experiences 18 our patients are having are actually having an effect on our retention. 19 20 Let me just take you just through 21 They said specifically care a moment there. 22 coordination measures from the patients'

	Page 276
1	perspective as well as organizational access,
2	which is usually defined by CAHPS as their
3	ability to get after-hours care and things
4	like that, those two particular measures were
5	the most defining in actually predicting the
б	patients' retention, the retention of their
7	patients in the system, that they really
8	wanted to actually define care coordination a
9	little bit better than what CAHPS had been
10	doing previously but to really actually
11	include that in all of their measures, both
12	for quality improvement as well as for
13	accountability in public reporting. Those are
14	just two examples of experience where I
15	recognize that they have tended to be process
16	measures but can lead specifically to outcomes
17	of import to patients.
18	The other piece that I would say
19	is around the confidence piece. And certainly
20	patients' confidence in their ability to make
21	decisions in terms of self-management and
22	care, either from the patient perspective or

Page 277 1 the proxy perspective, are going to be 2 extraordinarily important. And then the final piece that I 3 4 would say around the measures specifically is 5 around this idea of access to social and community resources. I want to take a step 6 7 back on that one. Ted Rooney suggested for 8 Maine -- got up and actually made a real 9 interesting point. He said, "Well, we can't 10 always put the onus on the provider." And I think others have talked a lot about this, 11 12 that, you know, we're defining these measures 13 and then we're suggesting that the health care 14 system is the only fix-it. The bottom line is that that is 15 Social determinants of 16 obviously not true. 17 health, your ability to get transportation, 18 your ability to actually access the system, et 19 cetera, et cetera, are going to play an 20 extraordinary role in your ability to get 21 better. 22 And so one of the points that we

Page 278 1 were actually trying to make again when I was 2 working at Brookings was to think about what a measure could look like in the health care 3 system that would allow us to get as well as 4 5 we could on what the system could do to actually provide access to those other 6 7 resources. 8 And we actually came up with a 9 potential measure that said, how well does 10 your provider or did your clinician -- sorry. I think the specific measure was, did the 11 12 provider link you to helpful and useful social 13 and community resources that helped you to 14 either self-manage or take care of your 15 diabetes or your asthma? And this gets to one 16 of our points about who we are actually 17 looking at. 18 These were very narrow 19 disease-focused, chronic disease-focused, 20 surveys. And I think I would echo the point 21 that Jim makes that we do want to have sort of 22 general questions around general satisfaction

	Page 279
1	and experience and outcomes, but we also might
2	want to look specifically at conditions that
3	are of import to these particular groups.
4	Obviously care coordination is
5	going to be important for certain groups and
6	not necessarily for others, the same with the
7	social and community resources. This is going
8	to be extremely important to patients that
9	have the need to get to these social and
10	community resources.
11	So as we think through what the
12	measures should look like, I don't want to
13	take patient experience off the table. I also
14	want to try to think a little bit outside of
15	the box about how we can actually link other
16	measures that are going to be of import to the
17	use, to patients' use, of the data.
18	And I will end there and take
19	questions later. Thank you.
20	DR. WU: Well, that was terrific.
21	Thanks very much. And in sort of the
22	out-of-the-box spirit, these could possibly

	Page 280
1	fall into sort of the health behavior bucket,
2	but they really are things like confidence,
3	self-efficacy, outcome expectancy, which, in
4	fact, health systems should be in many ways
5	accountable for improving in patients.
6	I know the Society for Behavioral
7	Medicine has been thinking about this a little
8	bit. And maybe it is worth revisiting a
9	little bit more.
10	Finally, Ken, can you clean up?
11	DR. OTTENBACHER: Thank you, Al.
12	I am going to go ahead and use the podium, I
13	think. It might make it a little bit easier
14	for you all to hear me.
15	I would like to begin by thanking
16	NQF and the conference organizers for the
17	opportunity to participate. Okay. Didn't
18	work, huh?
19	(Laughter.)
20	DR. OTTENBACHER: Okay. Let me
21	try it again or I could sit down. Again, I
22	would like to thank the NQF and the conference

Pag 1 organizers for the opportunity to participate 2 in the workshop. 3 My task today is to comment on	ge 281
<ol> <li>organizers for the opportunity to participat</li> <li>in the workshop.</li> <li>My task today is to comment on</li> </ol>	2
<ul> <li>2 in the workshop.</li> <li>3 My task today is to comment on</li> </ul>	2]
3 My task today is to comment on	<b>_</b> ]
	<b>-</b> 1
4 issues associated with selecting patient-leve	<u> </u>
5 PROs. Specifically I have been asked to	
6 respond to the impact of patient	
7 characteristics and baseline values on change	9
8 in PROs and on conditions or circumstances	
9 under which stabilization or no change may be	9
10 a desired outcome.	
11 Measuring change requires a	
12 context. Targets for assessing clinical	
13 change include the individual or patient, a	
14 group or facility, and the population.	
15 Defining the context is an	
16 important first step in assessing change.	
17 Approaches, methods, and even conceptual	
18 frameworks may differ from one context to	
19 another.	
20 Assessing change has a long and	
21 controversial history. A common approach ha	5
22 been to calculate the absolute difference	

	Page 282
1	between change from baseline to follow-up.
2	This is referred to as the change, gain, or
3	different score, a variation of this approach
4	is to compute the percent of change.
5	The limitations of these
б	approaches are widely known. Ward and others
7	demonstrated in the 1960s and I quote here
8	that differences between scores tend to be
9	much more unreliable than the scores
10	themselves. This quote is from a widely
11	referenced text, "Problems in Measuring
12	Change," published in 1963.
13	Percent change continues to be a
14	widely used measure, despite its limitations.
15	Percent of change is sensitive to variations
16	in baseline distribution. If the range of
17	baseline values is large, the variance
18	associated with the percent of change
19	increases disproportionately and the
20	sensitivity of this approach is reduced
21	dramatically.
22	An extension of change or gain

	Page 283
1	scores is to adjust for baseline using
2	analysis of covariants or regression models.
3	Sophisticated statistical approaches have been
4	proposed to adjust for baseline scores and
5	other covariants using general estimating
б	equations or hierarchical opinion modeling.
7	These procedures examine
8	interactions and relationships among baseline
9	score, time, other covariants, and intended
10	outcome. While they represent powerful
11	methods, they are not without controversy.
12	An article in the American Journal
13	of Epidemiology in 2005 by Glymour and
14	colleagues provides caveats regarding
15	adjusting for baseline values using
16	sophisticated statistical models.
17	A variety of indices have been
18	proposed to address some of the limitations of
19	traditional approaches. These include
20	reliability change index, the residual change
21	score, and various applications of effect-size
22	measures. Each of these approaches has

	Page 284
1	strengths and limitations that have been
2	described in the literature and are referred
3	to in the draft NQF methodology paper.
4	The approaches described above can
5	be classified as distribution-based, meaning
6	that change or gain scores are expressed in
7	terms of an underlying distribution and rely
8	on sample variation, standard error, and
9	measurement precision.
10	An alternative is anchor-based
11	approaches. Anchor-based approaches require
12	an external or independent standard, or
13	anchor, to determine the clinical importance
14	of change. The anchor-based approach provides
15	unique opportunities for stakeholder
16	involvement in determining the focus and
17	magnitude of change. It introduced other
18	measurement challenges.
19	Another alternative is referred to
20	as adaptive measurement of individual change.
21	Adaptive measurement combines the methods of
22	item response theory and computerized adaptive

	Page 285
1	testing to provide a different way of thinking
2	about a scale's ability to detect change. The
3	adaptive change approach has a number of
4	advantages, including the ability to
5	demonstrate when a measure includes better
6	precision across the range of a trait.
7	Combining IRT and computer-adapted
8	testing was described previously and is being
9	examined in several applications of
10	patient-reported outcomes.
11	There are instances where
12	stability or the ability to maintain a level
13	of performance is the desired outcome; for
14	example, in degenerative conditions, such as
15	Parkinson's disease. This is also true for
16	conditions that involve cycling diseases,
17	disease processes, such as multiple sclerosis.
18	For some populations, the best
19	outcome may be to maintain a desirable level
20	of function; for example, maintaining a level
21	of mobility or self-care that allows
22	independent function in older adults.

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1	Providing evidence of stability
2	may be analytically less complex than
3	assessing change that requires adequate data
4	points, which can be a logistic or resource
5	challenge.
6	I will conclude with a couple of
7	observations regarding other challenges
8	relevant to assessing change or no change in
9	PROs. One important challenge is how to
10	risk-adjust. Quantitative methods for risk
11	adjustment in managing various forms of bias
12	have advanced dramatically in recent years.
13	The challenges of risk adjustment
14	will be particularly important as
15	patient-reported outcomes at the individual
16	level are translated to performance measures
17	and quality indicators at the facility and
18	population level.
19	A second challenge is how to
20	facilitate the evolution of patient-reported
21	outcomes to include patient-centered outcomes.
22	The Affordable Care Act and the creation of

	Page 287
1	the Patient-Centered Outcome Research
2	Institute have placed increased emphasis on
3	the role of stakeholders and consumers, not
4	just in the assessment of outcomes but as
5	partners in the decision-making process
6	regarding the content of what should be
7	measured.
8	A final challenge is how to
9	monitor, identify, and reduce unintended
10	consequences. We are all aware of examples of
11	unintended consequences resulting from changes
12	made in health care that were implemented with
13	the best intentions.
14	We don't want to create a
15	patient-reported outcome or quality indicator
16	that becomes the kudzu of health care.
17	(Laughter.)
18	DR. OTTENBACHER: My major advisor
19	will respond to telling his Ph.D. students
20	that doing outcomes research is a lot like
21	raising children. You always think you're
22	going to do a better job next time.

	Page 288
1	(Laughter.)
2	DR. OTTENBACHER: The careful and
3	thoughtful assessment of patient-reported
4	outcomes, as reflected in this workshop, and
5	the high-quality scholarship evident in the
6	draft of the PRO methodology paper indicate
7	that we really will be able to do a better job
8	next time in creating quality indicators that
9	reflect patient-reported outcomes.
10	Thank you.
11	DR. WU: Thank you. I will try to
12	unravel myself from the kudzu to say that,
13	interestingly, some of the problems that
14	plague individual-level change, measurement of
15	individual change, are less of a problem for
16	measuring group change.
17	So many of you with an
18	epidemiologic bent may have more insight into
19	this than I, but for some of the tasks for
20	quality measurement and accountability, we
21	actually may still be able to look at change
22	scores in one form or other.
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1	Anyway, great discussions. And
2	every kept time sufficiently so that we have
3	I think now, do we have 20 minutes or do we
4	have a little bit more? Did we start a little
5	late? Great.
6	So first comments from the panel?
7	Oh. Yes, please?
8	MEMBER CELLA: I don't know if I
9	could just say something about people who are
10	gathering their thoughts. My experience of
11	Dr. Ottenbacher's brief presentation was that
12	it was really a marvelous overview of a lot of
13	work that has been done and that we have
14	learned about measuring change. So
15	congratulations. Very well done in this short
16	period of time.
17	It got me thinking about something
18	that I think could work very well in this
19	process that could bring also in this sort of
20	patient engagement side as well in a group
21	like this.
22	To do a technique that really

1	
	Page 290
1	draws from educational testing and looking at
2	achieving standards. And that's bringing
3	together experts. In this case it could be
4	experts like people here in this room along
5	with patients that represent the patient
6	perspective in the community, showing them
7	data.
8	They are blind to scores. They
9	don't see numbers. They just see profiles.
10	They see people. Here's a person who's got
11	this much pain. Here's how they're
12	functioning.
13	And then you go through I won't
14	go into details of the methodology, but there
15	are various methods that allow groups to form
16	a consensus opinion about what kind of
17	difference would matter. And you can also put
18	in extra methodology to get a value for how
19	much would that be worth.
20	The essential thing would be to
21	bring experts, people like you and patients in
22	the community, together to come to consensus

	Page 291
1	on units of change that would matter. And you
2	also articulate why they would matter. And
3	then these could become standards that get set
4	for achieving either maintenance or
5	improvement.
6	DR. WU: Ethan?
7	MEMBER BASCH: I can comment on
8	some of our research within the oncology world
9	around symptom-specific or demand-specific or
10	population-specific measurement versus more
11	generic. And in general, adherence rates over
12	time are much higher with very
13	content-specific measures, measures that are
14	more common when there are fewer zero values.
15	It is actually a very strong relationship
16	between how specific we are to the world of
17	the patient and the patient interest and
18	willingness to report.
19	Similarly, interestingly, there is
20	also improved adherence when the provider is
21	involved in the process of collecting the data
22	when, for example, a letter is sent to the

