Reviewer’s report:

The manuscript presents results from a secondary analysis of qualitative interviews with older breast cancer patients. The authors examined decision making and coping mechanisms used by older women as they considered whether to have surgery or primary endocrine therapy. It is a well written report on an understudied topic and would be a contribution to the literature. The tables provide a nice sample of patient quotes illustrating the different aspects of the framework. A few suggestions however to strengthen the manuscript.

Major revisions

1. In the abstract, intro and methods the authors should clarify that this is a secondary analysis of a data set.

2. More details about the interviews would be important – was there a structured interview guide? Given that this is secondary analysis, how did the CODE framework influence the interview guide (assuming there was one)? Given that there were two interviewers listed, how were they trained and how was the fidelity of the interview assessed?

3. Please add more details on the coding process, e.g. who coded the interviews? Why were only 20% double coded? How much discrepancy was there between the two coders? Please present results from the analysis of reliability of double coding.

4. There seem to be inconsistencies with the eligibility criteria. If eligibility criteria were within 5 years – how is it that the range of time from diagnosis is much longer than five years? Also an eligibility criteria is that they were offered both surgery and PET yet they present results that many women were not offered both—how were patients assessed for eligibility? Why were patients who did not meet eligibility included in the data set?

5. The results are very difficult to interpret due to the vague wording (e.g. “some patients described difficulty with the decision and others felt pleased they were offered a choice” or “many patients did not perceive they had a choice”). Please report how many patients from the sample actually supported the themes and results presented. This comment applies to most of the results section and is critical for helping the reader interpret the results.

6. In the discussion it would be helpful to draw the links more clearly to the need for decision support in this population. The implications written seem so generic that that they are not providing any insight and could have been written without
the study (e.g. decision support tool should recognize individual variation in decision making and should have concise easy to understand information). What issues or gaps did the authors find relevant to this population of older women that might help developers? What gaps did they find in the quality of decisions for this population and what are the key information needs of these patients that might differ for younger patients?

Minor revisions

7. In the analysis section – it is not clear what the authors mean by the first sentence “The interviews were analysed using a framework approach.” Perhaps this could be deleted as the next sentence seems to be more relevant?

8. Please present results on the response rate for the study (how many women were approached for interviews and how many agreed and completed the interview).

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**

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