



**Jonas de Souza, MD**  
**Assistant Professor**  
**The University of Chicago**

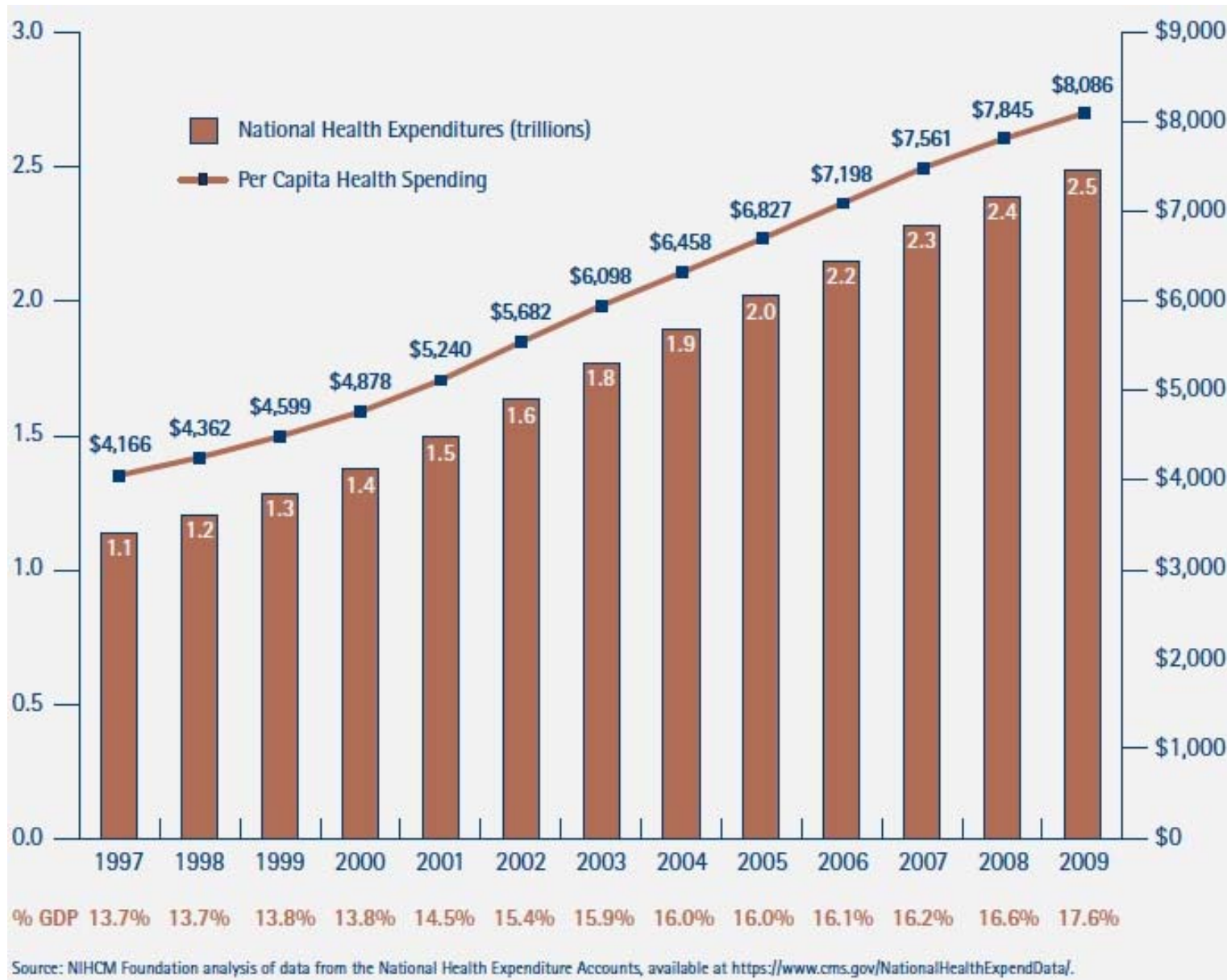


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# Why are we even talking about this now?