Page 292 1 patient saying, you know, "Dr." so and so or 2 "Nurse" so and so "is very interested in your participation in this information." 3 In general getting buy-in from providers to do 4 5 that is much greater, again, with context-specific measures. 6 7 So it seems the closer we get to 8 the context of use or the fitness for purpose, 9 the more everybody kind of perks up and feels 10 that this is relevant. And they become more enthusiastic about participating. 11 12 DR. WU: More comments from the 13 panel? John? 14 MEMBER WASSON: Yes? 15 (Laughter.) 16 MEMBER WASSON: Hello, Mother. Ι saw a moment of silence there. I didn't want 17 to let it lie fallow. 18 19 In particular, in regard to Jim 20 Bellows' points, I just wanted to go on the 21 record as saying he is right on but not far 22 enough. By that, I mean we are all operating

	Page 293
1	in a current paradigm mindset that is good
2	Twentieth Century thought process. But the
3	median is becoming the measure.
4	And we have to recognize all of us
5	use cell phones, for example, and we're still
6	talking about portals for EMRs. And we're
7	wondering why patients don't respond to new
8	methodologies. And the answer is they're not
9	in control. You don't want to answer surveys
10	that you don't control nowadays. You want to
11	control. We have to deal with that reality.
12	Just to echo the point that was
13	just behind me, in our experience, we have
14	been doing this a long time in primary care
15	and other practices. When the clinician
16	should say, "This is part of care. This is
17	part of the service to you," the response
18	rates one time around, even on the internet,
19	are well over 80 percent, not this 30 percent
20	cap stuff that goes out. That makes life so
21	much easier for analytics, et cetera.
22	While you are serving the patient

	Page 294
1	needs, you can put in a few measures that
2	matter. And each patient needn't have the
3	response burden of the entire instrument
4	because you can aggregate it over many
5	patients to get at the accountable care
б	organization.
7	So, in other words, all I am
8	saying is just what Jim said, that the
9	useability and the service to the patient, put
10	that first. And then we can fold in measures
11	for accountability quite easily. And we'll
12	have high response rates and get away from a
13	lot of the issues that Ken just articulated.
14	You know, how do you deal with risk
15	adjustment, et cetera, et cetera?
16	So I just think there are
17	practical approaches. I know there are. And
18	I think Jim's right on the money. And I worry
19	that if we stay too locked into the old style
20	paradigm that is still in the back of our mind
21	of mail-out surveys, you have to complete all
22	or most of the items yourself, we're in

Page 295 trouble. 1 2 But if we look at it from a population point of view, where individuals in 3 my practice get three items and another 4 5 individual randomly gets three items, you can still aggregate it up to my practice. 6 And, then, finally, you can 7 8 crosswalk the PRO measures across practices 9 very easily. There are just so many technical solutions to a lot of the issues we're talking 10 11 about. 12 A Cronbach's alpha stands in our 13 way. All right? A Cronbach's alpha stands in 14 our way because it doesn't allow that thought 15 process. 16 DR. WU: So the ghost of Alvan Feinstein is smiling, I think. 17 18 MEMBER WASSON: Absolutely. He would call this quantiphrenia. 19 20 DR. WU: Yes. On the other hand, 21 I think that, even though some young people 22 are thinking nostalgically about remember when

Page 296 we used to have PCs. 1 2 I think that patient portals don't necessarily have to be the enemy. They can be 3 friendly. They can also be ported, 4 incidentally, to your cell phone. But in many 5 ways, if they designed properly, they can 6 7 provide the patient with a lot of value. They 8 can help them schedule appointments; cancel 9 appointments; look at lab tests; communicate directly with the physician in a confidential 10 way; and, incidentally, fill out PROs. 11 So I 12 am not sure that that is entirely dead. 13 MEMBER WASSON: Knowing they are 14 all intended. 15 DR. WU: Not yet. There. How's 16 that? MEMBER LARSEN: I am Kevin Larsen. 17 18 I am from ONC. A little perspective from 19 where I came from before, which is Minnesota. 20 And we have been doing essentially 21 patient-reported outcomes for about five years 22 as part of structured programs called

Page 297 1 Minnesota Community Measurement. 2 You know, in my own clinical practice as a primary care doctor, we were 3 doing asthma control tests and a PHQ-9 test 4 for five years as a statewide measurement 5 6 program. 7 My practice was in a country 8 hospital, which 20 years ago had thrown away 9 all patient forms because the patients never filled them out. Our health fiduciary rates 10 were low. We didn't get any kind of response 11 12 to anything on paper because of reading levels and language levels. 13 14 So we had a system-wide strategy where we actually administered these verbally 15 to patients across our home care organization. 16 17 And it turns out that actually happened guite a bit within the State of Minnesota. 18 19 In my own practice, I actually was 20 an early adopter because I was a medical 21 director. And so I had to make sure that I 22 was doing things that had to happen.

	Page 298
1	So I actually administered these
2	myself for three years, asked all my
3	depression patients their own PHQ-9 scores.
4	What I found is I got 100 percent
5	response rate. And mostly it was because we
6	used this as a tool to jointly decide about
7	patient care. So it wasn't just for the
8	patient, and it wasn't just for the doctor.
9	It was used right in the point of
10	care. I would show them a graph on the
11	computer, "Here's how you were last time.
12	Here's how you are now. I think your
13	depression is worse. Let's think about
14	escalating your therapy."
15	And, all of a sudden, this tool
16	that we think of as an accountability tool
17	became the visibility tool for the patient and
18	the doctor to really think through what should
19	they do about care right now.
20	And to my mind, that's the most
21	exciting news of patient-reported outcomes
22	because it really moves health forward. It

	Page 299
1	doesn't just beat people up for not doing
2	something that we think they should do.
3	DR. WU: That is really what we're
4	talking about, about getting things into the
5	work flow for both patients and providers.
6	More comments? Yes? I see a
7	hand. It's attached to Ted perhaps.
8	MEMBER GANIATS: It's Dr. Ted. I
9	am sorry. I was being so good. Then Dr.
10	Wasson had to speak up.
11	Everything that is being said is
12	very good, though it's contradictory. And Dr.
13	Taylor-Clark brought up some excellent points.
14	And Dr. Wasson brings up some excellent
15	points. And this guy I can't read his name
16	tag brings up some excellent points. The
17	problem is that they all contradict each other
18	a little bit.
19	If what we want what do we want
20	the patient-reported outcomes to be? Do we
21	want them to be clinically actionable,
22	important, real time? Then that is going to

Page 300 decrease the usability of an institution to be 1 2 able to increase retention rates. 3 Do we want it to be part of a pay 4 for performance to try to improve quality over 5 time? That may or may not be as actionable at 6 the patient bedside? Do we want to help 7 employers choose a health plan that might require something different? 8 So I think all of the points are 9 10 I just think that we have to keep excellent. reminding ourselves that sometimes we're 11 12 talking about different types of PROs. And not all of them are going to be able to be 13 14 used for all of the purposes. 15 Gosh, as a clinician, I would love to have everything be useful all the time, but 16 17 I just think we have to be really clear about 18 what is going to be used for quality 19 improvement, what is going to be used in 20 clinical practice, and what is going to be 21 used for the other purposes. 22 DR. TAYLOR-CLARK: I actually

	Page 301
1	don't think that what you are saying is that
2	we were contradictory. I actually think that
3	you made something much more clear in what we
4	said, which is that as we're thinking about
5	criteria I know we're not using the word
6	"criteria," but as we're thinking about how
7	we're going to choose these measures and what
8	we're going to actually end up using them for,
9	we have to make the distinction of whether
10	we're going to be able to use them for
11	purposes of accountability or useability or
12	whether we're going to be able to use them in
13	the clinical improvement process or for
14	self-management.
15	I loved the example that you just
16	gave about using the outcomes for shared
17	decision-making, which is ultimately what you
18	did. And so there are different ways that
19	these measures are obviously going to be used,
20	but I think that that has to be a part and
21	parcel of our thinking around how we're going
22	to develop and design the criteria for these

Page 302 1 things. 2 DR. WU: Great. Shall we open 3 this to the back of the room? And also, Operator, can you please open the phone lines? 4 5 We're moving on to the back of the room. 6 MR. CUNNINGHAM: We will pause for the phone lines. Operator, if there is anyone 7 in the queue? 8 9 DR. WU: **Operator**? 10 MR. CUNNINGHAM: Are you still with us? 11 Farrah? 12 DR. WU: Hello? 13 THE OPERATOR: Yes. If you would 14 like to ask a question, please press \*1 on 15 your telephone keypad. 16 MR. CUNNINGHAM: Thank you. 17 If anyone in the back of DR. WU: 18 the room wants to use their phone to ask their 19 question, that would be fine. 20 (Laughter.) 21 MR. CUNNINGHAM: I am not hearing 22 anything on the phone.

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1	DR. WU: One size does not fit
2	all. Any questions in the back? Comments?
3	Lew? Lew, could you please move to the back
4	to ask your question?
5	MEMBER KAZIS: Hi. I had two
6	questions. One was for Dr. Taylor-Clark. I
7	really liked your comments, especially the
8	ones related to thinking out of the box.
9	RWJ has had a real investment in
10	looking at community health and the issues
11	around assessment tools that, in fact, are
12	supposedly gauging the physician when, in
13	fact, there are much broader issues as the
14	community. There are issues of access,
15	something as basic as, does the ambulance, in
16	fact, come within ten minutes of an MI?
17	The question I have is, where do
18	you see those types of metrics moving, in what
19	direction; and how, in fact, can one begin to
20	think in terms of operationalizing them in the
21	context of our health care system?
22	DR. TAYLOR-CLARK: I think that is

	Page 304
1	a really tough question. And certainly those
2	that have been part of this what we call the
3	social determinants of the health world have
4	had this as a problem, you know.
5	And so the way that I would
6	actually see the measures as not necessarily
7	at this point, as Jim described, not
8	necessarily being used for purposes of
9	accountability or payment for the provider
10	but, one, as a monitor for understanding how
11	especially new delivery systems, integrated
12	systems, are actually working to improve the
13	health of their patients, not just the health
14	care processes of their patients and certainly
15	outcomes are getting us to that.
16	So one would be for monitoring,
17	but the second is, as we think about
18	accountability in terms of public reporting
19	and Al and I had this question. I said,
20	"Well, what is accountability?" You know, I
21	have to go back to the basics on everything.
22	And he said, "Well, I think it's

	Page 305
1	actually, really, about public reporting."
2	Well, that's going to be an extraordinarily
3	important place for these types of measures to
4	be for patients to be able to make decisions
5	about, if they can, make decisions about,
6	where they get treated and how they get
7	treated.
8	But it will also be a check on the
9	system, not necessarily on the individual
10	providers but on the system, to be able to
11	say, "We need to be able to provide
12	resources."
13	And my example of linking to
14	social and community resources is one of
15	potentially many that we could consider and I
16	think that we should consider. But I think it
17	is going to put the onus on the system to
18	really think through how they engage with
19	other systems.
20	And I think that is where we want
21	to go. That is where I would like to see us
22	go. I don't want to stick just with health

	Page 306
1	care. And I don't think that this is a
2	revolutionary concept, but I think we spend a
3	lot of time talking about health care systems
4	and structures and we put the onus on
5	providers. And ultimately this is about
б	improving health broadly.
7	And so in order to do that, we're
8	going to have to start developing the linkages
9	and the relationships with other types of
10	systems so that we can improve health.
11	And I think that in order to do
12	that, we have to start the monitoring
13	somewhere.
14	DR. WU: Great. We've got
15	something back. I see a waving microphone.
16	MS. BARANOWSKI: Thanks. My name
17	is Rebecca Baranowski. I'm with the American
18	Board of Internal Medicine.
19	I have to say, first of all, as
20	someone who has a background in test
21	development, it was really exciting to hear
22	the discussion of CAT and DIF and IRT. It

	Page 307
1	took me back to a previous lifetime.
2	There was some discussion about
3	the need to keep patient surveys short. And
4	I have often heard that if patients consider
5	the questions relevant, that length is not so
6	much of an issue.
7	Can anyone comment on that?
8	DR. WU: Well, I will say from our
9	own experience that that is true. If someone
10	feels like you are we are doing a lot of
11	service with oncology patients. And if we are
12	asking them questions about their own health
13	needs, the things that maybe gaps in their
14	goals or achievements, they are happy to talk
15	about those things all day long on paper or
16	elsewhere.
17	On the other hand, they can be
18	very annoyed by very short surveys that they
19	don't think are worth their time.
20	Other comments?
21	MEMBER KALDENBERG: I think that's
22	true. I think the respondent's interest in

