

Delivering Affordable Cancer Care in High Income Countries: What are the Known Challenges?

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October 8th, 2012

The Lancet Oncology Commission

Delivering affordable cancer care in high-income countries

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- Collaborative effort to describe challenges and propose solutions
- 37 policy experts, economists, physicians, and patient advocates
- 10 Countries
 - US, UK, Canada, France, Belgium, Germany, Italy, Switzerland, Sweden, Australia
- Burden and Cost of Cancer is growing
- Drivers of cost include innovation, overutilization, lack of evidence base, inadequate regulatory system, inadequate sociopolitical debate.
- Unsustainable for health systems and disparities in access are growing
- Solutions include value based reimbursement, education, regulatory reform
- Era of high cost interventions for marginal benefit must end...but how...

High Costs:

How Expensive Is Cancer Care?

- How do we measure this?
 - Total spending? (Cost per case x number of cases)
 - % GDP (reflects scale and trade-offs with other social goals)
 - Cost per case? (the real target, but highly complex and variable)

Total Health Care Spending (Cancer Costs = 5% of Total)

	USA	UK	Australia
Total Spending	2.6 trillion	226.8 billion	112.8 billion
% GDP	18%	9.1%	11%
Per Capita	\$11,000	\$3,500	\$5,000



- Projected annual increase in total spending = 5.8%
- GDP 17.6% in 2009 INCREASING to 19.8% in 2020!

Rising Cancer Care Costs

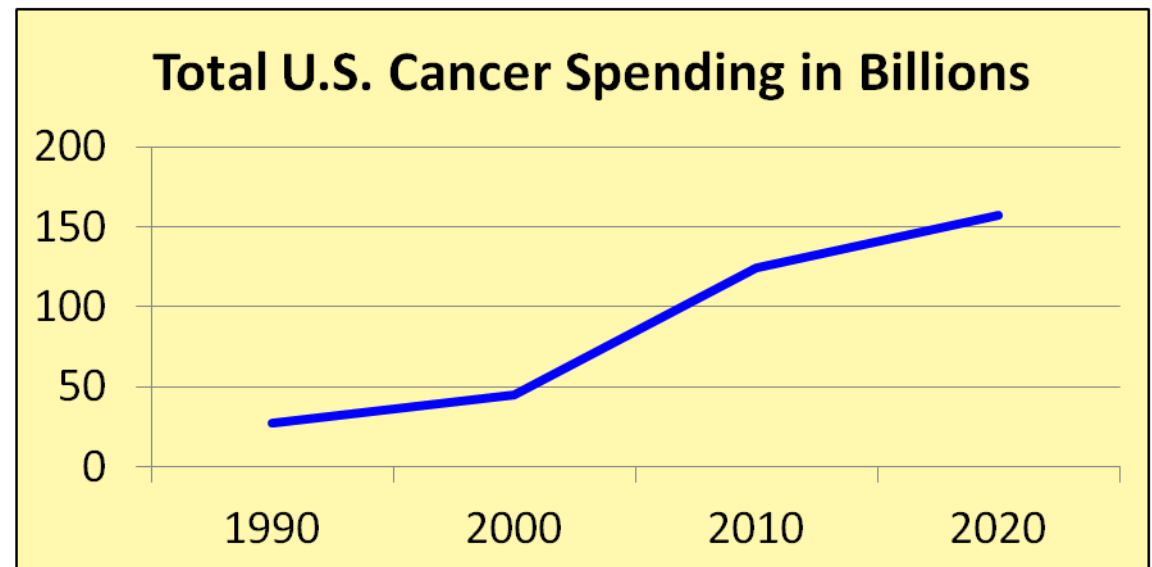
Most Expensive Cancers in U.S. in 2010

Breast	\$16.5 billion
Colorectal	\$14.1 billion
Lymphoma	\$12.1 billion
Lung	\$12.1 billion
Prostate	\$11.9 billion



