

PREDICTORS OF WEIGHT GAIN AFTER BREAST CANCER: FINDINGS FROM A **LONGITUDINAL POPULATION-BASED STUDY** Carolyn Ee^{1,2}, Kelly Loffler², Richard Woodman², Huah Shin Ng², Wendy J Brown³, Bogda Koczwara^{2,4}

BACKGROUND

2 out of 3 women will gain Щ Ш weight after a breast cancer diagnosis



This can have a substantial negative impact on quality of life



- Weight gain may be associated with \uparrow disease recurrence and all-cause mortality
- There is a paucity of longitudinal data on predictors of weight gain in Australian women

METHODS/A

- Identify predictors of weight gain in women diagnosed with breast cancer, using data from the cohort born in 1946-51 of the Australian Longitudinal Study of Women's Health (aged 45-50 at initial survey in 1996).
- 2. Identify differences, if any, between the weight trajectories of women with and without breast cancer.

<u>Selected predictors</u> included:



Age at diagnosis

<u>Data analysis:</u>

Linear/logistic regression for weight and weight change predictors



BMI at diagnosis





MAIN FINDINGS

Breast cancer diagnosis did not predict <u>clinically significant</u> weight gain (+5%) from previous).

Previous higher BMI, lower physical activity and higher sedentary time were significant multivariate predictors of **absolute weight gain**, while there was a small effect from breast cancer diagnosis (+ 0.761kg, CI 0.0041 – 1.481, p=0.038)

Pre-menopausal status at diagnosis predicted higher weight gain in women diagnosed with breast cancer (Fig 1)

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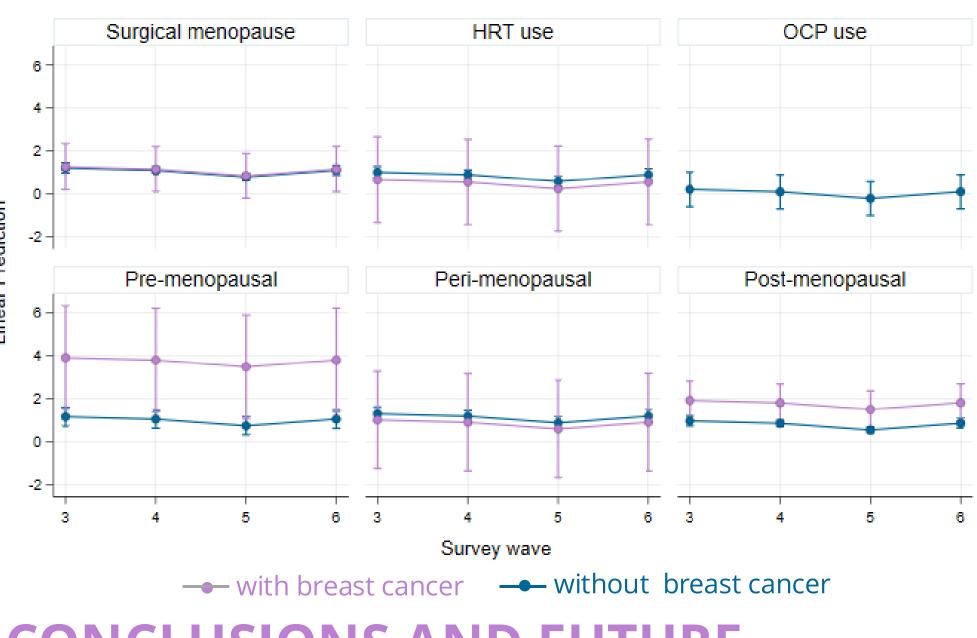
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RESULTS

13,714 women responded to the initial survey. 58% completed survey 9.757 women were diagnosed with breast cancer after survey 1.

Fig 1. Interaction of menopausal stage at diagnosis and breast cancer on weight change



CONCLUSIONS AND FUTURE DIRECTIONS



Weight gain is common in midlife women, and is associated with well-known **health** and socio-economic factors



Breast cancer diagnosis has a **small** additional impact on weight gain in midlife



Women who are **premenopausal at diagnosis** may require additional weight management support, and underlying mechanisms of weight gain in this cohort should be explored