	Page 308
1	completing the questionnaire or an interest in
2	the topic of the questionnaire will lead them
3	to answer more questions.
4	So if a patient or any respondent
5	looks at a questionnaire and says, "I don't
6	understand its purpose. I am not particularly
7	interested in it," they're not going to
8	respond; whereas, if, as Albert said, it is
9	something that either has been demonstrated as
10	important to you, it's a part of your
11	treatment plan, it is important to you because
12	"I'm interested in my health. You can ask
13	about as many questions as you want." And I
14	think there's a lot of literature that says
15	that's true.
16	DR. WU: David?
17	MEMBER CELLA: Yes. You know, I
18	guess I would like to give an answer that's in
19	between what lies under your question and
20	things that Drs. Bellows and Wasson were
21	saying. So yes, patients like to be asked
22	questions about how they're doing almost

	Page 309
1	universally and providers that aren't used to
2	that and you see them in research studies.
3	You know, you will hear patients
4	say, "I think these questions should have been
5	asked all along." And they're very happy
6	about it for the most part.
7	But, coming back to what Dr.
8	Bellows and Dr. Wasson were saying, there's a
9	point at which they reach a limit. And
10	sometimes that point comes by being asked the
11	same questions over and over again, you know,
12	every three months or for some period of time.
13	I've had the same experiences with
14	seeing technology be exciting for a while.
15	And then you lose it unless it has become
16	really ingrained in the clinical setting.
17	So I completely agree and from
18	experience as well, not as much as Dr. Wasson,
19	but we really do have to make these relevant.
20	But I don't think, unless I
21	misunderstood what you said, Dr. Wasson
22	well, you know, if I'm doing IRT, I can agree

	Page 310
1	that Cronbach's alpha is standing in our way,
2	but I'm not sure if that's what you meant
3	because Cronbach's alpha is in classical
4	theory and you don't need it in IRT. In fact,
5	it's irrelevant. And you can get very short,
б	very relevant assessment.
7	So I think there is a solution
8	here. And just the other part of my response
9	to that is that it's not just the patient, of
10	course. It's the provider's side. They have
11	to continue to be enthusiastic about it
12	because they're the ones paying for it to be
13	done. So it's really a partnership in that
14	respect.
15	DR. WU: I will add to that. You
16	know, whenever you ask anyone to do things
17	repeatedly, their interest gradually
18	extinguishes. I think it's a physiologic
19	response that we can't do anything about.
20	On the other hand, if you, we,
21	respond to someone's complaint about their
22	satisfaction with an element of their care and

	Page 311
1	tell them what you're doing about it or,
2	alternatively, if you respond to some bit of
3	feedback that they give you about the amount
4	of pain they're having and tell them what
5	they're doing about it, the next time they're
6	much more likely to continue to respond.
7	So I think that, again, what we do and
8	how we handle all of this is very important.
9	MEMBER NELSON: One of the cases I
10	referred to but didn't explain very much was
11	the rheumatoid arthritis registry in Sweden.
12	And there the survey that patients are
13	completing is actually fairly long. It takes
14	them about 20 minutes.
15	These people have a serious
16	disease: RA. And it used to be that this
17	information was collected for research only.
18	It was a registry. And now it's actually
19	collected so that the nurse or the doctor
20	looks onto the patient's current and past
21	results against the treatment plan so that the
22	next steps in the care plan can be responsive

	Page 312
1	to their disease activity and how they are
2	doing.
3	And, by report, when this
4	scientific registry was redesigned to actually
5	help the patient, patients like their care
6	much better. It absolutely changes the
7	fundamental clinician-patient relationship.
8	It makes it much better.
9	They've now added a care designer
10	to help the 60 RA centers in Sweden do this
11	well, embedded in the care design with a
12	person with RA. It helps the new centers take
13	it on.
14	And the trends over time show that
15	people are starting RA sicker, but they end up
16	at 12 months having much better disease
17	scores. And they're doing better.
18	So I think it is possible under a
19	focused context to actually have this
20	information be extremely relevant to me
21	it's all about me as a patient to the
22	relationship and what that relationship is

	Page 313
1	doing for my care plan and actually seeing if
2	my outcomes are getting better.
3	And under those conditions, how
4	long it takes me to complete the survey, 10
5	minutes or 22 minutes, isn't relevant because
6	now we've got an instrument panel that guides
7	me and our care and how we're doing to monitor
8	our care.
9	And that's becoming a model that
10	the rest of Sweden wishes to adopt for all
11	relevant registries. And Michael Porter is
12	popularizing that in Sweden and now back in
13	the U.S.
14	So I think there are new ways of
15	doing this that can be rather what would
16	the term be? disruptive.
17	DR. WU: I think that rings very
18	true. We're coming to the end of our time.
19	I'm going to ask one more time if there's
20	anyone on the phone: Operator or anyone else.
21	THE OPERATOR: As a reminder
22	DR. WU: Yes?

	Page 314
1	THE OPERATOR: As a reminder, if
2	you would like to ask a question, please press
3	*1 on your telephone keypad.
4	DR. WU: Wait. I think I'm
5	getting a call from Kathy Lohr.
6	MEMBER LOHR: This is just one
7	minor observation or question. In talking
8	about shorter forms versus longer forms, at
9	least for some ways of answering
10	questionnaires, have people been trying to
11	build in ways that you can stop and then go
12	back?
13	Because I get this kind of
14	questionnaire in various ways and various
15	purposes, not so much for health care. And
16	beyond about 10 or 15 minutes, you're either
17	tired or you get interrupted. And if you
18	can't save what you've done and then go back
19	to it when you're either not so distracted or
20	whatever, it's extremely annoying. And you
21	might not the next time ever start knowing
22	that you are likely to be interrupted and

Page 315 can't save it and go back. 1 2 So I'm really just asking whether 3 for people who are implementing a lot of these 4 things, through portals or almost any of these 5 mechanisms, do you build in ways for people to say where they have gotten and go back? 6 7 MEMBER BELLOWS: We don't have it 8 yet, but our her vendor is delivering it in 9 its next release very shortly. 10 You know, to me, this is partly coming back to the submerging theme that has 11 12 come out so great, which is that it's all about context. 13 14 It's not just about the measure. It's about the measure used, how often, with 15 16 how many patients, with what follow-up that's 17 really sensitive to people's care and with what degree of control. And it's just built 18 19 out so beautifully. 20 DR. WU: Great discussion. Т 21 think we are going to wrap up. I would like 22 to thank the panel members and members of the

	Page 316
1	audience and, of course, people on the phone.
2	MS. PACE: So we are going to have
3	a short break. And we'll ask you to try to
4	reconvene at 3:20. And Kathy is clapping. So
5	thank you, panel.
6	(Applause.)
7	MS. PACE: So we will try to
8	reconvene at 3:20 if possible.
9	(Whereupon, the above-entitled
10	matter went off the record at 3:10 p.m. and
11	resumed at 3:27 p.m.)
12	CO-CHAIR BRENNAN: Good afternoon,
13	ladies and gentlemen. I am Patty Brennan. I
14	am co-chair of the panel today. I am not sure
15	everyone is as excited about this session as
16	I am, but I am very excited about this
17	session. And I think we will get some more
18	people excited about it shortly.
19	When we speak about
20	patient-reported outcomes, we often look to
21	efficient ways to both understand the process
22	of care that a person has been engaged with as

	Page 317
1	well as a place to store the assessment,
2	perhaps that assessment of their outcome
3	having dual use for their individual care
4	processes as well as the accountability and
5	quality improvement goals that the NQF has.
6	The electronic health record as we
7	know it today is probably not the best place
8	for it, but it's a starting point to think
9	about the electronic infrastructure necessary
10	to acquire patient-reported outcomes, organize
11	them in a way that helps us make meaningful
12	interpretations for the patients' progress as
13	well as the care and also have a way to begin
14	to aggregate for the institutions' awareness.
15	This afternoon we have a report
16	from the Commission paper. I'm happy today
17	David Cella is back again to speak with us.
18	And we'll have a reactor panel of three
19	individuals.
20	I am going to be introducing
21	everyone now to coordinate the time best.
22	It's just about 3:30. We are going to go

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	Page 319
1	discussing the experiences in their outreach
2	group.
3	David?
4	MEMBER CELLA: Hello again. I am
5	happy to say I don't know if I am happy or you
б	will be happier to hear that this will be my
7	shortest tee-off. It's a par three session,
8	at least for the tee-off.
9	Okay. So let's try to broaden the
10	conversation and talk about the health or
11	health-related internet applications that
12	deliver a range of content, connectivity, and
13	clinical care, keeping in mind that most
14	e-health is driven by the electronic health
15	record that the provider offers to the
16	patient, although certainly not the only.
17	So what does that include? It
18	includes health information, individual and
19	group; online formularies, prescription
20	refills; I use it many of you probably
21	use it appointment scheduling and test
22	results; I've used it advanced care

	Page 320
1	planning and health care proxy designation,
2	not used that yet, but it's available in some
3	systems. And these applications tend to focus
4	because they were built for them on the needs
5	of the health care providers and the health
б	care organizations.
7	And this has I think been a theme
8	today that I didn't necessarily anticipate,
9	but it is in the paper that there is also
10	little evidence regarding whether these
11	services offered are those that patients
12	actually desire.
13	Next slide. So how about the side
14	of integrating PROs into electronic health
15	records and personal health records? PROs
16	will likely constitute and important aspect of
17	future stages of meaningful use.
18	Now, you could tell me I'm wrong
19	and maybe I am wrong, but three years ago I
20	went to a hospital administrator who will go
21	nameless and said, "Hey, I think you really
22	need to pay attention to PROs because you're

	Page 321
1	going to need to for meaningful use."
2	And he's a very nice guy. He
3	said, "You know, I think we can kind of comply
4	with meaningful use without worrying about
5	PHO. So no thank you."
6	I don't think that's true anymore,
7	but you tell me. And if it's in the future of
8	meaningful use, then we ought to try to make
9	it meaningful.
10	So critical features involve
11	interoperability, as you know, widespread
12	health information exchange, automated
13	real-time quality and cost measurement, which
14	the PROs can fit into, and sophisticated
15	analytic capabilities that we certainly could
16	engineer into the PRO site.
17	Next slide. So some important
18	issues. First is the patients' perspective.
19	Patients do want to be involved as partners in
20	the flow of information, in health information
21	exchange. They're certainly in their own
22	personal health record.

