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Cost-utility analysis of health care interventions using clinical trial data:

Key aspects and case study

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The Hub

- **MISCH**: Methods and Implementation Support for Clinical and Health research
- Aim: To provide support on core research methods to researchers and affiliated researchers of the University of Melbourne in health research
- Scope of support: Biostatistics and Clinical Epidemiology, Health Economics, Clinical Trials, Implementation Effectiveness and Co-Design and Health Informatics (REDCap).

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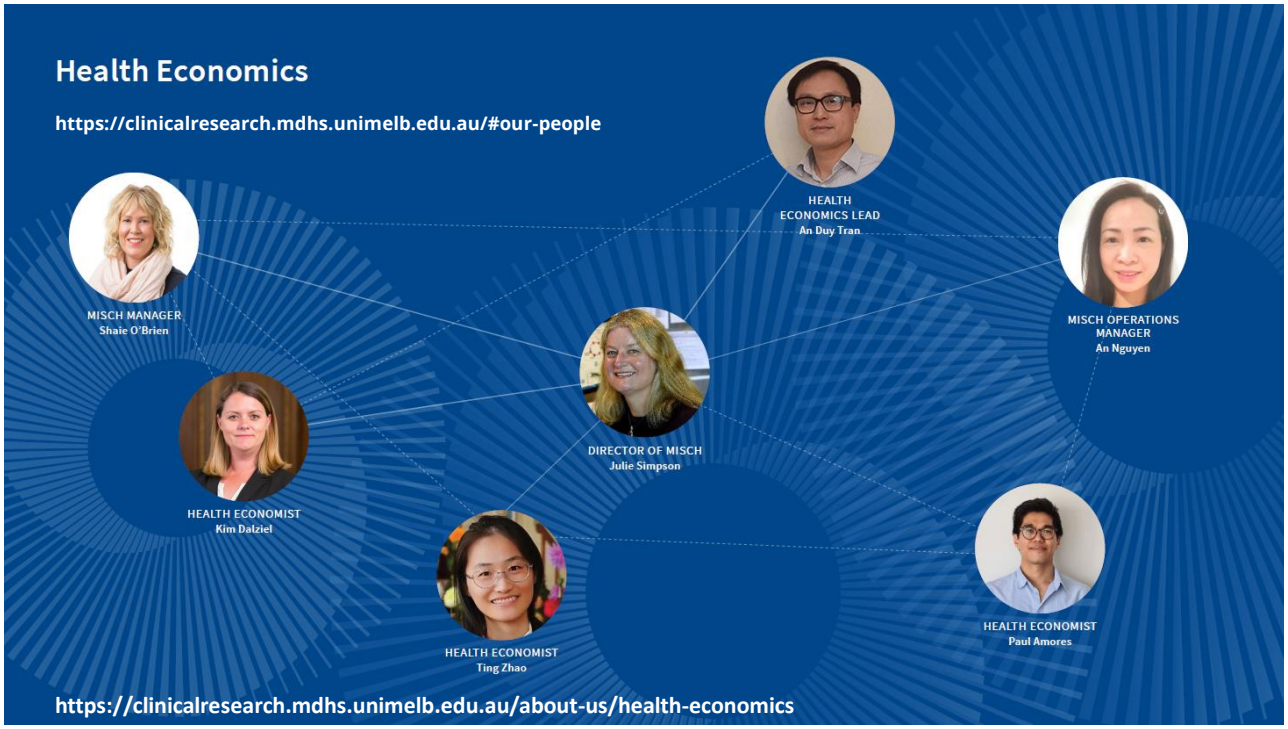

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- A copy of the slides will also be provided.

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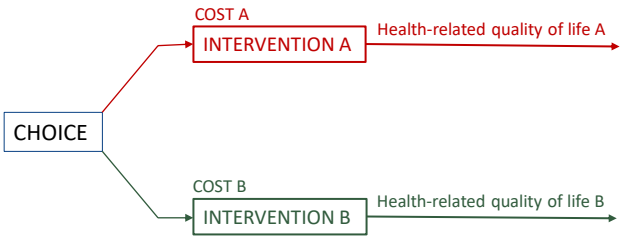
What is cost-utility analysis (CUA)?

- Cost-utility analysis is a type of **economic evaluation** which involves the comparative analysis of alternative interventions in terms of both costs and **quality-adjusted life years** (QALYs)
- Basic tasks involves identification, measurements, valuation, and comparison of costs and consequences



General rule:
Difference in cost is compared with difference in QALYs

How CUA differs from other types of economic evaluation?

