

Marginal life expectancy benefit from contralateral prophylactic mastectomy

July 16 2014

The choice of contralateral prophylactic mastectomy (CPM) by women with breast cancer (BC) diagnosed in one breast has recently increased in the US but may confer only a marginal life expectancy benefit depending on the type and stage of cancer, according to a study published July 16 in the *JNCI: Journal of the National Cancer Institute*.

To assess the [survival benefit](#) of CPM, Pamela R. Portschy, of the Department of Surgery, University of Minnesota, Minneapolis, and colleagues, developed a model simulating [survival outcomes](#) of CPM or no CPM for women with newly diagnosed stage I or II breast cancer, using data from the Surveillance, Epidemiology, and End Results (SEER) registry and large meta-analyses. Survival benefit projections were made for women by age (40, 50, or 60 years), breast cancer stage (I or II), and [estrogen receptor](#) (ER) status (positive or negative). Women with BRCA mutations were excluded from the analysis because they have a much higher risk of developing contralateral breast cancer.

The average gain in life expectancy from CPM ranged from 0.13 to 0.59 years for women with stage I BC and from 0.08 to 0.29 years for those with stage II BC. The procedure was more beneficial for younger women and for those with stage I and ER-negative BC. The 20-year disease-free survival benefit ranged from 4.25% to 7.20% for women with stage I BC and from 2.73% to 4.62% for women with stage II BC, depending on age and ER status. However, the 20-year overall survival difference between CPM and no CPM did not exceed 1% for any group.

The authors did not evaluate other outcomes such as surgical complications and quality of life because "...utility values are highly variable between women." They write, "Survival is only one potential benefit of a cancer risk-reduction strategy; effects on cancer-related anxiety, cosmesis, and self-image are also important in decision-making processes." The authors conclude that "Survival estimates derived from our model may be useful for physicians and [breast cancer](#) patients to arrive at evidence-based informed decisions regarding CPM."

In an accompanying editorial, Stephen G. Pauker and Mohamed Alseiri of the Division of Clinical Decision Making, Department of Medicine, Tufts Medical Center, Boston, write that although the benefit may be small on average, the choice of prophylactic contralateral mastectomy may not be unreasonable for some women, depending on their family history or genetic background. They write, "The balance between harm and benefit depends on the patient's preferences and highlights the importance of capturing the patient's values and expectations before considering CPM."

Provided by Oxford University Press

Citation: Marginal life expectancy benefit from contralateral prophylactic mastectomy (2014, July 16) retrieved 20 April 2024 from <https://medicalxpress.com/news/2014-07-marginal-life-benefit-contralateral-prophylactic.html>

<p>This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.</p>
--