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	Page 322
1	You know, as we talked about in
2	the last session, the clinical buy-in is
3	really essential for good equality data over
4	time especially. In order to get that buy-in,
5	one important component that has to be
6	compatible with clinical flow, I mentioned
7	meaningful use.
8	And I suggested earlier eventually
9	an issue of patient privacy, the actual
10	physical transfer of patient-based PRO
11	measures from the patient/the provider, there
12	is a privacy, a possible, concern there. And
13	then the electronic transfer of data or
14	unauthorized access to patient-quoted data can
15	cause privacy concerns or alerts.
16	So some key design principles in
17	integrating PROs are to fit the measures into
18	the flow of care, as I mentioned. The design,
19	the system with stakeholder engagement it
20	has got to be relevant and meaningful to
21	merge the PRO data with other types of data so
22	it's not a set-aside, stand-alone system,

	Page 323
1	although it is easier up front to build the
2	stand-alone system, as we and others have, and
3	to engage in continuous improvement of those
4	systems based on user experience and
5	technology, so sort of basic principles of
6	getting it integrated; relevant; and,
7	therefore, getting the buy-in and long-term
8	sustainability.
9	Next slide. One of the things we
10	developed with PROMIS, which I haven't
11	mentioned yet today, is an assessment center,
12	which is a web-based portal. I just mention
13	that we and others have done these sort of
14	set-aside systems.
15	So there is a web-based assessment
16	system that anyone can use. You can go to
17	NIHPROMIS.org. And you can take some CATs
18	yourselves this evening when you have got
19	nothing better to do other than watch the
20	Olympics and see how your depression and
21	fatigue levels are after this meeting.
22	So NIHPROMIS.org. And you can go

	Page 324
1	test yourself on a demo. But it's a
2	disconnected system. We don't ask you who you
3	are. You don't tell us who you are. You can
4	just try this out.
5	But if you wanted to use an
6	electronic health record environment, you
7	would need to link it to the electronic health
8	record. So, to that end, we've got SNOMED and
9	LOINC codes and have been working with
10	different her vendors to integrate assessment
11	center or the data capture and scoring
12	algorithms into the electronic health record.
13	So that is work that is ongoing and should
14	help maintain a truly sustainable integrated
15	system.
16	So I think that's the last slide.
17	Those are my introductory tee-off comments.
18	Thanks.
19	CO-CHAIR BRENNAN: Thanks very
20	much, David. Are there questions before David
21	sits down for clarification and more
22	information? We don't want him to go just
	Page 325
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1	yet. Comments or questions specifically for
2	David's section?
3	(No response.)
4	CO-CHAIR BRENNAN: Okay. Thank
5	you very much, David. I appreciate it.
6	I am going to ask Uma if you are
7	ready to begin your remarks. Please?
8	DR. KOTAGAL: Good afternoon.
9	Thank you very much for inviting me. Before
10	I make my comments about the PROs in the EHR,
11	which is the topic we were asked to focus on,
12	I would just want to give you some context.
13	So this will be in the context of
14	a large academic health center. About 50
15	percent of our patients come from outside our
16	region. A lot of our work is very specialized
17	care. And all of it is pediatrics. So our
18	patient-reported outcome conversation is in
19	the context of that.
20	Secondly, put the focus in terms
21	of our bias towards action and the fact that
22	we are really interested about

Page 326 1 patient-reported outcomes in the context of 2 improvement, as opposed to thinking about it 3 in the context of performance measures, so that our believe is that we will need to do a 4 5 lot of work on practical applications of patient-reported outcomes and improvement 6 7 before we could really look and say how this 8 is going to fit into performance measures. So 9 I just wanted to talk about that a little bit. 10 We have been engaged with patients and families for a long time, starting in 2002 11 12 with cystic fibrosis, families that taught us how to think about patient engagement. 13 And 14 all of our chronic disease teams have patients sitting at the table to help us think about 15 16 what is important to them. And we accompany 17 that with a fair amount of internal clinician 18 engagement and training that enable us to look 19 at patient-reported outcomes in the context of 20 improvement. 21 Our work on patient-reported 22 outcomes began with a five-year plan that asks

	Page 3	327
1	us to think about transforming care for	
2	children in chronic and complex disease for 60	
3	conditions in the next 5 years. So we are	
4	looking at patient-reported outcomes in the	
5	context of clinical outcomes, patient-reported	
6	outcomes, and evidence-based processes, all of	
7	which we are looking to embed into our her	
8	with a combined reporting in the form of small	
9	multiples that allow us to look both at	
10	clinical outcomes and patient-reported	
11	outcomes at the same time.	
12	A major interest, of course, is in	
13	scale. And so we are beginning to build our	
14	registries at this point primarily in Epic, in	
15	the content of Epic, and then using our	
16	reporting systems to be able to derive	
17	population-based data so that the individual	
18	patient data is within the system, the	
19	population-based data is sort of ad hoc or on	
20	top of it.	
21	Our expectation is to build all	
22	components of Ed Wagner's chronic care model	

	Page 328
1	into our Epic registry, which, of course,
2	relates back to my earlier comments about the
3	role of self-management and self-confidence
4	and how the use of the patient-reported
5	outcomes can adjust that balance between the
6	provider and the patient, which, of course,
7	remains a gradient at this point in time.
8	Our early lessons have told us
9	that when we incorporate patient-reported
10	outcomes into the registry and into the
11	patient encounter, that provider behavior does
12	change. But it starts with engaged
13	clinicians. So our process does require us to
14	have engaged clinicians.
15	For the 60 diseases, we currently
16	have patient-reported outcomes in about 10.
17	We'll have another five at the end of about
18	ten months from now. And then we'll be
19	building our way up to the next 40.
20	So the clinicians with patients
21	choose the outcomes. And that's a really
22	important consideration. They choose both the

	Page 329
1	clinical outcomes of interest and the
2	patient-reported outcomes of interest. And we
3	are not at this point requiring every chronic
4	disease team to have patient-reported
5	outcomes, but we are offering the invitation.
6	If they are interested, we would work with
7	them to do that.
8	So then our process really allows
9	us to engage with the clinicians, consult with
10	them, with the patients, decide what the
11	outcome of interest should be, go back to the
12	methodologists, and ask them the right
13	questions to figure out what is the right
14	measure, what is the evidence, what measure is
15	out there, what needs to be modified so we
16	come up with the right reported measure.
17	And all of this is at the
18	disease-based level. In addition to the
19	organization level, we are piloting with
20	measures of care coordination; measures of
21	patient experience that are not embedded or
22	related to the ER; and in some cases PHQL as

	Page 330
1	a broader generic measure of quality of life,
2	as opposed to a disease-specific measure; and,
3	finally, patient self-confidence in the
4	context of self-management.
5	So that's the context in which we
6	work. The process and I want to just go to
7	my first slide here. I just used an example.
8	This is data from some time ago. These are
9	children with obsessive compulsive disorders.
10	And I picked this one, as opposed to
11	depression or functional outcomes or PROMIS
12	scores, just because, even in the area of OCD
13	in young children, we find that
14	patient-reported outcomes are and can change
15	the way it works.
16	This graph shows you data on four
17	segments of patients that the clinicians
18	self-classified. So we begin with a measure
19	called the Symbyax, which is a gold standard
20	of measure for patients, for OCD, but it's
21	very lengthy, back to our comments about how
22	dense the measurement can be.

	Page 331
1	We have modified it, proved that
2	it is scientifically valid. And we began with
3	paper and pencil, then with a self-standing
4	kind of electronic system. And now it is
5	incorporated into the electronic health
6	record.
7	So the child comes in and fills a
8	question, answering the question, "Did it get
9	you or did you get it?" answering it in the
10	context of burden of disease. This is then
11	printed off.
12	Actually, the patient is tagged as
13	sort of requiring a PRO measure at the clinic
14	so that when they check in, the registration
15	person gives them a confidential password as
16	well as the information. We're currently
17	doing it both using kiosks and tablets.
18	The patient fills in the data.
19	The data is printed off. The patient has the
20	data along with the family and the provider
21	has the data.
22	So the conversation begins similar

	Page 332
1	to some of our discussions at the last break
2	that say what is going on since the last time
3	you see and what is happening.
4	And then this is obviously
5	measured at each visit. The central concern
6	here is how do we improve outcomes for
7	patients. And when we do that, we find that
8	the encounter gets to be very interesting. So
9	it is for the individual patient that it
10	matters, which we then roll up into a system
11	or into a whole population level there.
12	Therapists find that they can stay
13	focused on treatment goals. The patients and
14	families find that they have a clear endpoint
15	in mind so that they may say that when your
16	symptom score gets to this level below 13,
17	that's the end of our treatment. The care is
18	more efficient because all of this information
19	is available and the conversation can be more
20	focused.
21	And, actually, what we have found
22	is that by putting these evidence-based

	Page 333
1	practices into place, giving providers and
2	clinicians a conversation to have with the her
3	and the patient that we are able to detect
4	these patterns.
5	So on the top right-hand side, you
6	will see the response rates are pretty fast in
7	some kids, high being not so good, low being
8	better. On the left-hand side, you see a
9	slightly different response rate. In the
10	third graph on the bottom left, you'll see no
11	changes in response. And the fourth is the
12	exact pattern.
13	This was really done by looking at
14	the data and segmenting it, sitting down with
15	clinicians to do that. When the clinicians
16	get together using this data to figure out
17	what is going on, they concluded that their
18	primary factor was actually a dose effect.
19	In other words, with children with
20	OCD, the primary treatment is exposure to the
21	compulsive disorder. And in the different
22	groups, they were exposing them to different

	Page 334
1	dose effects, which they then through
2	discussion were able to modify. And then on
3	the next slide, you'll see I think the percent
4	of children that have at least a 40 percent
5	reduction in symptom scores. In this case, I
6	think the number they have a target number
7	that they use but find that they can make a
8	big difference.
9	So we are using this idea of a
10	kiosk or a tablet. We are not using portals
11	at the present time for entering data, teeing
12	it up to the clinician, a conversation by
13	clinicians agreeing both on the measure and
14	the target, and then a collaborative group
15	that together decides how they are doing, why
16	some people are doing better, why other people
17	are not with a goal, then, for improvement in
18	the functional measure.
19	So I'll stop with that and take
20	any questions at the end.
21	CO-CHAIR BRENNAN: Could you just
22	speak a little bit about how this gets into

Page 335 1 your electronic record now? Is there a 2 special section or does it go as a narrative note? 3 DR. KOTAGAL: So currently it goes 4 5 into the electronic record as a pulled-up 6 document that shows the graph. The graph that 7 we get at Epic looks more like the one you see 8 on the last one, not like the previous one, 9 which is a little bit more interesting. But 10 it does get that way. And the population-level data also 11 12 gets pulled out and is reported that the team 13 looks at on a regular basis. 14 CO-CHAIR BRENNAN: Thank you. 15 Are there clarification questions 16 you would like to ask Uma before we go on to our next comments? 17 18 (No response.) 19 CO-CHAIR BRENNAN: Okay. Thank 20 you very much. Our next speaker will be Kevin 21 Kevin joins us from the ONC. Larsen. 22 DR. LARSEN: Hi. I am the Medical

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1	Director of Meaningful Use for the ONC, a
2	general internist by training and was doing
3	that up until March, when I moved here and
4	will hopefully be doing it again soon here in
5	D.C.
6	I would start with a brief story.
7	I grew up the brother of a type I diabetic.
8	And so he was diagnosed with type I diabetes
9	when we were both young children. And I lived
10	through the change, the paradigm shift of
11	doctor-directed care to patient-owned care
12	through the eyes of my type I diabetic
13	brother.
14	And it was really about 20 years
15	ago that we stopped calling the doctor for
16	every insulin injection. For the first 15
17	years of his diabetes, every single time we
18	were going to change insulin, it was a phone
19	call to his doctor, sometimes in the middle of
20	the night. And that shift to self-management
21	was a radical, wonderful shift that my brother
22	undertook.

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1	He is a software engineer and very
2	bright and able to do this stuff. He recently
3	got a continuous blood sugar monitor. And he
4	now is in the best control he has ever been
5	because he has the best real-time instant
6	feedback.
7	That virtuous cycle of feedback to
8	patients and tools to help them self-manage is
9	really where I think we are headed. And that
10	is really where I want to think about, how do
11	we support that infrastructure much more
12	broadly than just my brother and type I
13	diabetes.
14	For meaningful use, for those of
15	you who don't know, it's an incentive program,
16	a CMS incentive program for hospitals and
17	eligible providers, largely doctors but
18	dentists and nurse practitioners as well, to
19	implement in electronic health records. And
20	they don't just get paid for plugging a
21	computer into their office.
22	They actually have to demonstrate

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	Page 338
1	that they're using it in a way that improves
2	patient care. And that way is measured as
3	clinical quality measures. And those clinical
4	quality measures that have a secondary goal is
5	that we start to make electronic and automate
6	the capture of quality measurement that has
7	historically been done as either claims or
8	chart abstraction.
9	So many of us are living the life
10	of innovating around how to take one type of
11	measurement and now put that into a new world,
12	a new way, the clinical quality measure. And
13	I see many of my e-clinical equality measure
14	friends here.
15	The program has three stages. The
16	second stage is just about to the policy is
17	about to be launched, but it won't actually
18	happen until 2014. And we're in the process
19	of building requirements ideas for the third
20	stage.
21	This is really the infrastructure.
22	This is the chance to really influence the

	Page 339
1	infrastructure of electronic health records
2	across the country because this is a giant
3	cash infusion with quite a bit of incentives
4	from CMS.
5	We are thinking about how can this
6	infrastructure contain the building blocks
7	that we want for the future of patients, the
8	future of health, the future of health
9	quality. And so this is our opportunity to
10	say, "Here are the things. Here is the focus,
11	few things, that we should invest the
12	country's money in so that we can have the
13	infrastructure that we want to assure that we
14	are able to let people live healthier lives."
15	In the process of this, we have to
16	think of things in a new way. And one of
17	those ways is measures now become software.
18	Instead of a measure being a piece of paper
19	that lives in a document for someone to read
20	through, the group of us that is working on
21	these e-measures think of it as software.
22	So if a measure contains 15