TYPE	OUTCOMES	DECISION
Cost-effectiveness	Comparison based on a common measure on health, e.g. LY's gained, blood pressure reduction	Cost per natural unit of consequence, e.g. cost per 10 mmHg reduction in systolic blood pressure
Cost-utility	A summarised measure of impacts on health-related quality of life, valued as "utility", used to estimate quality-adjusted life years (QALYs)	Cost per preference-based unit of consequence, e.g. per QALY
Cost-minimisation	Not compared, assumed identical in all aspects	Least cost alternative
Cost-benefit	A summarised measure of impacts on health and non health benefits valued in monetary term (i.e., Dollars)	Net financial cost Cost/benefit ratio
Cost-consequences	Various health outcome measures, reported in a disaggregated way	At discretion of decision makers

Cost-utility analysis in brief

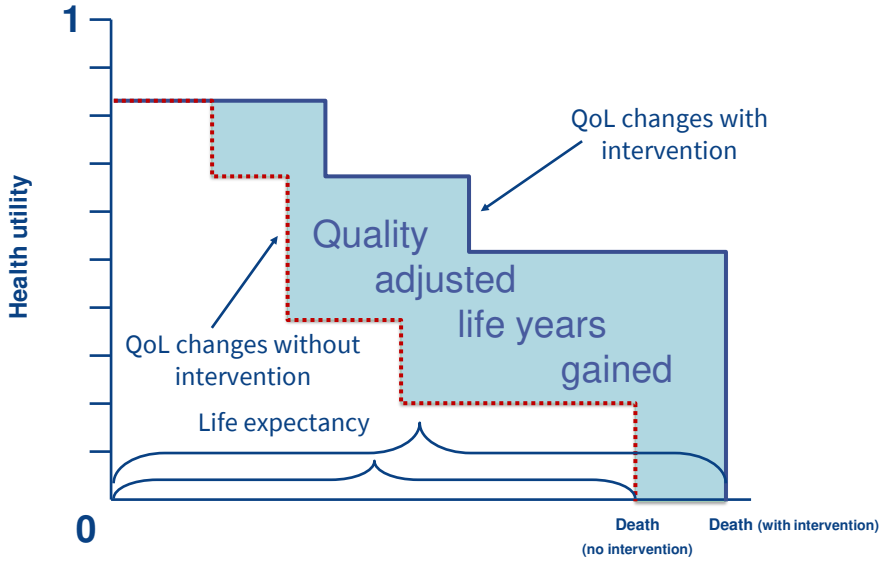
- A variant of cost-effectiveness analysis (often referred to as such)
- A generic measure of health is used for consequences
- Can be used to compare interventions in different clinical areas to assess the opportunity cost of adopting a program
- Utility in this type of analysis refers to individuals or society's preference for any set of health outcomes (health states)

Twins may rank "having a broken arm" on a scale 0 (death) to 1 (perfect health) differently

Why cost-utility analysis?

- Health care resources are scarce
- Cost-utility seeks to inform decisions in health care on how the available resources should be used to maximise health gain in terms of both quantity and quality of life lived
- Cost-utility analysis as well as other types of economic evaluation help to make the criteria for making decision explicit (e.g., avoid a situation where a decision is made based on "gut feeling"

Using QALYs to measure outcomes



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Examples of health utility instruments

	No. questions/ No. dimensions	No. levels for each dimension	No. unique health states	Costs
EQ-5D-3L	5/5	3	243	Varies
EQ-5D-5L	5/5	5	3,125	Varies
SF-6D (based on SF-36)	11/6	4-6	18,000	Free for publicly funded research
HUI-2	7/7	3-5	24,000	Free/ fees for proprietary materials
HUI-3	8/8	5-6	251,942,400	Free/ fees for proprietary materials
AQoL-8D	35/8	4-7	217,728	Free
PedsQL (2-18 years old)	23/4	5-8	1,000	Varies
CHU9D (7-17 years old)	9/9	5	1,953,125	Free for non-commercial use

Which instrument to use?

Example: Some aspects used for judging the merits of a preference-weighted instrument for HRQoL measurement

Aspect	Component
Practicality *(acceptable to the patients and stakeholders*	Time taken to complete; response rate; completion rate
Reliability *(can reproduce similar results over repeated measurements on the same population)*	Stability over time; agreement between raters; agreement between scores from different places of administration
Validity *(extent to which an instrument measures the value placed on health)*	Content validity: Coverage of health dimensions; sufficient sensitivity Face validity: relevance and appropriateness for the population Construct validity: ability to reflect differences in health

Source: Brazier J and Deverill M. A checklist for judging preference-based measures of health-related quality of life: learning from psychometrics. Health Econ 1999;8:41-51

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Recommendations for use of utility instruments