# U.S. healthcare spend has reached \$2.6T (18% GDP)



# Oral Targeted Agents

Dr. Jonas de Souza

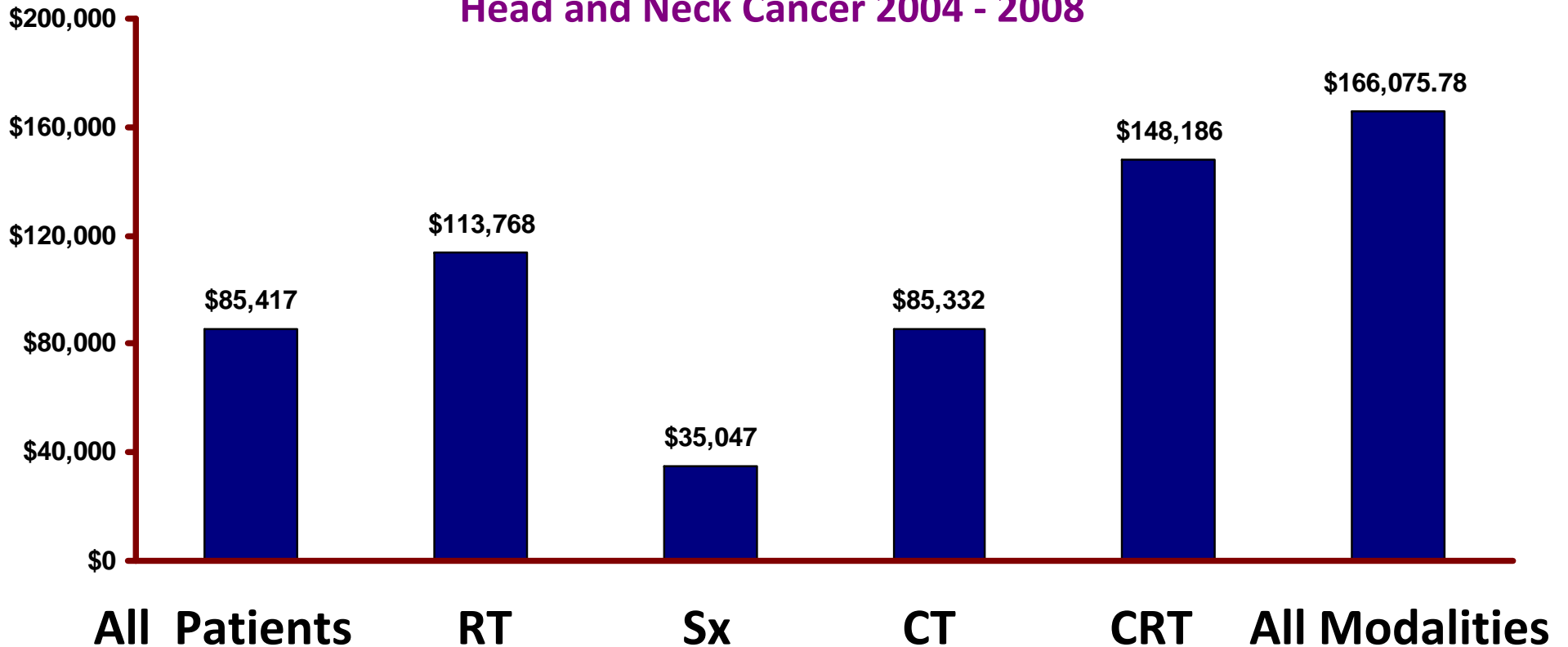
<b>Drug</b>	<b>Dose</b>	<b>Frequency</b>	<b>Estimated Monthly Cost</b>	<b>Estimated Annual Cost</b>
Sunitinib	50mg	qd	\$13,259.75	\$159,117.00
Vemurafenib	960mg	bid	\$12,478.42	\$149,741.00
<b>Vandetanib</b>	<b>300mg</b>	<b>qd</b>	<b>\$11,726.58</b>	<b>\$140,719.00</b>
<b>Cabozantinib</b>	<b>140mg</b>	<b>qd</b>	<b>\$11,385.00</b>	<b>\$136,620.00</b>
<b>Sorafenib</b>	<b>400mg</b>	<b>bid</b>	<b>\$10,723.00</b>	<b>\$128,676.00</b>
Axitinib	5mg	bid	\$10,548.75	\$126,585.00
Everolimus	10mg	qd	\$9,676.50	\$116,118.00
Pazopanib	800mg	qd	\$8,199.92	\$98,399.00

