

SHORTCOMINGS IN THE CLINICAL EVALUATIONS OF OVARIAN CANCER BIOMARKERS



A **biomarker** is a naturally occurring molecule, gene, or characteristic by which a particular pathological or physiological disease can be identified. Yet, only **very few biomarkers are used** in today's health care system.

When a biomarker is tested for clinical use, **the included participants** needs to **properly represent the population in which it will be used**, otherwise **the intended evaluation of the biomarker fails**.

OUR STUDY



May suboptimal recruitment be a reason for the many biomarkers failures?

We examined a sample of 200 studies' recruitment strategies, using ovarian cancer as an example.



OUTCOMES

Many studies had used strategies that are believed **to limit their quality**.

APPROPRIATE RECRUITMENT may **PREVENT PREMATURE CLAIMS**
or the risk of **DISCARDING POTENTIAL BIOMARKERS** that are so urgently needed

CURRENT RECRUITMENT

47%

Of studies from **ONE (MEDICAL) CENTER**

33%

included **MULTIPLE** patient **GROUPS**

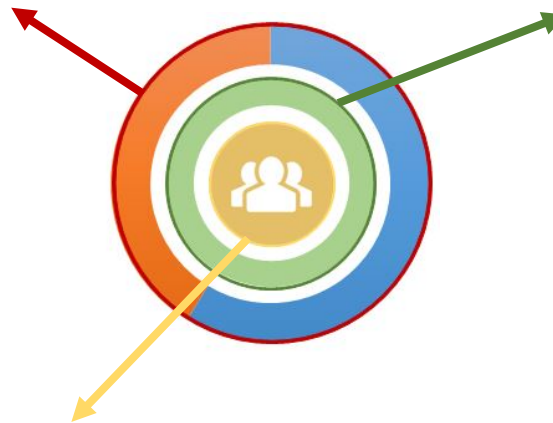
<200 no. of **participants**

LIMITED POPULATION REPRESENTATION

1

STUDY (0.5%)

recruited **1 group** from **MULTIPLE CENTERS** and had **SAMPLE SIZE JUSTIFICATION**



IDEAL RECRUITMENT

from **MULTIPLE (MEDICAL) CENTERS**

one **SINGLE** patient **GROUP**

no. of participants **>200**

OPTIMIZED POPULATION REPRESENTATION