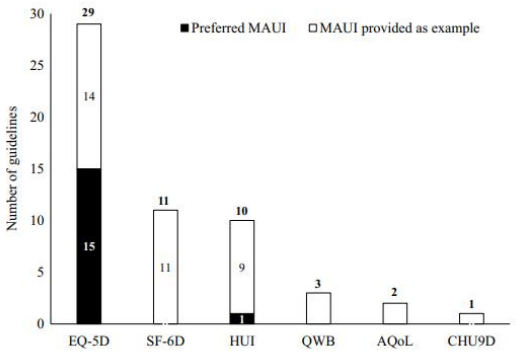

Fig. 2 MAUIs preferred or provided as an example across identified official PE guidelines. *AQoL* Assessment of Quality of Life, *CHU9D* Child Health Utility 9D, *HUI* Health Utility Index, *MAUI* multi-attribute utility instrument, *QWB* quality of well-being, *SF-6D* Short-Form 6-Dimension. Numbers sum to more than 34 because some guidelines cite more than one MAUI

Source:

The European Journal of Health Economics (2020) 21:1245–1257
https://doi.org/10.1007/s10198-020-01195-8

ORIGINAL PAPER

Which multi-attribute utility instruments are recommended for use in cost-utility analysis? A review of national health technology assessment (HTA) guidelines

Matthew Kennedy-Martin[1] · Bernhard Slaap[2,3] · Michael Herdman[4] · Mandy van Reenen[3] · Tessa Kennedy-Martin[1] · Wolfgang Greiner[5] · Jan Busschbach[2] · Kristina S. Boye[6]

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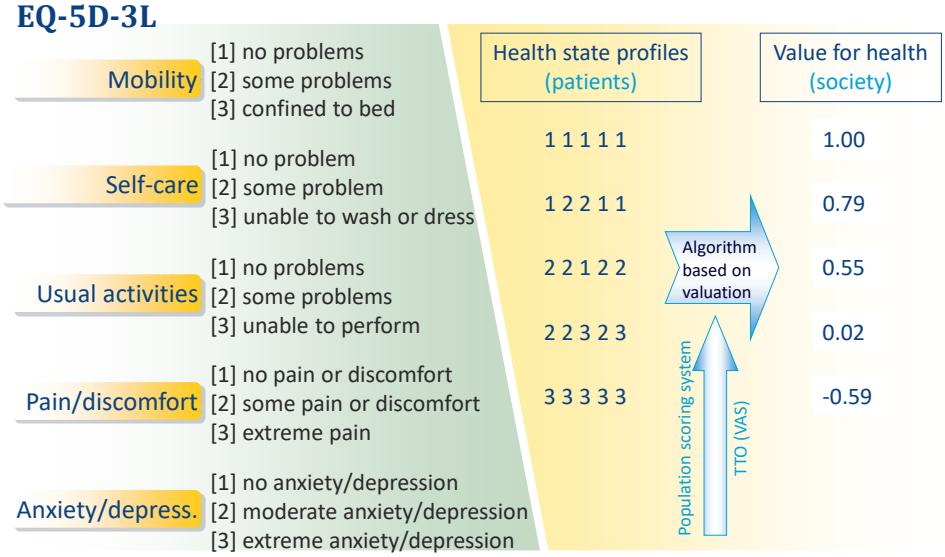
EQ-5D-3L



Value sets for EQ-5D are summarized at https://euroqol.org/publications/key-euroqol-references/value-sets/

EQ-5D-5 Levels

- Launched in 2009
- Improve the instrument sensitivity and reduce the ceiling effect of the EQ-5D-3L
- 5 levels of response: no problem, slight, moderate, severe , extreme
- Wording has changed
- Available in more than 130 languages
- A valuation set (tariff) is still being developed for a number of countries including the UK
- Cross walk values are available

Identifying resource use

- Consideration of perspective of the study
  - Payer (health service, patients)
  - Societal (payer, productivity losses, informal care)
- Types of resource use relevant to the comparison
  - Knowledge of the treatment pathways (e.g., resources needed to implement the treatment)
  - Knowledge of disease progression (e.g., resources needed to deal with complications)
- Target user of the study

Possible resources in broad categories

Health sector	Community health and personal social service	Patient and family	Other government sector cost	Productivity gains/losses
Hospital stay	Community-based social care	Travel time and expenses	Housing employment	Changes in productivity
Outpatient hospital attendances	Nursing home	Out-of-pocket costs	Education	Transfer payments
Staff time	Residential care	Over-the-counter medications	Home affairs and justice	
Drugs	Local authority day care	Opportunity cost of leisure time	Social welfare	
Consumables	Foster care service	Childcare costs	Transport	
Theatre time		Domestic costs		
Equipment				
Community-based healthcare visits				
Emergency service				
Paramedic service				

Measuring and valuing resource use

- Micro-costing
  - Bottom-up costing
  - Ingredients method
    - number of tests, time with counsellor, frequency of visits
    - Type and number of medications