Source: Medicare.gov - plancompare.medicare.gov, 2013 dollars; Medicare Health Plans Without Drug Coverage

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# Mean Costs by Treatment Modality Commercial Coverage

Head and Neck Cancer 2004 - 2008



Values adjusted to 2013 dollars using Medical Care CPI



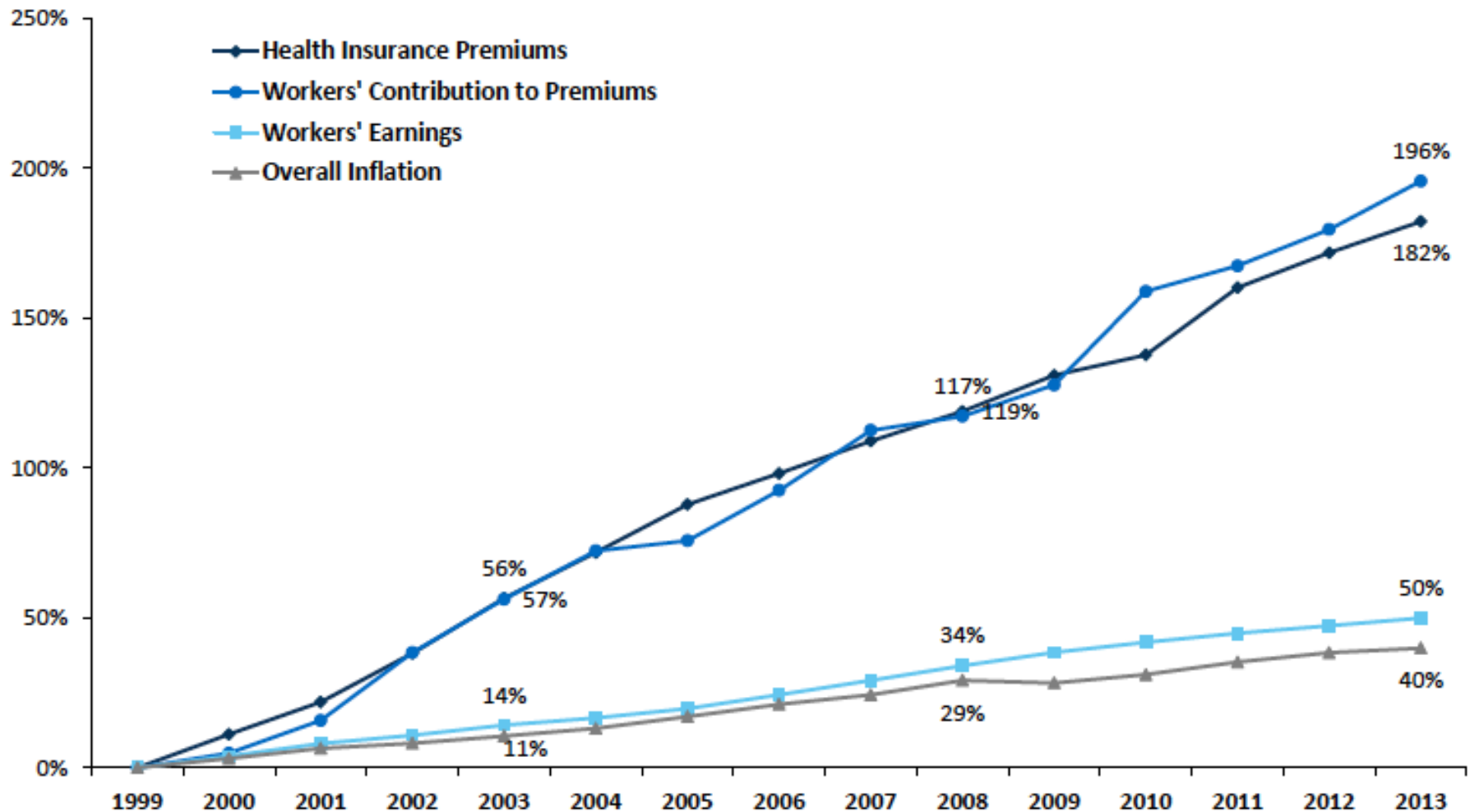
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Jacobson JJ, Epstein JB, Eichmiller FC, et al. The cost burden of oral, oral pharyngeal, and salivary gland cancers in three groups: commercial insurance, Medicare, and Medicaid. *Head Neck Oncol.* 2012;4:15.