	Page 340
1	different possible survey instruments,
2	somebody has to encode 15 different survey
3	instruments into whatever computer system
4	there is, keep those up to date, make sure
5	they all work, make sure that they all provide
6	the kind of results that they provide.
7	That is completely possible. The
8	question is the cost. Is that the right way
9	to spend the money?
10	And also, just like you can have a
11	proliferation of Apple and Microsoft and
12	everybody else with their own kind of
13	platform, the more that the electronic health
14	record measurement world has its own way that
15	each group wants to do things, the more it
16	costs everybody to keep up, maintain, and use.
17	So we have really been working
18	towards this building blocks idea. How can we
19	take tools that we can use as we build
20	infrastructure and use them over and over and
21	over again for multiple different purposes, as
22	opposed to building software that's only

	Page 341
1	specific for one little, tiny purpose and
2	can't be leveraged for other things.
3	An idea around that is something
4	like an app store. So you could imagine, any
5	of you that use an iPhone, Apple built the app
6	store. And then lots of people can put an app
7	in there as long as it conforms to all of the
8	rules to fit into that app store.
9	And so we are starting to think
10	about what we call a flexible platform, which
11	might be something like PROMIS has stood up.
12	It might be any number of things. But the
13	ideal world, at least to my perspective, is a
14	world that the infrastructure exists that can
15	very easily accommodate new instruments, new
16	tools, new ways without us having to stand up
17	something specific for each new thing we want
18	to use.
19	And we had a lot of talk about
20	work flow. Work flow is actually very
21	important in the implementation of these
22	measures, as anyone who has done it will tell

	Page 342
1	you. And I would say you have to think about
2	not just the work flow of the provider. You
3	have to think about the work flow of the
4	patient because now the patient is engaging
5	with the system and the patient has a work
6	flow. And their work flow should be paramount
7	as we think about patient-reported outcomes.
8	And articulating that and having
9	an ability to accommodate lots of different
10	styles of patients in lots of different ways
11	they might want to engage in the system is
12	going to be very important. So we need to be
13	really flexible.
14	I'll leave with another example
15	from where I just came from. So in Minnesota,
16	the Patient-Centered Medical Home Program has
17	a very specific set of requirements. And one
18	of those requirements was actually that we
19	have patient-defined care goals and that we
20	track the patients' response to their own
21	defined goals. And they didn't have to be
22	care. They could be anything the patient

	Page 343
1	wanted.
2	So we had to build an electronic
3	system that could track response to any goal
4	that a patient could articulate. And we did.
5	We built a system that could take a free text
6	thing. And it built a five-point scale. And
7	the patient got to determine what that thing
8	was "I want to be able to dance more."
9	"How well can you dance now?"
10	would be the item on there and they would get
11	to score them one to five. And then each time
12	they came back, we would rescore and say, "Are
13	you dancing better this time than you did last
14	time?"
15	This was a home run hit with the
16	patients. They got to frame the whole
17	discussion, not around our scientifically
18	validated survey instrument. They got to
19	frame the discussion about "This is what is
20	important to me right now. This is what I
21	want us to talk about." And then it helped
22	the provider also frame that visit around this

	Page 344
1	is where the patient wants to go.
2	So I think that it is really
3	important that we have goals that we can use
4	across different organizations to compare one
5	provider type to another provider type in
6	different scientific frameworks.
7	It is also really important that
8	we have things that patients say, "This is of
9	value to me." And thinking about how we can
10	do that might lead us down a very different
11	path than thinking about what makes the most
12	sense in the context of a specific disease
13	state or specific category.
14	Ideally, they are complementary, I
15	think, rather than exclusive.
16	CO-CHAIR BRENNAN: Thank you very
17	much, Kevin.
18	Any comments or questions for
19	Kevin before we go on? Yes, Steve? Steve,
20	you have to pick up the microphone. Thank
21	you. And make sure it's red. It's red.
22	Green, green, green. These are red. Those

Page 345 1 are green. 2 MEMBER FIHN: Well, not to be 3 outdone by my curmudgeonly colleagues, I want to sort of pursue I think a potential line of 4 5 discussion that emanates from this. And bear 6 with me for one second because I think it is 7 important when we think about the EHR. 8 So I really appreciate the 9 comments, particularly of Kevin. So the VA 10 has been engaged in a very tortuous dance with one of our other federal partners for the last 11 12 couple of years to build a joint medical 13 record. 14 And the upshot of that is that in order to do that, actually, we have had to 15 16 take an approach which Kevin is suggesting of reusable code. Actually, I'm told next week 17 18 we'll have an agreement with Apple for an app 19 store. 20 But if you take that and you think 21 about PROs, so we talk about apps where people 22 put stuff into the record. These apps

Page 346 1 ultimately patients are going to want to get 2 stuff out of the record, too. Once you have established that 3 4 paradigm of patients being able to right the 5 record, get back from the record, we no longer own the records anymore. In fact, one could 6 7 then go down the road and think about we 8 actually don't have an her anymore. The 9 patient has an EHR. If you want to talk about 10 patient empowerment, actually, that's where I think we're going, that we will cling 11 12 selfishly for a lot of economic reasons for the record, but it's going to be an uphill 13 14 battle. 15 So if you then sort of say -- you 16 know, I mean, I think one of the points I 17 wanted to make is we are putting -- this 18 really may be the foot in the door or the 19 camel's nose under the tent that actually 20 leads to medical centers having spent tens of 21 millions, hundreds of millions of dollars on 22 records which no longer actually may not be as

Page 347 1 relevant to them anymore. We could talk about 2 that, in which these patients will actually own their records and have full access to 3 them, which I think if you start thinking 4 5 about patient recording, I think it is really important. 6 7 I think Kevin's other point about patient-identified goals, actually I kind of 8 9 mentioned that before you came in. We have a 10 program with the severely wounded OEF/OAF veterans who come in. Actually, they have 11 12 something called a federal recovery plan for a person, you know, work for the government. 13 14 You know, they're really cool. 15 And, actually, they ask the patient, you know, "What is your goal?" 16 17 It's "I want to walk in five years." And that becomes a plan. And all the 18 19 care gets built around that, those sets of 20 goals. And that's incredibly powerful from my 21 perspective. 22 But, you know, I think, actually,

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1	you want to throw some bombs here. One of the
2	bombs may be that, you know, we don't have a
3	medical record anymore.
4	CO-CHAIR BRENNAN: I appreciate
5	that as a starting point. We are going to
6	hear from Ted Rooney in just a moment, but I
7	want to see if Kevin has a quick comment he
8	might want to make on that.
9	DR. LARSEN: So the advisory
10	committees that really inform our work for
11	meaningful use have been thinking about that
12	exact same thing for quite a while. And what
13	I'll say from being an organization that did
14	invest a lot of money and had a great big EHR,
15	I think it becomes like do you own the stuff
16	on your computer anymore.
17	And you start to know which stuff
18	you do own and which stuff you don't own. And
19	you kind of know where the interface is. And
20	so there's some stuff you really do own and
21	you know you own it. And there's other stuff
22	that you know that you always go back to the

1	
	Page 349
1	same website. And that might change, but you
2	don't really care. And there's some stuff
3	that's really somebody else's.
4	So I think that the more you live
5	it, that that becomes less of an anxiety
6	provoker for you. But I think when you start,
7	when you have only ever had a computer not
8	connected to the internet, the internet is
9	scary.
10	But when you are actually there,
11	you start to figure out, "Well, the internet
12	isn't that scary. I still can control my
13	stuff. And I can get other things and share."
14	CO-CHAIR BRENNAN: We are going to
15	have a very lively discussion I'm sure about
16	this one.
17	(Laughter.)
18	CO-CHAIR BRENNAN: And the other
19	people in the room, don't worry. You didn't
20	waste your money.
21	Let me move to Ted Rooney's
22	comments. And then we'll open for the whole

	Page 350
1	discussion. I remember the people on the
2	phone and on the internet. You're welcome to
3	pose questions also. Ted Rooney from Maine.
4	MR. ROONEY: Hi. I am Ted Rooney,
5	obviously. I work with two groups in Maine.
6	One is the Maine Health Management Coalition,
7	which is an employer/union-led regional health
8	improvement collaborative that focuses on
9	performance measure, public reporting, payment
10	reform, benefit design, consumer engagement.
11	I also work for a provider of that
12	multi-stakeholder group, Quality Counts, which
13	really focuses on quality improvement and
14	getting consumers involved in the partners in
15	care. Together they run the Aligning Forces
16	for Quality initiative in Maine. So I'm sort
17	of in the middle there.
18	We also have an active health
19	information exchange. So everything has to be
20	electronic anymore. We do our performance
21	measurement through NCQA and Bridges to
22	Excellence. And we have got about 500

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1	different physician and PCP offices in Maine.
2	We define a practice as a physical office
3	location. So even a group may have seven
4	offices. We count one practice.
5	And there are probably about I
6	don't know 60-70 percent of those having
7	reported got recognition from NCQA or Bridges
8	to Excellence in something, whether in office
9	assistance survey diabetes or heart disease.
10	And the diabetes are clinical outcomes
11	embedded in there.
12	And one of the things we realize
13	is we have these steering committees that help
14	run the program, you know, 14 docs and 6
15	employers and 3 health plans. And a year or
16	two ago, we were talking about getting
17	recognition. And there is this doc over here
18	who talks about having spent 20 hours trying
19	to get data out from his chart and even from
20	the EMR in order to apply to NCQA to get
21	diabetes recognition.
22	And so I turn to Frank Bragg, who

	Page 352
1	is a straight doc with Eastern Maine Medical
2	Center. And I say, "Frank, how long does it
3	take you to get recognized?"
4	He said, "Well, I don't do
5	anything" because he happens to have
6	Centricity. Centricity works with MQIC.
7	Every night his data gets uploaded, and he
8	gets reports every month. He's just looking
9	at increasing reports. And he gets recognized
10	as a byproduct of giving great care.
11	And then he takes that data. And
12	he works within his own group of docs, like a
13	performance assessor. You know, they
14	aggregate the data. They work together. They
15	drive performance up.
16	And we have been fans with the D5,
17	which is the Minnesota measurement that looks
18	at the five elements of diabetes and they
19	track it over time. And we looked at that
20	like five years ago. And there were people
21	doing maybe five or ten percent of getting all
22	their patients the goal of all five areas.

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1	And we like that because that is a
2	patient-centered measure.
3	Typically you measure how many of
4	the doc's patients have a hemoglobin at this
5	level, how many of the doc's patients have an
6	LDL of that level. But they changed the
7	paradigm by saying, "How many patients are for
8	all levels?"
9	And, all of a sudden I haven't
10	looked for the last month or two, but some of
11	the practices are up in 50, 60, 70 percent of
12	their patients echo for all those measures.
13	They dramatically change the paradigm, I
14	think, in delivering good care.
15	And that's what we began to see
16	happen when people have data electronically
17	that they control, they believe, and they use.
18	Now, I'm absolutely convinced that
19	there's no way in hell Frank would have had
20	all the time and resources to do that if there
21	wasn't a performance measure, that his
22	practice wasn't rated publicly on it, he

	Page 354
1	wasn't paid on it, there's no way he would
2	have had the time to do it.
3	So we talk in Maine a lot about
4	doing the head and the heart. I mean, the
5	heart is the right thing. It gets the
б	physician energized. This is good care. But
7	the head is the business case. Every
8	physician needs resources. You can't get
9	resources without a measurement.
10	And I actually think that CMS has
11	got it well, they've got a lot of things
12	right, but I have been trying to figure this
13	out. I think I finally figured out today
14	where they have this list of 33 measures that
15	ACOs are to be measured on. And I am
16	particularly interested in this because we
17	have one pioneer and three shared savings
18	models in Maine. So I know they are going to
19	be measuring it.
20	And they have this functional
21	status, health status section that I guess was
22	going to be part of CAHPS that has got about

	Page 355
1	5 or 6 SF-36 questions that I could see as
2	well as some other neat health risk questions
3	and everything.
4	And, whereas, every other
5	mechanism is reporting the first year and to
б	pay the second year, pay for the third year,
7	this one is reporting all three years.
8	Well, I know for a fact that when
9	I go back to Maine, I am going to start
10	talking a lot about this. And even though
11	these providers won't get paid on this for
12	three years, they are going to pay so much
13	attention to it because they know that's where
14	it's going.
15	We've got at least providers who
16	used to pay for performance. So you just have
17	to threaten pay for performance down the road.
18	(Laughter.)
19	MR. ROONEY: And that gives time
20	for the clinicians to work the heart because
21	most of this stuff is the right kind of thing
22	to do.