- More accurate
- More relevant to a specific context
- More costly to collect

- Macro-costing
  - Top-down costing
  - Ignores variation
    - Average per day
    - DRG cost weight

- Less accurate (hidden uncertainty)
- Less relevant to a specific context
- Less costly to collect

Example: Micro-costing via health records

- Medicare Benefits Schedule (MBS) records (GP visits, Specialist consultations, diagnostic tests, pathology, allied health)

	A	B	C	D	E	F	G	H	I	J	K
1	AIHW	Date service	Medicare	Item description	Provider charge	Schedule fee	Benefit paid	Patient OOP	Hospital	Item category	
2	1	6/03/2014	66551	Glycosylated Haemoglobin	22.45	16.9	12.7	9.75	H	P2 Chemical	
3	1	19/03/2014	23	LEVEL 'B' Consultation	35.6	35.6	35.6	0		A1 General Practitioner	
4	2	21/03/2014	72816	Histo complexity level 3, 1 s	73.95	86.95	73.95	0		P5 Tissue Pathology	
5	2	21/03/2014	73926	Initiation of a patient episo	7.05	8.25	7.05	0		P10 Patient Episode Initiation	
6	3	21/06/2014	105	Subsequent Specialist Atter	80	42.2	35.9	44.1		A3 Specialist	
7											

- Pharmaceutical Benefits Scheme (PBS) records (pharmaceuticals use)

	A	B	C	D	E	F	G	H	I
1	AIHW	Supply	PBS item	Item description	Patient category	Patient OOP	Net benefit	Form category	ATC code
2	1	20-Apr-14	09302N	GLICLAZIDE 60MG TABLET MC	Concessional - Ordinary	0	9.05	REPEAT	A 10 B B 09
3	2	30-Aug-14	09007C	PERINDOPRIL 5MG TABLET AR	General Safety net	6.1	9.89	ORIGINAL	C 09 A A 04
4	3	16-May-14	08214H	ATORVASTATIN 20MG TABLET	General Ordinary	37.7	44.61	REPEAT	C 10 A A 05
5	4	16-Mar-14	08189B	ACARBOSE 100MG TABLET- S	Concessional - Ordinary	0	39.83	REPEAT	A 10 B F 01
6	4	28-May-14	08607B	METFORMIN 1G TABLET HCL-	Concessional - Ordinary	0	9.87	REPEAT	A 10 B A 02
7									

Notes on MBS/PBS data

- Require consent of the patients for their data to be released
- MBS/PBS allow access to a maximum 5-year window of data.
- Takes time and costs money to extract data (from $10k to $20k, depending on number of patients and time window)
- MBS/PBS data do not contain data related to hospital admissions
- MBS and PBS data rely on Medicare claims and patients filing a prescription; health care that is no claimed through Medicare or unfilled prescriptions is not captured in these datasets

Micro-costing using hospital data

- Hospital records are normally generated on discharge for billing purposes and normally contain:
  - Primary/ principle diagnosis (main reason the patient is in hospital)
  - Secondary/ other diagnoses (can be many fields – other things that happened while in hospital)
  - Date of admission / date of discharge
- Data linkage of hospital records is possible in some Australian states (e.g. WA and NSW) and requires:
  - Consent of the patient needed especially if it is being linked with other data;
  - Under some circumstances de-identified data can be linked and made available following protocol to ensure patient confidentiality

Incremental cost-effectiveness ratio (ICER)

Alternative 1	Alternative 2
Cost 1 (C_1)	Cost 2 (C_2)
Effect 1 (E_1)	Effect 2 (E_2)

$$ICER = \frac{C_2 - C_1}{E_2 - E_1}$$

- In cost-utility analysis, ICER typically represents incremental cost per QALY gained
- ICER can also be cost saving per QALY lost
- The willingness-to-pay threshold in Australia is in the range $45,000-$60,000 per QALY gained

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Cost-utility analysis example

Journal of the American Heart Association

ORIGINAL RESEARCH

Cost-Effectiveness of Combination Therapy for Patients With Systemic Sclerosis–Related Pulmonary Arterial Hypertension

An Tran-Duy, PhD[1]; Kathleen Morrisroe, MBBS, PhD[1]; Philip Clarke, PhD; Wendy Stevens, MBBS; Susanna Proudman, MBBS; Joanne Sahhar, MBBS; Mandana Nikpour, MBBS, PhD; Australian Scleroderma Interest Group (ASIG)*

Table 5. Base Case Analysis (Sampling Drugs Based on Distributions)