# A Patient-Centered View



# Cumulative Increases in Health Insurance Premiums, Workers' Contributions to Premiums, Inflation, and Workers' Earnings, 1999-2013



SOURCE: Kaiser/HRET Survey of Employer-Sponsored Health Benefits, 1999-2013. Bureau of Labor Statistics, Consumer Price Index, U.S. City Average of Annual Inflation (April to April), 1999-2013; Bureau of Labor Statistics, Seasonally Adjusted Data from the Current Employment Statistics Survey, 1999-2013 (April to April).

<http://kff.org/private-insurance/report/2013-employer-health-benefits/>



# A Patient-Centered View

- Among 254 patients assessed at Duke/Healthway Foundation:
  - 42% had a significant or catastrophic subjective financial burden
  - 46% used savings to defray out-of-pocket expenses
  - 20% took less than the prescribed amount of the medication
  - 19% partially filled prescriptions
  - 24% avoided filling prescriptions altogether





# Financial Toxicity

By Scott Ramsey, David Blough, Anne Kirchoff, Karma Kreizenbeck, Catherine Fedorenko, Kyle Snell, Polly Newcomb, William Hollingworth, and Karen Overstreet

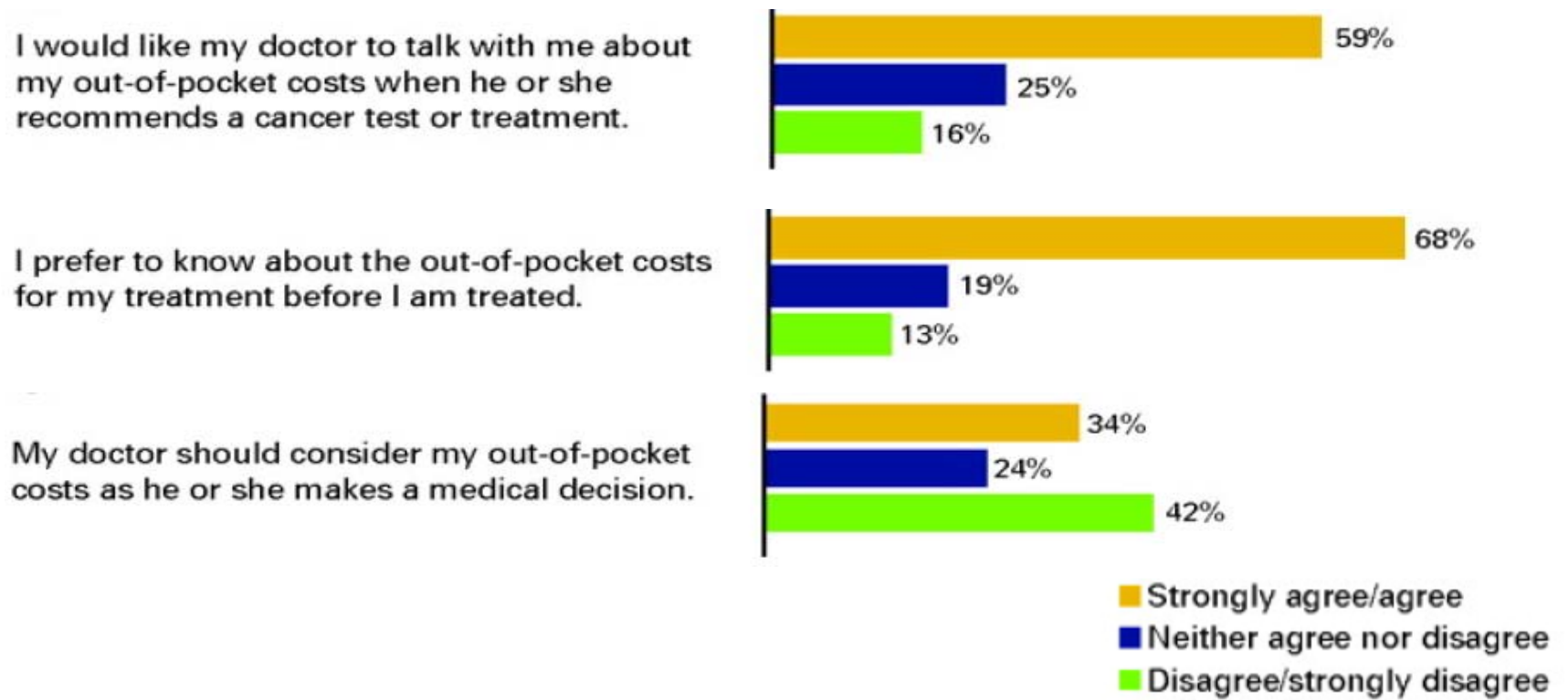
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## Washington State Cancer Patients Found To Be At Greater Risk For Bankruptcy Than People Without A Cancer Diagnosis