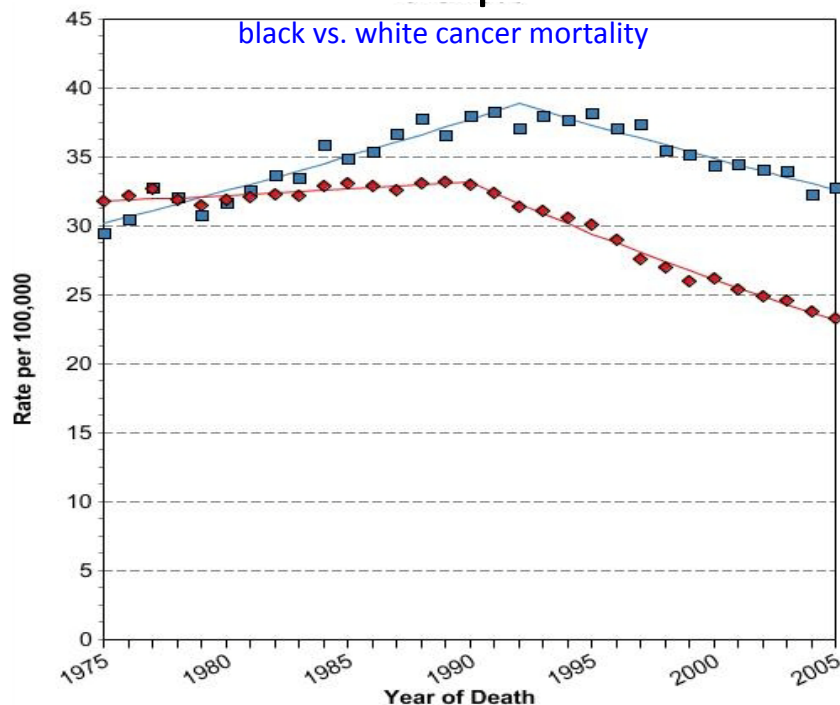
600% Increase in
spending over 30
years....

Mariotto et al. JNCI 2011



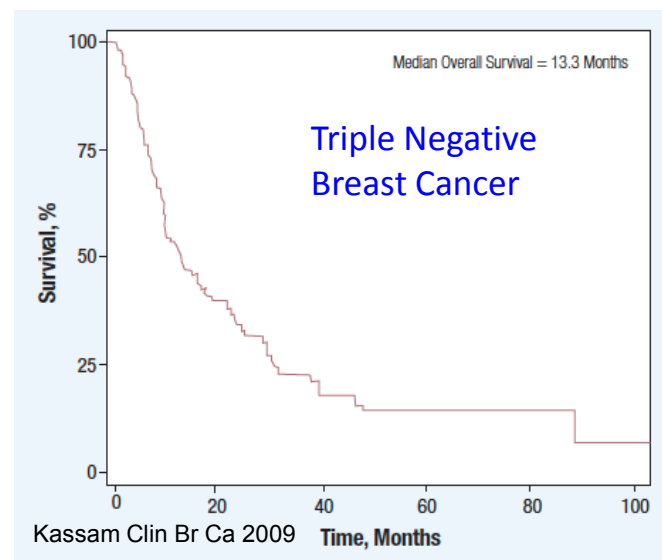
Unmet Demand

Health Disparities



Wheeler S, Personal Communication based on NCI and CDC data, 2009

Poor Outcomes/Lack of Effective Rx



Lack of Access



Stage IV:	Median Survival	Annual Deaths
Pancreatic Cancer	6 months	37,000
Lung Cancer	13 months	160,000
Melanoma	10 months	9,000

