BACKGROUND

• Breast cancer (BC) is the most common malignancy among women (>1.7 million new cases diagnosed worldwide in 2012) and the third leading cause of cancer death in women.

• Despite treatment for early-stage disease and adjuvant systemic therapy, ~30% to 50% of women with an initial early-stage BC diagnosis will develop recurrent advanced BC (mBC) or metastatic BC (mBCd).

• Mortality after survival recurrence of BC is 2 to 3 years, with only 23% of patients with BC surviving 5 years.

• Current guidelines of mBC therapy are to alleviate symptoms, delay disease progression, improve or maintain quality of life, and prolong overall survival, however; the majority of BC-related deaths are a result of complications from recurrent or metastatic disease.

• A recent retrospective analysis of linked Surveillance, Epidemiology, and End Results (SEER) Program–Medicare data revealed significantly higher rates of resource utilization and healthcare costs in women with stage IV estrogen receptor-positive (ER+)/HER2– BC who did not receive human epidermal growth factor receptor 2 (HER2) targeted therapy compared with other BC subtypes.

• Limited published data are available on the resource use and costs associated with treating hormone receptor-positive (HR+)/HER2– BC (mBCd).

OBJECTIVE

• To conduct a structured review of the literature reporting how various treatments affect the economic burden associated with treating postmenopausal women with HR+/HER2– mBCd.

METHODS

• Data Sources: Nine studies related to the economic burden of aBC were identified in the literature review.

• Current goals of mBC therapy are to ameliorate symptoms, delay disease progression, and improve or maintain quality of life.

• A separate study from the records of 14 US health plans found hospital outpatient costs to be among the most common economic burdens, with a mean annual cost of $119,211.

• The direct and indirect economic costs attributable to aBC were substantial, and the cost burden increased with disease stage.

• The 6 studies reporting actual costs are presented in Table 2 and cost-effectiveness results for selected treatments are presented in Table 3.

• Seven studies reviewed the cost-effectiveness of everolimus plus exemestane.

• Three systematic reviews compared cost-effectiveness across multiple nonsteroidal AIs (NSAIs).

• Five studies were conducted in the United Kingdom and the United States.

Economic Evaluations

• Thirty-five economic evaluations were identified in the literature review.

• One study reviewed the cost-effectiveness of fulvestrant monotherapy in fulvestrant-plus other treatments.

• Seven studies reviewed the cost-effectiveness of everolimus plus exemestane.

• These studies were conducted in Greece, Russia, the United Kingdom, and the United States.

• Two studies evaluated the budget impact of everolimus plus exemestane.

• Seven systematic reviews compared cost-effectiveness across multiple nonsteroidal AIs (NSAIs).

• These studies were conducted in the United Kingdom and the United States.

Economic Burden

• Indirect costs associated with mBC:
  - Indirect costs have been recognized as an important component in evaluating the economic impact of mBC.
  - Women with mBC experience significantly higher productivity loss due to paid time off and modified workdays compared with women with early-stage BC.
  - The economic burden associated with productivity loss is also significant for caregivers.
  - Supportive care represented another substantial indirect cost.

CONCLUSIONS

• Patients with aBC had increased economic burdens vs patients with mBC of similar disease stage.

• The majority of the economic evaluation studies identified in this literature review examined the cost-effectiveness of everolimus plus exemestane (2013 studies).

• Among these studies, over 75% (77/102) found everolimus plus exemestane to be more cost-effective vs exemestane monotherapy or other NSAlas.

• Furthermore, in the 2 budget-impact evaluation studies identified, everolimus plus exemestane treatment was found to have no impact or impact on overall healthcare costs, as the cost of this combination treatment was expected to be offset by cost savings (e.g., reduced number of progression patients and reduced medical services costs).

• NSAlas were found to be more cost-effective than taxanes, taxotere, or other older treatments.

• Treatments that reduce risk of relapse and have manageable safety profiles may help reduce the economic burden associated with aBC.

DISCLOSURE

This study was funded by Novartis Pharmaceuticals Corporation.