	Combination Therapy*	Monotherapy†	Incremental
Drug cost (95% CI), AU$	255 983 (252 354 to 259 679)	155 179 (152 596 to 157 816)	100 804 (99 750 to 101 863)
Nondrug cost (95% CI), AU$	6556 (6477 to 6635)	7934 (7824 to 8045.45)	−1378 (−1419 to −1339)
Total cost (95% CI), AU$	262 539 (258 865 to 266 300)	163 113 (160 462 to 165 819)	99 426 (98 394 to 100 441)
Life years	9.19 (3.84 to 3.96)	7.11 (2.97 to 3.08)	2.07 (0.87 to 0.88)
QALYs	3.90 (9.02 to 9.36)	3.02 (6.97 to 7.26)	0.87 (2.05 to 2.09)
ICER, AU$ per life year gained			47 989 (47 897 to 48 084)
ICER, AU$ per QALY gained			113 823 (113 302 to 114 364)

ICER indicates incremental cost-effectiveness ratio; and QALY, quality-adjusted life year.
*Combination therapy is treatment with two specific PAH agent from different classes at one time.
†Monotherapy is treatment with a single PAH-specific therapy.

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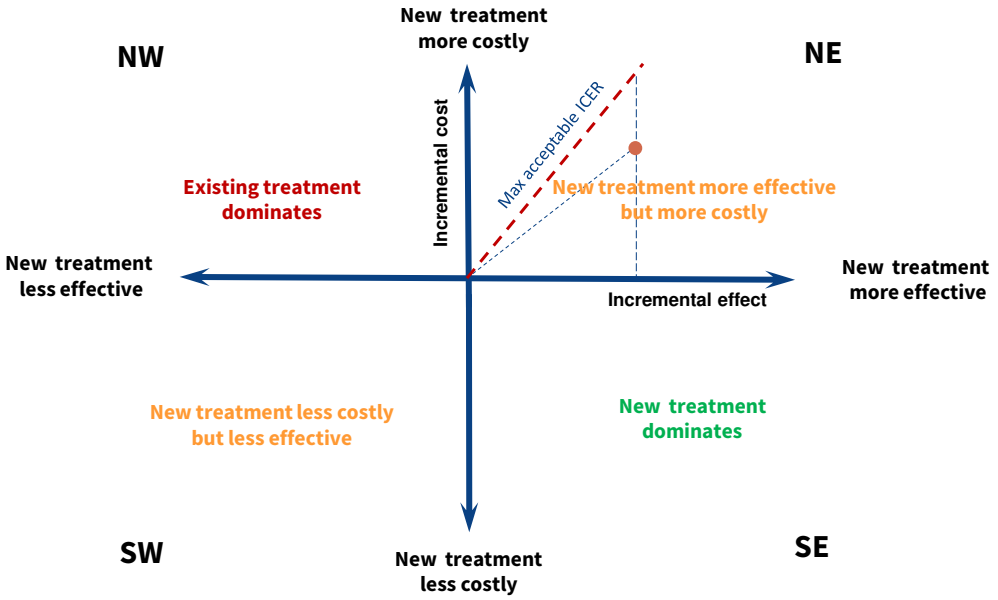
Cost-effectiveness plane



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Reporting an economic evaluation

ELSEVIER

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Contents lists available at sciencedirect.com
Journal homepage: www.elsevier.com/locate/jval

ISPOR Report

Consolidated Health Economic Evaluation Reporting Standards (CHEERS) 2022 Explanation and Elaboration: A Report of the ISPOR CHEERS II Good Practices Task Force

Don Husereau, BScPharm, MSc, Michael Drummond, MCom, DPhil, Federico Augustovski, MD, MSc, PhD, Esther de Bekker-Grob, MSc, PhD, Andrew H. Briggs, DPhil, Chris Carswell, BScPharm, MSc, Lisa Caulley, MD, MPH, Nathorn Chaiyakunapruk, PharmD, PhD, Dan Greenberg, PhD, Elizabeth Loder, MD, MPH, Josephine Mauskopf, PhD, C. Daniel Mullins, PhD, Stavros Petrou, MPhil, PhD, Raoh-Fang Pwu, PhD, Sophie Staniszewska, DPhil

ABSTRACT

Health economic evaluations are comparative analyses of alternative courses of action in terms of their costs and consequences. The Consolidated Health Economic Evaluation Reporting Standards (CHEERS) statement, published in 2013, was created to ensure health economic evaluations are identifiable, interpretable, and useful for decision making. It was intended as guidance to help authors report accurately which health interventions were being compared and in what context, how the evaluation was undertaken, what the findings were, and other details that may aid readers and reviewers in interpretation and use of the study. The new CHEERS 2022 statement replaces the previous CHEERS reporting guidance. It reflects the need for guidance that can be more easily applied to all types of health economic evaluation, new methods and developments in the field, and the increased role of stakeholder involvement including patients and the public. It is also broadly applicable to any form of intervention intended to improve the health of individuals or the population, whether simple or complex, and without regard to context (such as healthcare, public health, education, and social care). This Explanation and Elaboration Report presents the new CHEERS 2022 28-item checklist with recommendations and explanation and examples for each item. The CHEERS 2022 statement is primarily intended for researchers reporting economic evaluations for peer-reviewed journals and the peer reviewers and editors assessing them for publication. Nevertheless, we anticipate familiarity with reporting requirements will be useful for analysts when planning studies. It may also be useful for health technology assessment bodies seeking guidance on reporting, given that there is an increasing emphasis on transparency in decision making.