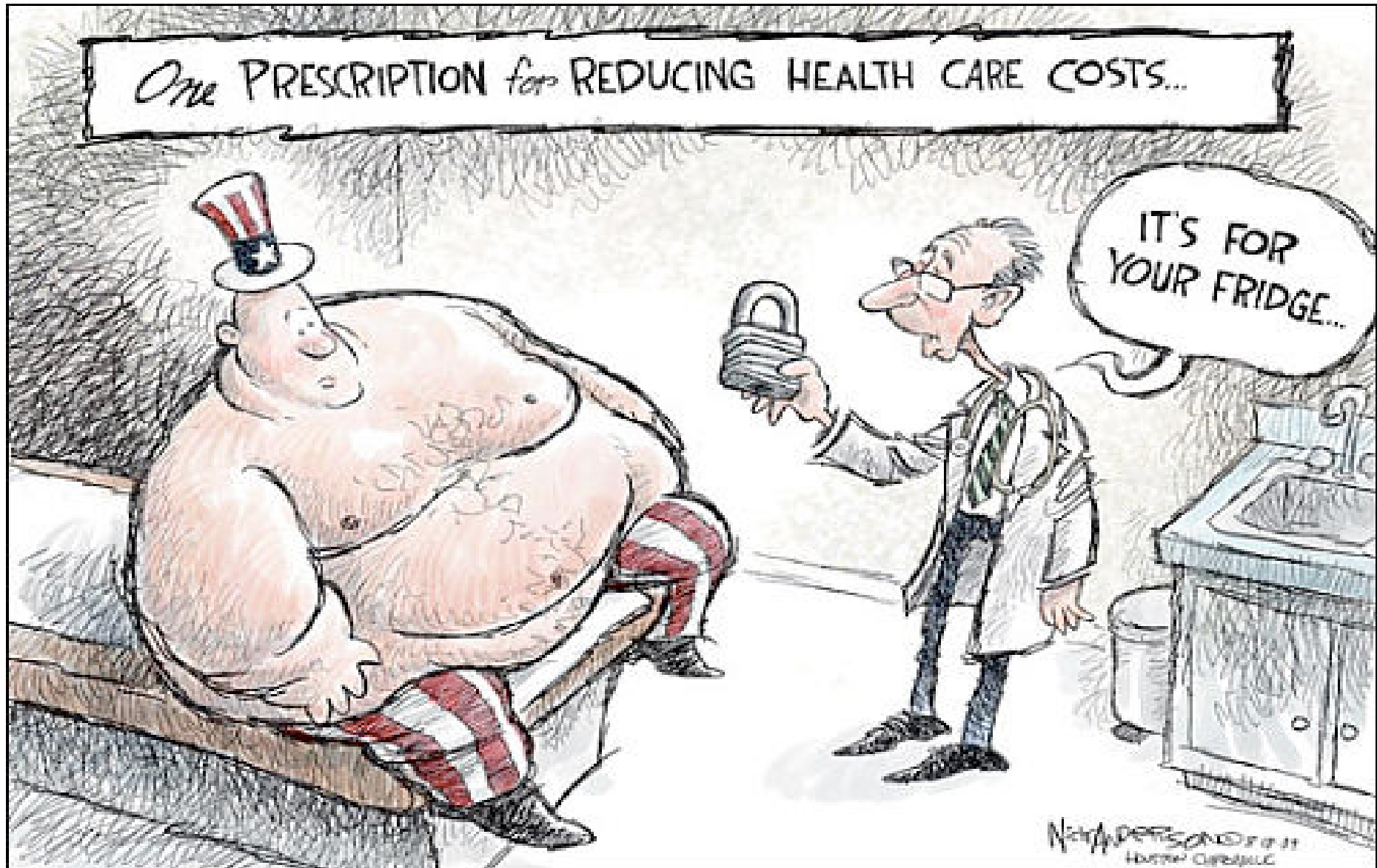
How Do We Reduce Costs
Maintain or Improve Quality
And Meet Demand?

Challenge: Understanding What Drives the Cost of Cancer Care

- Demographics
- Behavior
 - Tobacco, obesity, adherence to screening
- Novel Interventions
 - Drugs, Genetic Tests, Radiation Therapy, Imaging
- Over-Utilization
 - Lack of Evidence base, Lack of Evidence based practice, incentive structure, defensive medicine, lack of communication/care delivery inconsistent with patients preferences

Demographic Trends...