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1	And so if you can set the system
2	up in place where you know it's going to be
3	reported, you know it's going to be paid for
4	eventually, but you give the docs the right
5	measures at the right time and let them work
6	with it. I think we're going to see
7	tremendous improvements.
8	And I think, at least for me,
9	we're big fans of the patient-centered medical
10	home concept or advanced primary care. And
11	it's no longer the docs by themselves anymore.
12	And so when I think of the
13	clinical data, I think you want the doc or the
14	clinician getting some of the data from PROMIS
15	or health risk appraisal stuff, but maybe in
16	that practice, it's not the doc who is the
17	care manager or maybe it's an aide. I mean,
18	how does the practice take that data and get
19	the right data and the right time so in the
20	clinician in that encounter with the patient,
21	they do the right things?
22	Like, do we want our PCP spending

Page 357 1 five minutes of every visit counseling someone 2 to stop smoking? No. But we probably want 3 them to spend 30 seconds telling the importance of it and giving the warm handoff 4 5 to a care manager, who spends a half-hour with 6 them, refers them to a stop smoking clinic, 7 and follows up to see how they are doing. 8 So I think the more we can get 9 this data electronic, the more we can sort of 10 have it as being part of a practice. And the more we can think about who needs to see that 11 12 data in order to make right decisions, I think 13 some of this stuff will work itself out, but 14 we've got to start because if we don't start, what we find is our clinicians are our best 15 16 innovators. 17 If you wait until you have it perfect and then hand it to them, it's too 18 19 If you give it to them in a safe enough late. 20 space, like -- again, maybe we'll publicly 21 report it next year or the year after -- it's 22 going to happen, but give them some time to

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1	work with it and refine this up. I think
2	we'll see tremendous innovation.
3	And if we think of the system of
4	care, it's not just about the doc. You know,
5	I'd like our practices to tell us. You know,
6	even in the docs I talk to, it's funny. You
7	know, we're all individuals. Some docs really
8	want to see the data themselves. They want to
9	go in there, and they want to strategy it and
10	look at it.
11	And another doc doesn't care about
12	that. He wants his care manager to do it. He
13	just wants to know which patient should I pay
14	attention to? What are the key points? And
15	what should I do with them?
16	We've got to begin to think about
17	that in a team-based environment. Different
18	members of the team will do different things
19	and do it well. And we talk a lot about
20	practicing the top of your license. So you
21	get the least paid person doing the most. In
22	fact, that's probably what the VA and the feds

	Page 359
1	have done for a long time.
2	How do we think of a system of
3	care? And then how do we think of the
4	patient-reported outcomes? What do we measure
5	in the right way? You know it has to be
6	electronic, but who needs to see it when? How
7	often do we do it?
8	And how do we know or how do we
9	point to how does a person know what to do
10	about that? So, for example, if we do a
11	yearly survey of everybody in a practice with
12	a functional status measure and you get an
13	aggregate data, how do you know of the
14	2,000 people who made up that panel, how do
15	you know who to do what with?
16	So you've got to do it on an
17	individual level, but at an individual level,
18	you know, if you do it on an individual level,
19	can you roll it up hopefully? Because one of
20	the things we're big fans of is that
21	performance measure should be a byproduct of
22	giving great care, like Frank does.

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1	I mean, we don't want our
2	clinicians, we hate it when our clinicians,
3	start to worry about which measurement program
4	to follow. It's a waste of time. We say,
5	"Well, just give great care. You know, let us
6	try to figure out how the measurement and
7	reward systems help you give great care and
8	reward you for it. And do it in such a way
9	that they know they have to do it, but give
10	them enough time so that they have a chance to
11	do it right, at least the early majority
12	folks."
13	And so that's sort of my take on
14	it. If we don't get it in the electronic
15	health record, no one is going to pay
16	attention to it. But we've got to do it in a
17	way that is helpful and that we find this
18	balance between improvement and reporting and
19	accountability. And I think it's doable.
20	It's just not easy.
21	CO-CHAIR BRENNAN: Thank you very
22	much.
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1	Comments or questions for Ted?
2	Yes, Kathy? Go for it, then.
3	MEMBER LOHR: I am stuck. I am
4	one of those Luddites who sort of doesn't do
5	a lot with computers and that sort of thing,
6	really. But I haven't heard anybody say about
7	whether much of this stuff can be stored on
8	and the software placed on the cloud.
9	And it's as if people are still
10	talking about storing all this stuff on
11	servers someplace or something like that. I
12	may be wrong, but that was kind of the sense
13	I had. That was one question.
14	Another, Kevin, is really for you.
15	Is there a time frame for the specs for
16	meaningful use 3? Because would that help to
17	put in some time perspective what NQF is
18	trying to do with this whole effort? And I
19	don't know what the dovetailing is of the time
20	frame.
21	And the third question, which is
22	maybe for everybody, is, but perhaps picking

<pre>1 up on what Ted was saying about, "We'll start 2 now. And then three years down the road, 3 people will be ready," are medical school or, 4 let's say, stick with physicians. Are medical</pre>	
<ul> <li>2 now. And then three years down the road,</li> <li>3 people will be ready," are medical school or,</li> <li>4 let's say, stick with physicians. Are medical</li> </ul>	
<ul> <li>3 people will be ready, " are medical school or,</li> <li>4 let's say, stick with physicians. Are medical</li> </ul>	
4 let's say, stick with physicians. Are medical	
5 schools trying to teach this stuff?	
6 Is the AAMC on board? Are the	
7 specialty boards and so forth on board, if you	
8 will, with moving in this direction? And if	
9 they're not part of the conversation soon,	
10 should they be? And I don't know the answer	
11 to that one either.	
DR. LARSEN: So I can tackle the	
13 first two. I'll start on the third one. The	
14 question about the cloud, we really have a	
15 high bar of performance we need to have for	
16 patients. And that is we need to be flexible	
17 and adaptable to what patients want and need.	
18 And we need to give them access. And they	
19 need to be in complete control of their own	
20 data.	
21 So they need to be able to tell us	
22 when and where that data should go and need to	

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1	be able to tell us which data they want to go
2	where. So that is a lot of the work that ONC
3	does: building the standards for how that
4	works, certifying that systems can do that,
5	and starting to provide a regulatory
6	environment that allows all of those sort of
7	challenging concepts to live together and make
8	sure that happens.
9	Can it happen? Of course, it can
10	happen. Your bank does that, right? So your
11	money flows all around electronically. And
12	you have trust in your bank that somehow
13	through a combination of incentives and
14	regulation, that they keep track of your money
15	and it doesn't just slip out electronically
16	through someone else. We have to do that same
17	kind of thing in this more complicated
18	landscape of health care.
19	So, to the cloud question, yes, we
20	could use the cloud. Currently the regulatory
21	environment and the certification environment
22	are a little bit new for people to trust the

	Page 364
1	cloud to say, "I'm going to put my data there
2	because I believe that it is going to be
3	protected in the same way that the bank
4	protects my data." We have to get to that
5	level of trust in order for people to want to
6	use the cloud for their data to be stored.
7	It's part of the reason hospitals
8	are a little bit nervous about sharing with
9	each other. It's not because they don't think
10	it's the right thing to do. It's because
11	they're nervous that they'll be held
12	accountable if the information gets shared
13	with somebody else and somebody else doesn't
14	have the same level of security that they do.
15	Back to the sort of easiest
16	question of yours, which is the meaningful use
17	3 timeline. The rule, preliminary rule, will
18	probably be out in a year to 18 months or
19	something like that. And so right now the
20	reason I had to step out is we were on a call
21	with the Quality Measures Workgroup. And
22	they're busy framing up what their initial

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thoughts will be for how meaningful use 3
 looks for doing it over the next couple of
 months.

And then that comes out as sort of a series of questions to the country as a whole, "Hey, what do you think about this? What do you think about that? Please send us comments." This is a very, very public process. And we are really open. We really welcome and open everybody's opinion.

But this fall we're starting to 11 12 try to frame what will be the major themes for meaningful use 3. And then over the course of 13 14 the winter and next spring and summer, we'll be refining those, sometimes directing them to 15 16 specific committees or task groups or other places to say, "Hey, give us some really 17 18 specific thing that we can go on with this." 19 And the last to this start-now 20 question, interestingly, I was at a meeting 21 the American College of Surgeons put together. 22 And it was a fantastic meeting with surgery

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1	representatives from a lot of the major
2	surgical societies. They were all on board
3	about this. This was not someone from outside
4	driving this. This was the surgeons saying,
5	"We want this. We think that the outcomes of
6	our patients are what is really important to
7	care."
8	And they wanted to measure safety.
9	They thought that safety was really important.
10	Surgical outcomes as measured by patients were
11	really important. I can't necessarily speak
12	to all of the other places being on board.
13	I know that there is a lot of
14	culture change that we will likely need to
15	have health care undergo to really move this,
16	but from the leadership standpoint, I can see
17	it happening.
18	DR. KOTAGAL: I can speak to some
19	of the other societies. I think all of the
20	boards are certainly working together around
21	this question of quality outcomes. The
22	American Board of Internal Medicine, the

Page 367 American Board of Pediatrics are all doing 1 2 that. And it's all linked now to 3 recertification. So that if you want to be 4 5 recertified, you have to sort of show data and show evidence around improvement in the 6 7 process and in the outcomes. And there are 8 some standards for that that have to be met. 9 So that's happened. 10 CO-CHAIR BRENNAN: Are there other 11 questions? Yes? 12 Phyllis Torda from MEMBER TORDA: NCQA again. We're working with Kevin and our 13 14 colleagues from Dartmouth -- and we're almost all here as well -- on three measures that use 15 16 patient-reported outcomes with some portion of 17 those measures designated for meaningful use 18 stage 2 and were included in the draft reg and 19 then some for stage 3. So I thought it might 20 be helpful to just share what we have been 21 able to accomplish and what we haven't. 22 So the three measures are

	Page 368
1	measurement of functional status before and
2	after hip replacement, before and after knee
3	replacement, and for patients with CHF.
4	In each of those cases, the goal
5	for meaningful use stage 2 was what we called
6	a building block measure. And that was to get
7	some agreement on a defined set of tools, not
8	one tool but a discrete set of tools, and to
9	begin to be able to document that those tools
10	are being used to measure in the case of hip
11	and knee replacement before and after and CHF
12	periodically.
13	So we have gotten that far. We
14	have applied for the codes, the LOINC and the
15	SNOMED codes, to be able to document that.
16	There are some barriers in terms of the sort
17	of current standardized structures for quality
18	measures and being able to accommodate all of
19	that data, but that is probably more important
20	for the future.
21	Our goal for meaningful use stage
22	3, which we're really hoping to start

	Page 369
1	beginning virtually tomorrow, is to then be
2	able to say what improvement would be.
3	So the task that we have before
4	us, which is a little bit scary in light of
5	the paper and all of the discussion today, the
6	task that we have before us, is we have three
7	measures. We're hoping to sort of be able to
8	do hip and knee replacement at the same time,
9	multiple tools.
10	And for each of those tools, we
11	need to be able to define in a standardized
12	way what would clinically meaningful
13	improvement be so that we can then come up
14	with the algorithms and test them to measure
15	it.
16	So that's where we are and where
17	we are not.
18	DR. LARSEN: I will make just a
19	quick comment that I look to the NPRM2. We've
20	got about five other measures that, in some
21	way or another, you could talk about or think
22	about their patient-reported outcomes, so

1	
	Page 370
1	things like the PHQ-9 for depression, asthma
2	control test scores, fall risk assessment,
3	suicide risk assessment. Depending on how you
4	phrase something like a suicide risk
5	assessment and you think is at a
6	patient-reported outcome or is that just an
7	assessment, it kind of depends on your
8	perspective.
9	The systems think of those as,
10	hospital systems think of those
11	patient-reported outcomes because they have to
12	administer a survey, which feels to them like
13	something else that other people would call a
14	patient-reported outcome. I think that from
15	the measurement community, they think of those
16	as an assessment, not as an outcome.
17	But, anyway, there are a number of
18	proposed measures that take in account this
19	standardized collection of patient data into
20	the EHR.
21	MEMBER BASCH: A quick comment
22	again. Sorry, folks. Focusing a little bit

	Page 371
1	on Kevin's comments, the first is I believe in
2	meaningful use, I think in phase 1, there was
3	engage patients and their families
4	DR. LARSEN: Right.
5	MEMBER BASCH: in health care,
6	which I think was more focused around
7	providing a copy of the record to the patient,
8	but the spirit is sort of there. I mean, the
9	functionality wasn't. It probably was
10	developed early on.
11	I remember a conversation with
12	David Blumenthal way at the beginning. I
13	said, "Well, what about patient-reported
14	outcomes?"
15	He says, "Well, you know, we're
16	really far from that." But, you know, we've
17	got to focus on the nuts and bolts first.
18	But, you know, it seems that the spirit was
19	there.
20	One area where this is perhaps
21	immediately applicable is in the review of
22	systems. So if you think about it, you know,