Keywords: cost-benefit analysis, economic evaluation, guidelines, methods, microeconomic analysis, reporting, standards.

VALUE HEALTH. 2022; 25(1):10-31

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Case study:

Cost-utility analysis of an electronic decision support system for post-natal depression screening: a societal perspective

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The PIRIMID trial

- Perinatal depression is highly prevalent, under-identified and under-treated
- PIRIMID is an electronic clinical decision support system for identifying perinatal depression and facilitating treatment uptake
- Randomised Control Trial clustered at the nurse level
- Trial conducted in the City of Whittlesea, Victoria

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Study design

- New mums aged 18+, who can read & speak English, attending initial Key Ages and Stages visit at a Maternal Child Health Centre
- Healthcare and societal perspective: direct costs (medication and healthcare use), indirect costs (productivity loss)
- Postnatal depression was assessed at 8 weeks after giving birth
- Outcomes measured at 8 weeks, 4 months, and 6 months after giving birth

Edinburgh Postnatal Depression Scale (EPDS)

- Widely used tool for perinatal depression screening
- 10 questions relating to depression symptoms in the last seven days, with total scores ranging from 0 to 30
- We define postnatal depression as having EPDS scores of 11 or more
- Assessed at 8 weeks after giving birth

EQ-5D-5L valued using the Australian scale

PharmacoEconomics
https://doi.org/10.1007/s40273-023-01243-0

ORIGINAL RESEARCH ARTICLE

The Use of a Discrete Choice Experiment Including Both Duration and Dead for the Development of an EQ-5D-5L Value Set for Australia

Richard Norman[1,2] · Brendan Mulhern[3] · Emily Lancsar[4] · Paula Lorgelly[5] · Julie Ratcliffe[6] · Deborah Street[3] · Rosalie Viney[3]

Accepted: 11 January 2023

Abstract
Background/Aims Discrete choice experiments (DCEs) with either duration included an attribute or with dead included as an option can be used as a stand-alone approach to value health states. This paper reports on a DCE with both of these features to develop an EQ-5D-5L value set for Australia.
Methods A DCE was undertaken using a large Australian panel of internet respondents, from which a sample of more than 4000 Australian adults was chosen, stratified to be population representative on age and gender. The DCE contained 500

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iMTA Productivity Cost Questionnaire (iPCQ)

VALUE IN HEALTH 18 (2015) 753–758

Available online at www.sciencedirect.com
ScienceDirect
journal homepage: www.elsevier.com/locate/jval

ORIGINAL ARTICLES
Economic Evaluation

The iMTA Productivity Cost Questionnaire
A Standardized Instrument for Measuring and Valuing Health-Related Productivity Losses

Clazien Bouwmans, MSc[1,2,], Marieke Krol, PhD[1,2], Hans Severens, PhD[1], Marc Koopmanschap, PhD[1], Werner Brouwer, PhD[2], Leona Hakkaart-van Roijen, PhD[1,2]*

[1]*Institute for Medical Technology Assessment, Erasmus University Rotterdam, Rotterdam, The Netherlands;* [2]*Institute of Health Policy & Management, Erasmus University Rotterdam, Rotterdam, The Netherlands*

ABSTRACT

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iMTA Productivity Cost Questionnaire (iPCQ)

- Instrument for measuring productivity costs
- 18 questions covering absenteeism, presenteeism and unpaid work
- https://www.abs.gov.au/statistics/labour/earnings-and-working-conditions/employee-earnings-and-hours-australia/may-2021/63060DO004_202105.xlsx
- Paid work is valued at $43.26/hr (mean wage, full-time adult female non-managerial employees), and unpaid work at $35.75/hr (mean wage, adult community and personal service workers)
- Assessed at 8 weeks, 4 months, and 6 months after giving birth

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Healthcare costs

- We use self-reported GP, psychologist, psychiatrist and hospital visits. We exclude medication use due to insufficient detail.
- We assume the cost of each GP, psychologist and psychiatrist visit using MBS Online (http://www9.health.gov.au/mbs/search.cfm)
- We assume the cost of each hospital visit using DRG weights (https://www.health.vic.gov.au/publications/wies-and-swies-calculator-2018-19)
- Reported at 8 weeks, 4 months, and 6 months after giving birth