We ain't getting any younger or thinner....



Components of Rising Cost

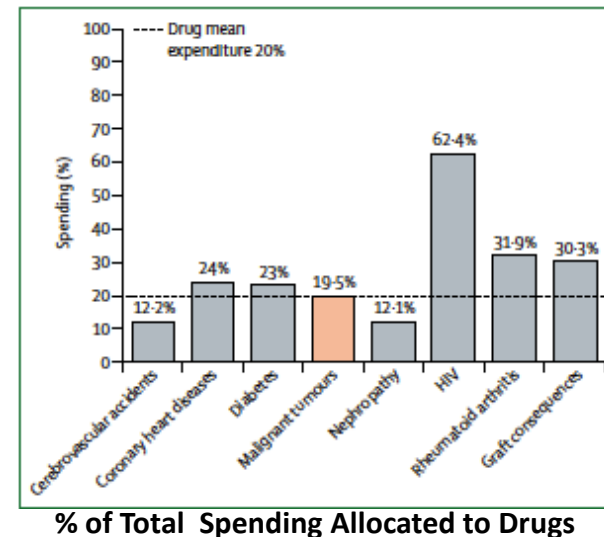
Need to Get Granular

- 1991-2002: cost of chemo for breast cancer increased from \$6,000 to \$13,000 - Warren JNCI 2008
- 2005: Adjuvant trastuzumab for 20% of patients who are Her2 + = additional \$50,000/year...
- New Data:
 - EMILIA: 2nd line TDM1 prolongs survival
 - CLEOPATRA: 1st line Pertuzumab + Docetaxel/Trastuzumab ↑PFS by 6 mo
 - NEOALTTO: Lapatinib + Trastuzumab doubles PCr rate in neoadjuvant BC
- What, if anything, will be the marginal benefit of TDM1 + Lapatinib + Pertuzumab over current standard therapy?
 - What will it cost?
Lapatinib: 3K/m, Pertuzumab: 6K/m, Trastuzumab: 4K/m...**13,000+/month??**
 - **How will we pay for it?!!**

Challenges:

Balancing Cost Control and Innovation

- Avg Cost of New Drug = \$1.3 Billion
- Limited Patient Populations for research and market
 - Smaller subgroups
 - Less likely that single drug will have large impact
- Long Time Horizon to determine outcomes
 - Adjuvant trials may require 1,000+ patients, take 5+ years
- French National Cancer Institute Audit
 - Cancer = 30% deaths, 36% of premature deaths
 - BUT Cancer = only 10% of health care spending
 - Drug costs at or below most chronic diseases
 - For cancer < 20% of costs
 - Public Spending on Cancer should INCREASE



Utilization: Divide and Conquer:

Need to consider VALUE not simply \$\$

1. Differentiate between costs to Society and costs to Individual Patient

- In U.S. 48.6 million uninsured, 29 million underinsured, 52 million on medicaid*
- Burden of costs to patients, ex) bankruptcy, has unique challenges in U.S.

