### WHY ME?

## CONVERSATIONS WITH WOMEN NEWLY DIAGNOSED WITH BREAST CANCER

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#### Disclosures:

Contents of this talk are based on reflections not rigorous scientific process





**Original Articles** 

## Causal Attribution Among Cancer Survivors of the 10 Most Common Cancers

Leah M. Ferrucci PhD, MPH, Brenda Cartmel PhD, Yasemin E. Turkman APRN, PMHNP-BC, MSN, MPH, Maura E. Murphy MSN, CPNP, Tenbroeck Smith MA, Kevin D. Stein PhD & ...show all

Pages 121-140 | Published online: 03 Mar 2011

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Maria Arman, RNM, PhD Marie Backman, RN, MNSc Marianne Carlsson, PhD Elisabeth Hamrin, RN, PhD



Women's Perceptions and Beliefs About the Genesis of Their Breast Cancer



July 2014, Volume 25, <u>Issue 7</u>, pp 771–785 | <u>Cite as</u>



What causes breast cancer? A systematic review of causal attributions among breast cancer survivors and how these compare to expert-endorsed risk factors



#### Relevance:

- Causal thinking associated with adjustment and distress
- Patient voice and research trajectory



Journal of Psychosocial Oncology > Volume 29, 2011 - Issue 2

**Original Articles** 

#### Causal Attribution, Control, and Adjustment to Breast Cancer

Barbara J. Lowery EdD, Barbara S. Jacobsen MS & Joseph Ducette PhD Pages 37-53 | Published online: 21 Oct 2010



#### Why Me?

#### MALE BREAST CANCER

- Men have a 1: 800 risk while women have a 1:8 risk
- Male breast cancer represents 0.5-1% of all breast cancers
- Risk factors include
  - Family history but still a minority....
  - Hormonal factors: estrogen to androgen ratio



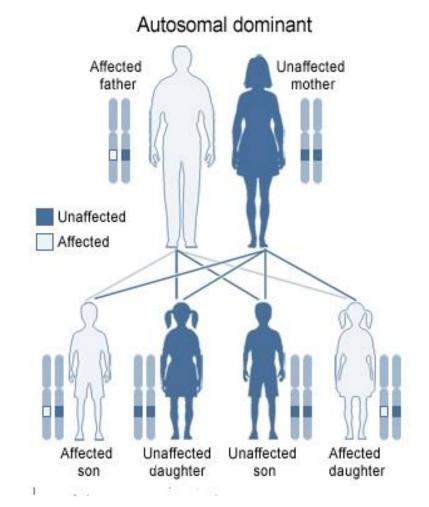
"I always knew that I would be diagnosed with breast cancer"





#### Myths about Hereditary Cancer

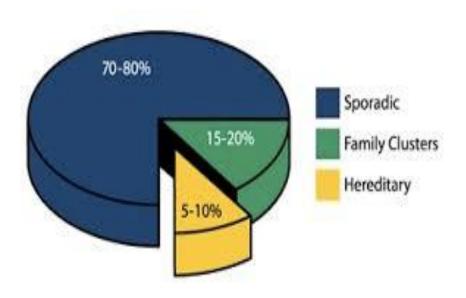
- Inevitable if in the family
- Lack of appreciation of autosomal dominant inheritance,
  - 50/50 chance of having gene
- Penetrance not 100%
  - Not everyone who has inherited a mutation gets cancer







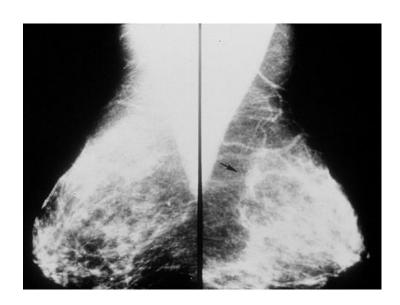
"Cancer is NOT in my family"



- No appreciation that hereditary cancer genes may be inherited from father
- No appreciation that family history of certain other cancers may be associated with genetic risk
- No appreciation of other risk factors



"But I get my mammogram every year..."



- Mammograms do not prevent breast cancer
- Mammograms do allow for detection of smaller tumors
- Mammograms may detect "subclinical" cancer, DCIS potential cancers that may take years or may never cause harm

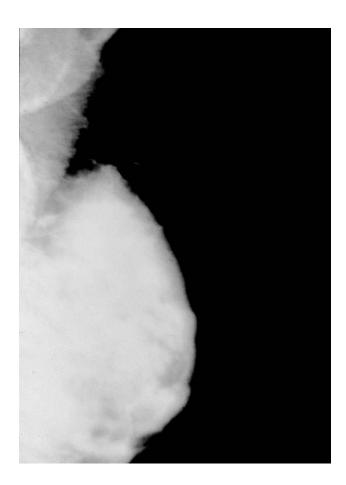


"My mammogram missed the cancer..."