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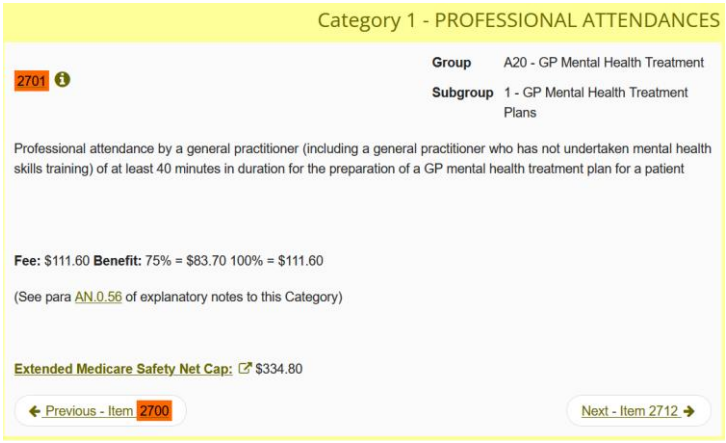
Assume GP visits cost $111.60 (MBS online)



Category 1 - PROFESSIONAL ATTENDANCES

2701

Group A20 - GP Mental Health Treatment

Subgroup 1 - GP Mental Health Treatment Plans

Professional attendance by a general practitioner (including a general practitioner who has not undertaken mental health skills training) of at least 40 minutes in duration for the preparation of a GP mental health treatment plan for a patient

Fee: $111.60 **Benefit:** 75% = $83.70 100% = $111.60

(See para AN.0.56 of explanatory notes to this Category)

Extended Medicare Safety Net Cap: $334.80

← Previous - Item 2700 Next - Item 2712 →

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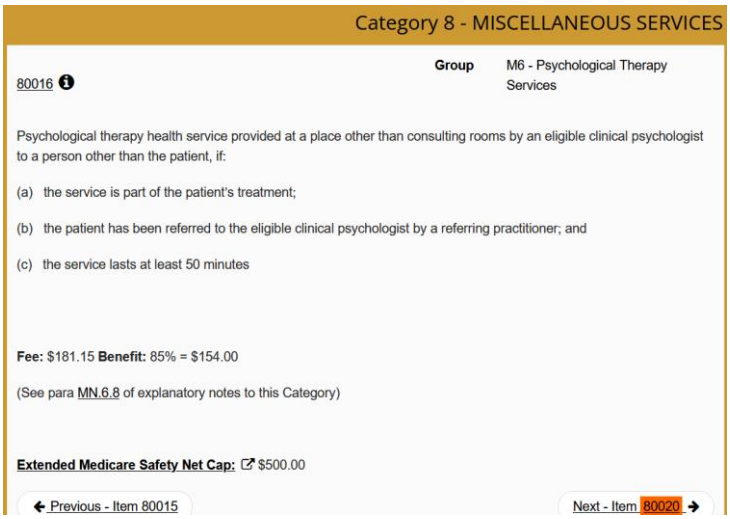
Assume psychologist visits cost $181.15



Category 8 - MISCELLANEOUS SERVICES

80016

Group M6 - Psychological Therapy Services

Psychological therapy health service provided at a place other than consulting rooms by an eligible clinical psychologist to a person other than the patient, if:

(a) the service is part of the patient's treatment;

(b) the patient has been referred to the eligible clinical psychologist by a referring practitioner; and

(c) the service lasts at least 50 minutes

Fee: $181.15 **Benefit:** 85% = $154.00

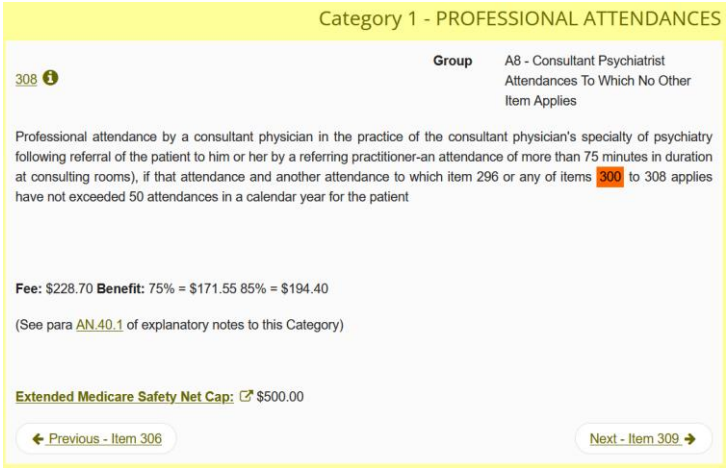
(See para MN.6.8 of explanatory notes to this Category)