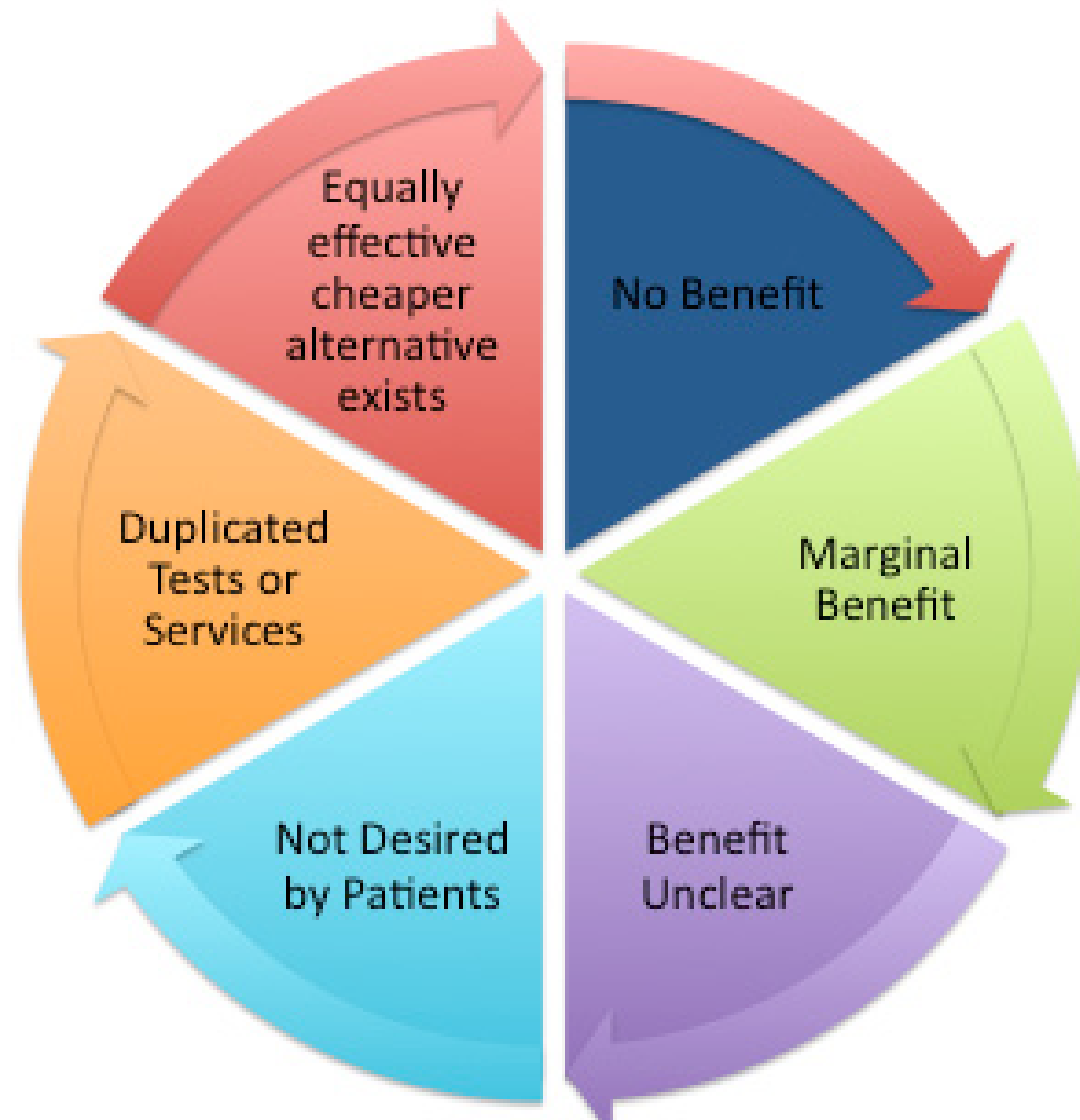
2. Not all Costs are Created Equal

“Value”

“how do we find
the resources to do
this for everyone”

“how do we
reduce/eliminate this
practice”

Targets for Reduced Spending for Cancer Care



How Do We Define “Value”

- Data from RCT may not apply to general pop
- Need health-outcomes databases to identify utilization, effectiveness and toxicity

Who Defines Value?

- State?
- Doctor?
- Patient?
- Doctor-Patient Dyad?
- Insurer?
- Panel of Experts?



Examples: Bevacizumab for Breast Cancer (PFS, ORR but no OS benefit)
Erlotinib for Pancreatic Cancer (2 week OS benefit)
Sipuleucel-T for Prostate Cancer (4 mo OS benefit, 100K cost)

Health Technology Assessment

- NICE

- Determines access to drugs/Rx in England, Wales
- Uses threshold of £30,000 per QALY
- Now trying to use “Value Based Pricing”
- £200 million Cancer Drug Fund



- Independent Advisory Board

- Mandate: Control Costs
- Prohibited from: rationing, cuts in services, cost-sharing, changes in hospital reimbursement...