**DOI:** 10.1377/hlthaff.2012.1263  
HEALTH AFFAIRS 32,  
NO. 6 (2013): 1143–1152  
©2013 Project HOPE—  
The People-to-People Health  
Foundation, Inc.

# A Patient-Centered View

- 256 cancer patients at Beth Israel Deaconess Medical Center



# A Patient-Centered View

- The American Society of Clinical Oncology (ASCO) promotes physician-patient communication as a means of decreasing overall spending and minimizing patients' financial burden
- Oncologists feel uncomfortable and ill equipped to lead costs discussions

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Kimberlyn McGrail, Stirling Bryan and Jennifer Davis  
*Commentary from Steven Lewis, Greta Cummings, Sholom  
Glouberman, David R. Gray and Ian Rongve, Doris Howell  
and Geoffrey Liu, Albert W. Wu and Claire Snyder*

# HealthcarePapers

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THE PROM\*

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YOU ASKED.

**\*THE CASE FOR ROUTINE PATIENT-REPORTED OUTCOME MEASUREMENT**

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# A Patient-Centered View Development of the COST-PROM

## The Development of a Financial Toxicity Patient-Reported Outcome in Cancer

### The COST Measure

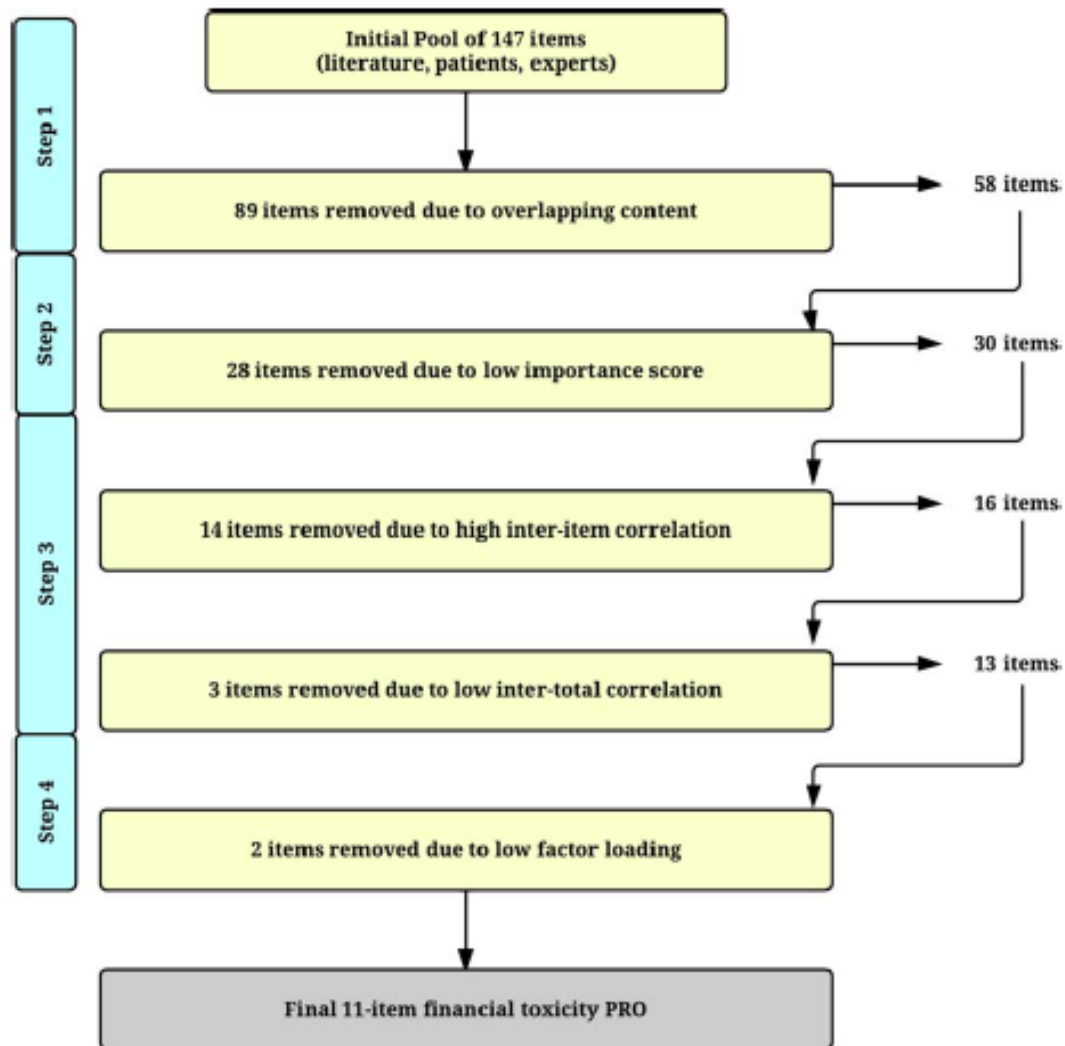
Jonas A. de Souza, MD<sup>1</sup>; Bonnie J. Yap<sup>1</sup>; Fay Hlubocky, MA, PhD<sup>1</sup>; Kristen Wroblewski, MS<sup>2</sup>; Mark J. Ratain, MD<sup>1</sup>;  
