

Biomarkers
Summary of BCRF think-tank session

Moderator:
Nancy E Davidson, MD

Attendees:	Sofia Merajver
Carlos Arteaga	Marsha Moses
Pamela Goodwin	Andrew Quong
Daniel Hayes	James Rae
Samir Khatib	Regina Santella
Joshua Labaer	Vered Stearns

A diverse group of BCRF investigators ranging from chemists to medical oncologists met to consider current issues in biomarkers. Key points that emerged:

Definition of a biomarker as a surrogate test that predicts a clinical outcome

Limitation of this discussion to biomarkers that can be measured on human specimens—blood, urine, tissue (not imaging)

Concept of needing biomarkers for the host and for the tumor—they likely give us different information.

Not all biomarkers are useful biomarkers. Useful biomarkers will be cheap, simple, and noninvasive and will help to establish risk, prognosis or prediction of response to therapy.

Biomarker development requires the same rigor that it brought to drug development.

The absolute imperative to have well-annotated samples to establish the utility of a biomarker—this is a major barrier. There was much discussion of specimen sources including Southern Community Cohort (led by Vanderbilt), Army of Women (newly organized by Susan Love Foundation), Indiana University repository of samples from health women, use of data bases from HMOs.

The need to make sure that useful biomarkers can be applied around the world and the recognition that breast cancer (and therefore useful biomarkers) might be different around the globe.

The problem of economic disincentive to develop a biomarker as opposed to a drug