- Institut für Qualität und Wirtschaftlichkeit im Gesundheitswesen



- Swedish Council on Health Technology Assessment



Challenges: For High Value Interventions...



- How can they be most efficiently allocated?
- How can they be most ethically or equitably allocated?
- Is there a difference? Which is preferable??
- **To what extent do we view health care as a commodity?**

Challenges:

Low Value Interventions....



- How do we curb overutilization?
- Where are the decisions made?
 - Even if we agree on value...
 - State, Institution, Payer, Bedside?
- (How) Do we handle exceptions?
 - Burdensome appeal?
 - Physician Discretion?
- **How do we balance cost control and clinical freedom??**
 - How do we incentivize best care vs. lucrative care....

Challenges:

Delivering Appropriate End of Life Care

- Subset of utilization challenge...
- Medicare spent \$519 billion in 2010.
- 12% of the Federal Budget....
- 27-30% of Medicare dollars spent in **last year** of life.
- **Of this amount, nearly 40% spent in last 30 days of life.**
- Studies suggest that many patients never discuss their preferences, but when they do, they often choose symptom management over disease directed care.
- Opportunity to improve care AND reduce costs....

American Society of Clinical Oncology Statement: Toward Individualized Care for Patients With Advanced Cancer

Jeffrey M. Peppercorn, Thomas J. Smith, Paul R. Helft, David J. DeBono, Scott R. Berry, Dana S. Wollins, Daniel M. Hayes, Jamie H. Von Roenn, and Lowell E. Schnipper

- “When cancer directed therapy is considered, the patient must be told:”
 - The likelihood of response
 - The nature of response (i.e. symptom improvement, shrinking tumors, improving survival, etc.)
 - Toxicities to which they will be exposed
 - Provision of both pessimistic information (the chance of no response) and optimistic information (chance of response)
 - Direct financial impact of treatment decisions
 - Costs in terms of time, toxicity, and alternatives that will be precluded by a given treatment decision

American Society of Clinical Oncology Guidance Statement: The Cost of Cancer Care

Neal J. Meropol, Deborah Schrag, Thomas J. Smith, Therese M. Mulvey, Robert M. Langdon Jr, Diane Blum, Peter A. Ubel, and Lowell E. Schnipper

- Oncologists must recognize that **discussion of cost considerations represents an important component of high-quality care.**
 - Acknowledge that treatment may be costly
 - Identify cost-related barriers to optimal Rx for individual patients.
 - Identify areas where costs may be reduced for individual patients
 - Use lower priced options when they are available.
- Survey: oncologists agree addressing cost is important
 - only 37% comfortable discussing costs with patients.

Challenge: (How) Do We Discuss Costs in the Clinic?

- How and When Should Physicians Consider costs of care?
- How and when should physicians discuss costs with patients?
 - What are the goals of such conversations?
 - What should the content be?
 - Patient costs only? Societal costs?
 - What is the impact?
 - Do patients want this??

Is the Public Ready To Discuss/Confront Costs of Care?

MORIN
THE MIAMI HERALD



Summary: A Few Challenges....

- Demographic Trends → more cases
- Balancing innovation and cost control
- Improving evidence base to clarify value
- Encouraging evidence based practice
- Balancing cost controls & clinical discretion
- Engaging and educating public and clinicians
- Finding resources to promote access to care

Emerging Challenge: Support for Science

- Evaluate cost controlling interventions
 - Impact of state/institutional/payer measures on cost and outcomes
 - Impact of bedside/educational measures
 - Impact of early palliative care involvement
- Save some resources for ongoing support for basic, translational and clinical science in oncology
 - We could “solve” much of the cost problem by returning to 1970s cancer care for all....this is not the direction we need to move.