Cost-effectiveness Thresholds for Decision Making about Health Care Technologies: Conceptual and Empirical Underpinnings

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Background

- Widespread use of economic evaluation to support decisions regarding new medical technologies
- Some form of cost-effectiveness analysis predominates
 Measure of (health) effects in natural units
- Costs and effects ultimately have to be valued in commensurate units for decision making



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Decision rules

• Standard ICER decision rule: $\Delta C/\Delta E < \lambda$

Where λ is the threshold

- Net monetary benefit: $(\Delta E \times \lambda) - \Delta C > 0$
- Net health benefit:

 $\Delta E - (\Delta C / \lambda) > 0$



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The region of cost-effectiveness



Alternative sources of the threshold





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Some considerations

- Which type of health care system?
 - Budget constrained
 - Freely funded
 - Mixed
- Should threshold vary by clinical area?
- What methods and datasets exist for estimation?
- What level of precision is need in the estimate?
- How do we deal with the inevitable uncertainty?
- Can different concepts of the threshold co-exist?
- How often should the threshold be re-estimated?
- Should the threshold only reflect only unweighted health?





Our speakers

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