	Page 372
1	physicians do review of systems all the time.
2	That's a part of the EHR. But they are
3	symptoms, right?
4	So the way that we think about
5	these things now, 2012, is those things that
6	the patient is in the best position to report,
7	right, should be reported by the patient. A
8	review of systems is nausea, vomiting,
9	fatigue, shortness of breath, chest pain, leg
10	swelling, skin rash, all these experiences
11	that the patients have, but we as clinicians
12	report that.
13	And we know from abundant research
14	that we as clinicians systematically
15	underreport both the incidence and the
16	severity of those phenomena.
17	And one could argue that there
18	should be the immediate capacity for an her to
19	collect PRO data for the review of systems as
20	a part of functionality of EHR, some
21	interesting thoughts.
22	DR. LARSEN: I think it is a great

	Page 373
1	idea. I think the kinds of things that we are
2	trying to get to apply to lots of patients and
3	lots of providers. And we can actually
4	certify them that the system can do this.
5	And so those are exactly the kinds
6	of ideas we are looking at because we could
7	apply that to lots of patients. We could
8	apply that to lots of doctors. And we could
9	certify that an electronic health record could
10	do that.
11	Then it's up to people like the
12	people in this room to figure out what to do
13	with that information once it's entered in.
14	As far as I know, there's not a
15	particular national standard review of systems
16	other than what CMS requires for E&M billing.
17	And CMS is pretty prescriptive about what they
18	want for evaluation/management billing. So
19	that could become the standard by which we
20	capture these symptoms, but you might imagine
21	a different standard that had more meaning to
22	patients.

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1	CO-CHAIR BRENNAN: Ted has a
2	comment.
3	MR. ROONEY: As far as meaningful
4	use, two examples that just make you want to
5	cry. You know, I mentioned before what we're
6	doing, NCQA and Bridges to Excellence, which
7	are really the only real outcome measures out
8	there for primary care.
9	And the story I told about Frank
10	Bragg with Centricity being able to report
11	through Bridges to Excellence, we have been
12	working to Bridges to Excellence and all the
13	major EMR vendors for a year now. We can't
14	get any other EMR vendor to do it because it's
15	not a meaningful use.
16	The second story, we're working
17	with Gene Nelson at Dartmouth. He's helping
18	us with some ACO measures. And we have this
19	wonderful practice right in my hometown called
20	Emerges of Family Doc. And he's totally
21	bought into this stuff. He wants to take
22	PROMIS and integrate it into his practice,

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Page 375 among other things. 1 2 And all he wanted to do was get it 3 in a way that makes the work flow. He's qot 4 Centricity. He's got a hospital that supports 5 him. And for four months, he's been trying to get his IT folks to get some help to go ahead 6 7 and implement the PROMIS into the work flow. And he hasn't been able to do it. 8 9 I was just talking to Melanie 10 about, you know, being able to do that. And why hadn't he been able to do it? Well, the 11 12 hospitals are so focused on meaningful use that they are not doing this thing. 13 14 And so here you have this really dedicated clinician and his team who wants to 15 16 do the right thing who can't. So I'm going to 17 talk with Kevin about what I can do to get 18 this stuff into meaningful use. But if we 19 don't get it in now, more and more I think --20 there are clinicians out there in the field, 21 maybe not in the Beltway, in the field, who 22 want to do this. This is the right thing to

	Page 376
1	do. And we've got to help them.
2	CO-CHAIR BRENNAN: Mary had a
3	comment first and then Rita.
4	MEMBER TINETTI: I just wanted to
5	begin by addressing Kathryn's questions about
6	medical schools. I am hitting our patient
7	care curriculum for Yale University, which is
8	certainly not known as a forward-thinking
9	medical school. Nobody is here listening.
10	(Laughter.)
11	MEMBER TINETTI: But everybody is
12	on board. And I'm hitting it. We have ED,
13	surgery, et cetera. And what we're trying to
14	do is decide, throw out the curriculum that
15	was great to training doctors for the
16	Nineteenth Century and make them for the
17	Twenty-First Century.
18	And we're all about this stuff.
19	And, in fact, it's kind of the chicken and the
20	egg. We're waiting to see what are the
21	measures we should be training our docs in.
22	So I think this is all informing

	Page 377
1	everything. And we're finding a lot of other
2	medical schools are doing it as well. The
3	problem is the faculty are so far behind where
4	their students are. But I think it is going
5	to happen.
6	I want to sort of address Ted's
7	point. I think, like everything, this seems
8	to be sort of a top-down approach. We're
9	going to be telling docs what to do and
10	patients what to do, but I think your point is
11	well-taken. I've spun that over and over
12	again.
13	There are docs that are just doing
14	it. You know, we machinate about it. We have
15	meetings. And there are people that are just
16	doing it. They don't report it. They don't
17	publish it. And I know it sort of challenges
18	the entire group to find those people.
19	And we can talk about the
20	barriers, why we can't do it. Let's talk to
21	the people that are doing it. And I think
22	this would be sort of a great form to sort of

	Page 378
1	begin to get that to happen.
2	What is useable? What is really
3	happening out there that's really informing
4	clinical practice as well as policy. And I
5	think that is something I hope this group
6	won't forget about.
7	CO-CHAIR BRENNAN: Thank you.
8	Rita and then Lori. Yes? Am I
9	calling you the wrong name? I'm sorry.
10	MEMBER GAGE: It's all right.
11	CO-CHAIR BRENNAN: Thank you.
12	MEMBER GAGE: There is a lot going
13	on, actually, even within the Medicare
14	program, not so much well, I can't speak to
15	the physician. And the hospital end is kind
16	of coming along. But when it comes to the
17	area of post-acute care, the rest of the
18	delivery system, the skilled nursing
19	facilities, the rehab hospitals, the specialty
20	long-term care hospitals, the home health
21	agencies, CMS has been pretty busy the last
22	five or ten years in running a consensus-based

	Page 379
1	approach to identify what types of assessment
2	items or clinical items ought to be measured
3	on the different populations so that they can
4	monitor quality in the Medicare program, set
5	payment rates, all of that.
6	And, in complement to that, they
7	have been working on a lot of these
8	interoperability issues to develop the
9	HL7-associated terminology to be able to
10	transfer data across the different settings.
11	So, as this change is going on in
12	all of the ACOs and the A4FQs and the CVEs,
13	out here on the other part of the system, they
14	are kind of moving ahead. And, you know, they
15	have the LOINC codes, and they have the
16	interoperability. And they are working with
17	the standard committees to move it forward.
18	So, going back to Mary's point
19	about building on what is going on, there's
20	quite a bit going on outside of the physician
21	community and perhaps even within I just
22	don't know the physician community.

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1	CO-CHAIR BRENNAN: Thank you.
2	Comment here? Okay. Lori? Wait
3	a second. Kevin has a comment.
4	DR. LARSEN: The only thing I will
5	say is that the national surveys show that the
6	penetration for electronic health records is
7	much higher in the acute care and ambulatory
8	care and that the long-term care penetration
9	and home care penetration of electronic health
10	records is actually much, much lower. The
11	adoption is quite low depending on how you
12	define the electronic health record.
13	MEMBER GAGE: Thank you. Very
14	important point about language. And what we
15	found in traveling across the country and
16	speaking to all of the different communities
17	is that language differs.
18	So the electronic health record,
19	the electronic medical record, you have the
20	little slice over here with the personal
21	health record, not completely duplicative.
22	And you have the existing system, which the

Page 381 1 provider is using to manage their patient 2 care, manage their billing, submit the bills 3 to the payers. 4 So yes, I think we are just at the 5 start of it, but there's a lot in place on which you can build. 6 7 Hi. MEMBER FRANK: Lori Frank, 8 PCORI. I was quite taken with this notion of 9 goal attainment scaling. When you put into 10 Pub. Med. "goal attaintment scaling" and "performance measurement," three articles pop 11 12 up, one of them from 1984. 13 I mean, that's not necessarily an 14 index of how widely this is used, but I am interested in your opinion and others' 15 16 opinions about the advisability of GIS for 17 performance measurement. 18 And then perhaps David could 19 comment on whether there's an opening here for 20 some form of adaptive testing that could be 21 used for the goals. 22 DR. KOTAGAL: I can't speak to the

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1	her pursuit, but I think goal attainment is
2	very much a part of the self-management work.
3	And, as providers are trained in really
4	working with patients on self-management,
5	posing the question really starts with asking
6	what your goal is. As part of our registries,
7	we are incorporating those into our models for
8	measurement and reporting.
9	There is a two-part process to it,
10	as we talked about. And the very important
11	part of it, as I said earlier, is flattening
12	the gradients between the provider and the
13	patient so that the conversation about
14	meaningful goals is real and not just simply
15	something that we pass on into the electronic
16	record. But if we are able to do that, I
17	think we will see much bigger shifts in
18	outcomes than we have to date.
19	DR. LARSEN: And I can speak to
20	the Minnesota perspective that I lived
21	through. So our patients in the medical home
22	program in Minnesota, it's actually called

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	Page 383
1	the health home program. And it's not NCQA.
2	It's actually an 85-item Joint Commission-like
3	certification process, where they do site
4	visits and require a whole number of system
5	organizational culture and processes be in
6	place.
7	It's a fairly new program in
8	Minnesota. And I led the implementation at
9	our site. And it was really through that
10	process that they would come and assess, "Were
11	you living out the spirit of what we had in
12	our program, rather than looking for just
13	numbers?"
14	So it was a sort of accountability
15	program, but accountability, much more like a
16	Joint Commission certification accountability,
17	rather than a 60 percent of your patients
18	reached 5 or more.
19	They didn't really care about
20	that. They cared that when they watched our
21	clinicians talking to patients, our clinicians
22	really asked about the patients' goals. And

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we really had a system to track the patients'
goals.
That's a fundamentally different
sort of qualitative approach to measurement
that there is some experience, especially
through the Joint Commission, in doing, but
it's really the approach that Minnesota took
in certifying its health homes.
CO-CHAIR BRENNAN: What you are
hearing is that the electronic health record
doesn't exist in a vacuum. It exists in a
context, in a system.
I see David. And did you also
want to speak? Yes? So David and then you.
MEMBER CELLA: Lori actually asked
about whether there would be an opportunity
for measurement or use of item response 3 with
goal attainment scaling or goal setting.
Actually, I used to work with Amy
Peterman, who is now at University of North
Carolina, Charlotte, developed one of these
goal attainment measures. They're very tricky

	Page 385
1	to score because you have to make an
2	assumption that, despite the variety of goals,
3	that the underlying thing that you're
4	measuring is attainment of that goal. And
5	it's difficult to pull that off.
б	However, I do think there is
7	potential here when I think about a goal of
8	being able to dance. You know, where I would
9	go with that is so so if I'm this patient's
10	doctor and this patient says that she wants to
11	be able to dance more, well, why can't she
12	dance as much as she wants? Is it fatigue?
13	Is it pain? Is it limited range of motion?
14	Now, we measure fatigue, pain, and
15	range of motion. We don't measure dancing.
16	But we measure the things that are interfering
17	with that person's ability to dance.
18	So I guess I would go down that
19	direction and say to the extent that the goals
20	can be broken down into clinically
21	intervenable elements that are PROs, then
22	you're back to the point where you're to help

	Page 386
1	the patient dance.
2	I assume that the doctor is not
3	giving a dance lesson.
4	(Laughter.)
5	MEMBER CELLA: You know, they're
6	treating the problem that the patient you
7	know, it could be depression. It may not be
8	something physical.
9	So that's a great idea. It's very
10	personalized. Of course, that's what means
11	something to patients. I guess I would work
12	toward breaking that down to the components
13	that are the clinical intervention points.
14	CO-CHAIR BRENNAN: Up here in the
15	front. And then we'll also check on the phone
16	line in just a minute to see if there's anyone
17	waiting to ask a question.
18	MEMBER WASSON: Just to carry
19	David's point further, frankly, very few
20	people have dance as a goal. And I think that
21	is an important point that when you look at
22	tens of thousands of people who do

