

Hypothetical budget impact analysis of patient access schemes in the management of metastatic breast cancer in Malaysia

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ABSTRACT

Introduction: In Malaysia, cancer is one of the leading causes of death, where breast cancer is the number one cancer in Malaysia. Given the increasing pressure on healthcare budgets, payers are forced to restrict access to drugs. This study aims to evaluate and estimate the costs from a payer's perspective and the benefits of the Patient Access Scheme (PAS) as an alternative to improve access to innovative therapy. **Methods:** A Delphi Panel was used to identify the epidemiological and resource data to estimate the cost inputs of estrogen/progesterone positive, and HER-2 negative metastatic breast cancer (MBC). Three rounds of the Delphi Panel were used to identify, explore and confirm the inputs. A budget impact model estimated the 3-year budget impact analysis of introducing PAS for the Cyclin-dependent kinase (CDK) 4/6 inhibitors in the management of MBC. **Results:** The study estimated 240 new patients per year were treated either with or without the innovator CDK 4/6 inhibitors. Both simple and complex finance-based PAS reduced the overall cost in line with the cost reduction. The outcomes-based schemes with a refund for failed therapy produced limited benefits. An affordability-based patient co-sharing scheme reduced the overall cost with limited benefits. **Conclusion:** The budget impact analysis shows a large increase in cost even with PAS. Among the hypothetical scenarios, a simple scheme with a 70% discount showed an equivalent reduction in budget impact analysis. PAS must be considered on a case-by-case basis and by specific indication to reduce the risk of unexpected budget expansion.