David Cella, PhD<sup>3</sup>; and Christopher Daugherty, MD<sup>1</sup>

**COST** = **CO**mprehensive **S**core for financial **T**oxicity



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# A Patient-Centered View Development of the COST-PROM



**COST (COmprehensive Score for financial Toxicity)**  
**Patient –Reported Outcome Measure**

**Not  
at all**      **A little  
bit**      **Some-  
what**      **Quite  
a bit**      **Very  
much**

1	I know that I have enough money in savings, retirement, or assets to cover the costs of my treatment.	0	1	2	3	4
2	My out-of-pocket medical expenses are more than I thought they would be.	0	1	2	3	4
3	I worry about the financial problems I will have in the future as a result of my illness or treatment.	0	1	2	3	4
4	I feel I have no choice about the amount of money I spend on care.	0	1	2	3	4
5	I am frustrated that I cannot work or contribute as much as I usually do.	0	1	2	3	4
6	I am satisfied with my current financial situation.	0	1	2	3	4
7	I am able to meet my monthly expenses.	0	1	2	3	4
8	I feel financially stressed.	0	1	2	3	4
9	I am concerned about keeping my job and income, including work at home.	0	1	2	3	4
10	My cancer or treatment has reduced my satisfaction with my present financial situation.	0	1	2	3	4
11	I feel in control of my financial situation.	0	1	2	3	4

# A Patient-Centered View Development of the COST-PROM



- 155 patients with advanced solid malignancies
- On chemotherapy treatment for at least 3 months