	Page 387
1	problem-solving online and we have done
2	that they have pretty much come into
3	patterns, four or five patterns, for which
4	then you can ask the secondary question of,
5	how confident are you that you can reach this?
6	And you can norm across all the sites
7	immediately. So it's really not a difficult
8	issue technically.
9	CO-CHAIR BRENNAN: So there are
10	multiple approaches to getting that level of
11	a targeted, patient-focused
12	MEMBER WASSON: Yes. I mean, you
13	just picture, for example, adult population.
14	You already know that about 80 percent, it
15	turns out, right now of adult Americans,
16	either they are overweight, they are not
17	exercising, they are smoking, or maybe they
18	are having a few too many drinks. You're up
19	to that number already.
20	And that can be fed back online in
21	real time "Which one do you want to work on?"
22	Which is their goal? They'll pick one of them

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	Page 388
1	for starters. And then "How confident are you
2	right now?"
3	And they'll say, you know,
4	whatever the number, however you rate it. And
5	then they go into a registry, and you follow
6	them up. And you can see change over time,
7	however you decide to measure it. It's not
8	technically difficult just because, again, you
9	are going with the 80 percent rule. You're
10	not going with the dancing, which is probably
11	one of the one percent rules.
12	CO-CHAIR BRENNAN: I think what I
13	am also hearing is that there are emerging
14	information tools that might be external to
15	the clinical care facility that might be
16	useful in measuring, identifying achievement
17	of our accountability and quality improvement
18	and goals under NQF that may be useful to
19	examine.
20	MEMBER WASSON: Just to carry
21	Steve's point, Steve Fihn's point, further and
22	Kevin's point, as we move toward more and more

Page 389 1 patient control of their information, it then 2 can be moved into the electronic health record, but it need not be strangled by the 3 electronic health record, which is the problem 4 5 we have when we have 200 electronic health 6 records. And you just articulated an issue in 7 Maine. 8 CO-CHAIR BRENNAN: Let me check 9 and see if there's anyone on the phone. And 10 then we can go with the gentleman from 11 Hopkins. 12 MR. CUNNINGHAM: Excuse me. Operator, would you check to see if anyone is 13 14 in the queue for questions or concerns? 15 THE OPERATOR: If anyone would 16 like to ask a question, please press \*1 on 17 your telephone keypad. 18 CO-CHAIR BRENNAN: And while we're 19 waiting, please --20 MEMBER WU: I would like to ask a 21 question. I guess I didn't get the exit So I agree that, John, if you ask 22 right.

	Page 390
1	people sort of what they want to work on,
2	they'll think of sort of most of them will
3	think of four pretty medicalized things, which
4	have been repeated to them over and over and
5	which the media repeats them over and over.
б	But I think that in the spirit of
7	it getting late in the afternoon, I would say
8	that we're not being very imaginative about
9	goal attainments. And, in fact, most people
10	have other goals that they want to achieve
11	that don't have to do with any of those
12	things. And so I still think there is some
13	room to develop this.
14	There's one tool that you're aware
15	of I'm sure that's called the C-Qual. It was
16	developed by an Irish group. And it basically
17	asks people to identify activities that they
18	would like to that they find important.
19	And they might include dancing or might not.
20	They might include going to church or all
21	sorts of things. But, in any event, they then
22	rank them in importance and so forth.

	Page 391
1	I think that there is more room to
2	come up with goals that are really more like
3	people's actual goals.
4	MEMBER WASSON: Just one point.
5	The tens of thousands of things that I've
6	alluded to are all open-ended. So I wasn't
7	medicalizing it in that sense, but I was using
8	the medical example as one to relate.
9	CO-CHAIR BRENNAN: Thank you.
10	Is there a question in the back
11	and then one up here in the front? Yes, sir?
12	MR. YANG: All right. So I am
13	going to comment on this from a health IT
14	vendor perspective.
15	CO-CHAIR BRENNAN: Okay.
16	MR. YANG: I know there has been
17	some mention about data standards. Kevin, you
18	mentioned some of those. And there are
19	several levels of data standardization.
20	And one of the things, actually,
21	as a vendor that we try to implement to some
22	sort of types of systems is to code whether,

	Page 392
1	for example, each questionnaire, you need to
2	have a code for it, right? And then maybe
3	down to the item level, you have to have a
4	code.
5	For that right now, LOINC and
6	SNOMED are the two places that have been doing
7	that. However, for LOINC, there is an issue
8	with the copyright. So they couldn't code out
9	of the questionnaires that are out there.
10	They can code only a few of them.
11	So I wonder if like an
12	organization like ONC is going to be able to
13	bring this issue up a level to see maybe what
14	LOINC because the way LOINC implements this
15	solution is assuming the instrument that they
16	are all treated as laboratory results. And
17	I'm not sure that's actually the right model
18	for it, but I just wonder if ONC is assisting
19	in that sort of a matter to maybe working with
20	LOINC or maybe HL7 to see how they can
21	incorporate that into the HL7 standards.
22	DR. LARSEN: Yes. Thank you. A

	Page 393
1	lot of us have been involved in this, Phyllis
2	from NCQA. We've talked to NQF about this.
3	There is this fundamental question
4	that if you're a researcher or a corporation
5	that develops an instrument and you have
6	invested a lot of R&D time and energy into
7	that instrument, how is it that we keep a
8	landscape of people willing to keep those up
9	and to keep those coming?
10	So intellectual property has
11	really been part of the way that that works,
12	right? It's just like drugs. However, as we
13	try to put these into federal incentive
14	programs, it's a hidden cost for a federal
15	incentive program if now everyone that uses
16	this instrument has to pay a licensing fee to
17	whomever is the holder of that intellectual
18	property.
19	And so I won't necessarily speak
20	for CMS, but I think I speak for CMS in that
21	they are looking for things that don't have
22	hidden costs. And ideally CMS would like to

	Page 394
1	pick public domain instruments, things that
2	don't have a hidden cost.
3	As we have been working through
4	some of the building out functional status
5	measures for the HR, we run into these
6	questions that if an organization or a
7	university or an individual holds intellectual
8	property and now we try to put it into the
9	measure for a federal incentive program and we
10	can't really resolve the intellectual property
11	questions, do we just eliminate that
12	instrument from an intellectual property and
13	hidden cost point of view and just go with
14	others instead?
15	If we do that, then we don't
16	necessarily have a landscape where people
17	develop those things because now they don't
18	have an incentive to develop those things
19	anymore.
20	So I don't know that I have an
21	answer to that question, but I think it's a
22	great thing for a group like this to think

	Page 395
1	through. I think it's especially good for NQF
2	as a measure endorser to think through.
3	We are taking tactical approaches
4	to figuring out how to build data standards
5	around those. And so far it has been pretty
6	easy except if the IP owner is in Europe
7	because they have no sort of reason to move at
8	our timelines here in the U.S. And although
9	they're nice enough, they don't feel the same
10	kind of pressure to get into a U.S. program
11	that a U.S. IP owner might.
12	CO-CHAIR BRENNAN: Thank you,
13	Kevin.
14	We are going to have to have the
15	last question now or comment here from the
16	table. And then I'll let the panelists have
17	the final remarks. You are all right. Okay.
18	Let me ask the panelists if you
19	have a closing remark. And if you don't, if
20	you could address one of the questions we've
21	left unaddressed, which is, what needs to
22	happen to get patient-reported outcomes into

Page 394         an electronic health record? What would be         the first thing you would do?         And while you're thinking, I'll         start and say mine is I would resolve the         issue of at what point is it appropriate and         at what point is it risky for patient-reported         outcome to be released into a clinical record         system, where it enters back into the care         process in ways they may not understand, the         patient may not understand?         For example, experience data put         into the clinical record seems to me to be         inappropriate. But other patient-reported         outcomes might be actually quite useful.         However, there may be things patients will         refer to control.         MEMBER WILKINSON: I would be very         what was important for the patient to know and         what the patient would actually understand.         The reason for my question is         probably obvious. It is that so many times		
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22 probably obvious. It is that so many times	21	The reason for my question is
	22	probably obvious. It is that so many times
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1	experience shows that, just as clinicians can	
2	underreport something that the patient views	
3	quite differently, as was shown on one of the	
4	slides, I think that principle could be	
5	extended to a lot of other settings in which	
6	measures and others presume they know what is	
7	understandable or important and they leave out	
8	of the equation communication.	
9	CO-CHAIR BRENNAN: Yes.	
10	MEMBER WILKINSON: I am	
11	oversimplifying for the purposes of time.	
12	CO-CHAIR BRENNAN: No. We will	
13	have a whole day for more conversation	
14	tomorrow. So let me go down the road and let	
15	Ted start and then Uma and then Kevin.	
16	MR. ROONEY: I don't know the	
17	right lever, but getting PROMIS and a general	
18	health risk appraisal into every EMR so a	
19	clinician could use it would be huge.	
20	CO-CHAIR BRENNAN: Thank you.	
21	DR. KOTAGAL: I think engaging the	
22	clinicians through incentives in a way that's	

Page 398 1 meaningful to shift from clinical outcomes to 2 patient-reported outcomes. CO-CHAIR BRENNAN: Excellent. 3 Kevin? 4 5 DR. LARSEN: So I am with Ted. Ι have a little bit of mantra of just start. 6 7 Don't get worried that you don't exactly know 8 the whole ending goal. You've got to start 9 someplace. 10 And so then I am working very tactically. What can I start with with 11 12 meaningful use 3? What is the right thing 13 that we can use that lever to build 14 infrastructure that gets us the furthest the 15 fastest in the best way? 16 And so I am open to your input. 17 Please help me and help our FACAs figure that 18 question out. 19 CO-CHAIR BRENNAN: And, David, you 20 have been so good to us all day I'm going to 21 let you have the very last word of the panel. 22 Thank you.

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1	MEMBER CELLA: I like the idea of
2	just starting. You know, the kind of work
3	that we do and others of us, others of you who
4	do similar work, we can get very bogged down
5	in the detail and worry a lot.
6	And there is a lot of good
7	information that we can already capture. And
8	we are ready to go. And we'll get better
9	along the way.
10	CO-CHAIR BRENNAN: Thank you very
11	much. It's been a really excellent day. And
12	I want to just remind you, first of all, that
13	the panel would be here mostly for tomorrow.
14	Speak up more. All right. The panel will be
15	here mostly for tomorrow.
16	We're going to have a couple of
17	closing comments before the day is over. I
18	will be at I want you to just reflect for
19	a few minutes about the key points that you
20	heard through the day since tomorrow's work,
21	we'll be moving into small workgroups.
22	Now, several of you have noticed

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1	that there is a small dot on the back of your
2	name tag. That identifies which workgroup
3	you're going to be in. And for those of you
4	who need a reminder, there is a paper on your
5	table that summarizes that. And there is also
б	a screen up here.
7	It is color-coded. If you don't
8	have a dot on your name tag, please see one of
9	our staff. The NQF staff will make sure you
10	are in a workgroup tomorrow.
11	The workgroups will be focused
12	tomorrow throughout the morning on, first of
13	all, breakout session for selecting
14	individual-level PROs for performance
15	measurement. And then there will be a
16	discussion on the next steps for what
17	characteristics should be used for selecting
18	PROs.
19	I am going to now turn to Karen or
20	Karen Adams or Helen to see if you have
21	closing remarks that you would like to make
22	for the day.

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1	MS. PACE: I will just make a
2	quick note. As Patty said, if you don't have
3	a colored dot on your name tag, see Gene
4	Cunningham. And if we didn't receive your
5	request, we tried to honor first and second
6	requests. There is a limited availability to
7	switch, but one of the groups is totally full.
8	So, again, you would need to see Gene
9	Cunningham about that.
10	We really appreciate all of your
11	engagement. It's been very nice to see
12	everyone involved, including our audience.
13	And I'll just give it back to
14	Patty. And also, Joyce, do you want to make
15	any comments?
16	CO-CHAIR BRENNAN: So on behalf of
17	Joyce and myself, we want to thank you for
18	taking the time to be here. We want to thank
19	you to all the speakers today and particularly
20	to David for a great deal of work and
21	provocative thinking.
22	We want to thank all the

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1	curmudgeons and the provocateurs in the room.
2	Please come back tomorrow and be provocateurs.
3	Thank you very much.
4	(Whereupon, the above-entitled
5	matter went off the record at 4:45 p.m.)
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#### CERTIFICATE

This is to certify that the foregoing transcript

In the matter of: Patient Reported Outcomes

Before: NQF

Date: 07-30-12

Place: Washington, DC

was duly recorded and accurately transcribed under my direction; further, that said transcript is a true and accurate record of the proceedings.

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Court Reporter

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