- 20% of cancers are mammographically occult
- Palpable mass needs to be evaluated even if the mammogram is normal



#### Mammographic Breast Density



- Women understand density makes mammogram harder to interpret
- Lack of awareness of density as a risk factor
- Density is a marker of cumulative estrogen exposure
- Genetic influence



"Did this happen because I took hormones?..."

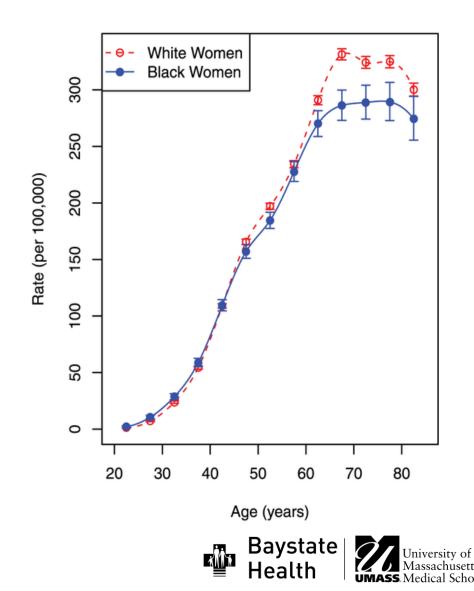


- Complex relationship of risk with post menopausal hormone treatment
- Estrogen alone no risk
  - WHI JAMA 2013
- Estrogen plus progesterone increases risk
  - Longer duration and higher doses
  - WHI JAMA 2002
  - JAMA Oncology 2015



"I am 79. I thought I was too old to get breast cancer..."

 Age is the most important risk factor for breast cancer second only to female sex



"I don't smoke or drink.

I eat organic foods.

I exercise every day.

I am so healthy, how could this happen?"

 Life style matters but some people may still get cancer







## Lifestyle factors influencing likelihood of diagnosis

- Exercise: at all stages of life lowers risk
- Diet: ?Mediterranean diet
- Alcohol: increased intake associated with higher risk
  - Binge drinking
  - Metabolism
- Smoking: modest increase

# Lifestyle factors influencing risk of recurrence

- Exercise: reduces risk by 30%
- Diet: ?low fat diet
  - WINS study benefit but also experienced weight loss
  - WHEL study no difference
- Alcohol: less evidence for recurrence
- Smoking risk higher risk of secondary cancers



 Because I had radiation treatments for Hodgkin's disease



- Yes- sadly early success led to late failure
- Girls treated in teens and twenties at higher risk of breast cancer 20-30 years later
- Watch more closely with MRI starting at age 30



"It's rampant in my neighborhood..."



- Concern about exposures at home or work
  - Water
  - Soil
  - Air
- Geographic cluster regions exist
- Familial tendency related to an exposure



 "I've been under so much stress..."



- Stress may effect
  - Sleep
  - Weight
  - Ability to exercise

 Stress and immune function



#### Stress and breast cancer risk







#### Self-reported stress and risk of breast cancer

Felicia D. Roberts M.A., Polly A. Newcomb M.P.H., Ph.D., Amy Trentham-Dietz M.S., Barry E. Storer Ph.D.

First published: 15 March 1996

https://doi.org/10.1002/(SICI)1097-0142(19960315)77:6<1089::AID-CNCR13>3.0.CO;2-Y | Cited by: 33



Cancer Detection and Prevention

Volume 28, Issue 6, 2004, Pages 399-408



American Journal of Epidemiology. 160(11):1079-1086, DECEMBER 1ST, 2004

PMID: 15561987

Issn Print: 0002-9262

Publication Date: December 1st, 2004

Psychological stress and the risk of breast cancer: a case–control study

Joanna Kruk PhD a, Hassan Y. Aboul-Enein PhD DSc b △ 🖾

#### Job Stress and Breast Cancer Risk: The Nurses' Health Study

Eva Schernhammer;Susan Hankinson;Bernard Rosner;Candyce Kroenke;Walter Willett;Graham Colditz;Ichiro Kawachi;

#### Influence of stressors on breast cancer incidence in the Women's Health Initiative.

By Michael, Yvonne L., Carlson, Nichole E., Chlebowski, Rowan T., Aickin, Mikel, Weihs, Karen L., Ockene, Judith K., Bowen, Deborah J., Ritenbaugh, Cheryl

Health Psychology, Vol 28(2), Mar 2009, 137-146



- Only can answer in the minority of newly diagnosed individuals- important to communicate uncertainty
- Important to appreciate that even though healthy lifestyles may not prevent an individual from being diagnosed with cancer, they will have a better prognosis after diagnosis
- Likely multifactorial with contributions based on genetic susceptibility and lifetime exposures
- Many unanswered questions



- Chance? Or the unknown...
- We are here to investigate and learn