# A Patient-Centered View

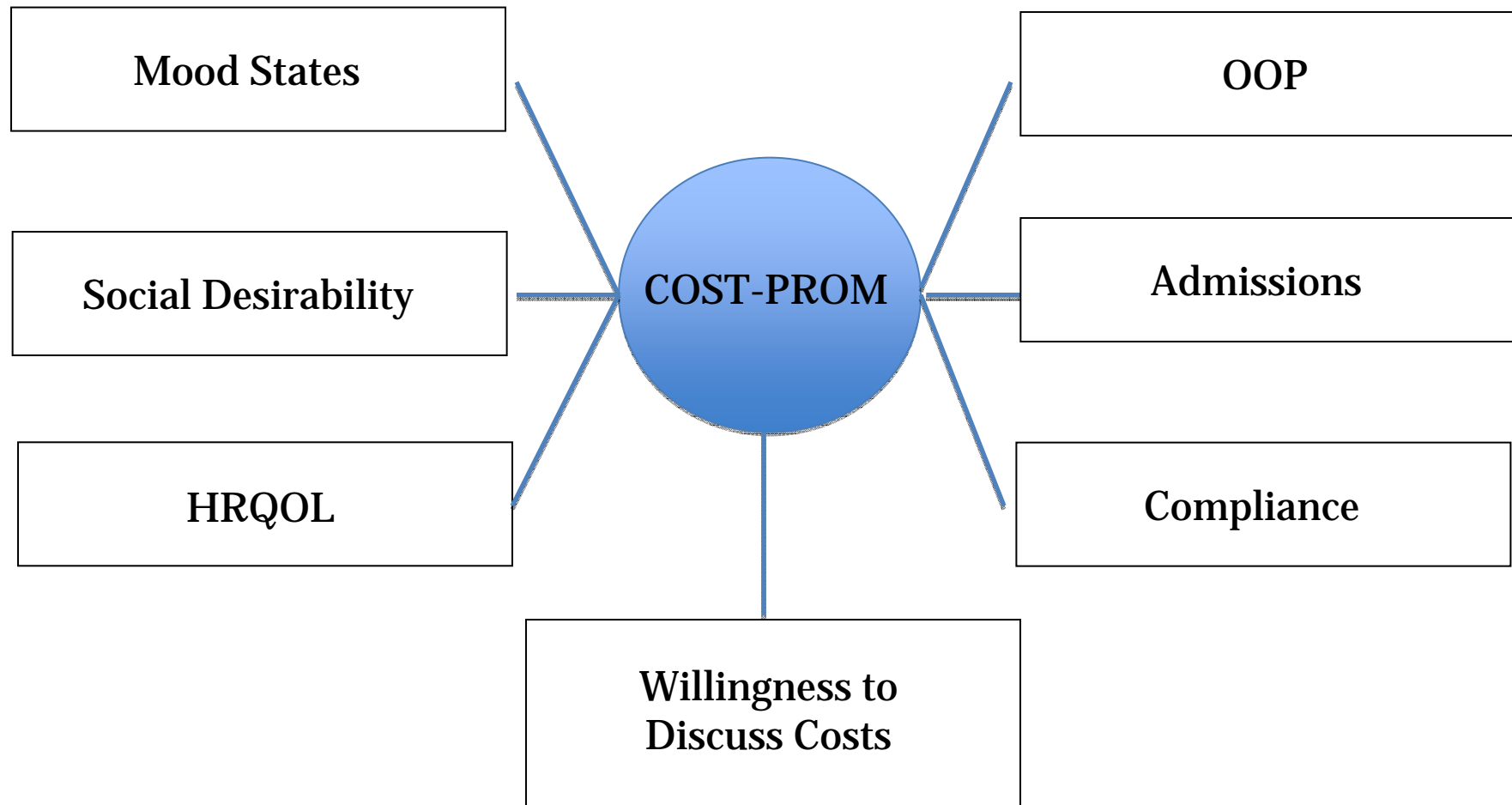
## Validation of the COST-PROM



- Financial Toxicity (Hypotheses)
  - Correlates with HRQOL
  - Independent of mood states
  - Independent of personal attitudes or traits
  - Identify patients willing to discuss costs
  - Increases as treatment progresses



# A Patient-Centered View Validation of the COST-PROM



# In Conclusion

- Cancer care is expensive
- Physicians discuss survival and toxicities with their patients, BUT
- Cost is still a taboo to be discussed



# In Conclusion

- Research on developing a Financial Toxicity Patient Reported Outcome:
  - Reliable and consistent (statistically)
  - Correlates with quality of life
  - Unrelated to mood or social desirability
- Easily incorporated in clinical practice
- Prospective assessments under study
- Identification of vulnerable populations in progress