Extended Medicare Safety Net Cap: $500.00

← Previous - Item 80015 Next - Item 80020 →

34

Assume psychiatrist visits cost $228.70



Category 1 - PROFESSIONAL ATTENDANCES

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Group A8 - Consultant Psychiatrist Attendances To Which No Other Item Applies

Professional attendance by a consultant physician in the practice of the consultant physician's specialty of psychiatry following referral of the patient to him or her by a referring practitioner-an attendance of more than 75 minutes in duration at consulting rooms), if that attendance and another attendance to which item 296 or any of items 300 to 308 applies have not exceeded 50 attendances in a calendar year for the patient

Fee: $228.70 **Benefit:** 75% = $171.55 85% = $194.40

(See para AN.40.1 of explanatory notes to this Category)

Extended Medicare Safety Net Cap: $500.00

Previous - Item 306 Next - Item 309

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Hospital visit costs (2018-19 WEIS calculator)

VICTORIA State Government | Health and Human Services

Department of Health and Human Services (Victoria)

Funding Policy and System Integration Branch

WIES CALCULATOR

[Incorporating Acute WIES20-WIES25 and Sub Acute WIES1-WIES3]

Acute Calculator | Acute Batch | Sub Acute Calculator | Sub Acute Batch

Contact:

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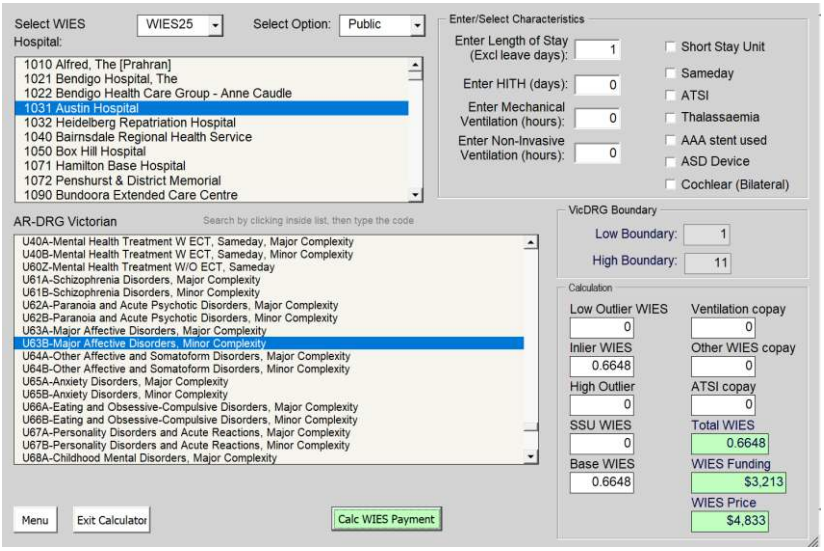
Hospital visit costs (2018-19 WEIS calculator)



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Summary Statistics

- Compare baseline demographics between treatment arms
- The treatment arms in this presentation are hypothetical because the trial is still ongoing
- As we found that the treatment group had similar demographic characteristics to the control group, no adjustment of costs and QALYs for the differences in baseline characteristics was made.

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Summary Statistics (Mean [SE])

	Treatment	Control	P-value
Married/partnered	0.967	0.958	> 0.05
	[0.008]	[0.021]	
Indigenous	0.005	0.000	> 0.05
	[0.003]	[0.000]	
Country of birth			
Australia	0.787	0.823	> 0.05
	[0.017]	[0.039]	
NZ and Oceania	0.019	0.000	> 0.05
	[0.006]	[0.000]	
Europe	0.039	0.031	> 0.05
	[0.008]	[0.018]	
…			
Joint significance test (F-stat)			0.720

Number of observations

- EPDS is missing for 69 women
- Some women disappear at 4 months then return at 6 months

	Time after giving birth		
	8 weeks	4 months	6 months
No depression	667	435	587
Depression	111	65	102
EPDS Missing	69	48	59
Total	**847**	**548**	**748**

Multiple Imputation (MI)

- Excluding mothers with missing values (e.g. attrition, non-response, etc.) may lead to bias and imprecision
- First, MI estimates the relationship between the observed data
  - Next, use that relationship to make *m* predictions of the missing values
  - *m* imputed values are then combined using "Rubin's Rule"
- Assumes that data are "missing at random" conditional on observed data

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Multiple Imputation (MI)

- We impute missing iPCQ, baseline EPDS scores, EQ-5D-5L, and demogs using the "mi impute chained" command in STATA
- Continuous variables were imputed using predictive mean matching (randomly selects from the nearest neighbours),
- Binary variables using logistic regression, categorical variables using multinomial logit, ordinal variables using ordered logit
- Predictors include: baseline EPDS scores, demographics, health utilities and productivity losses from other time points

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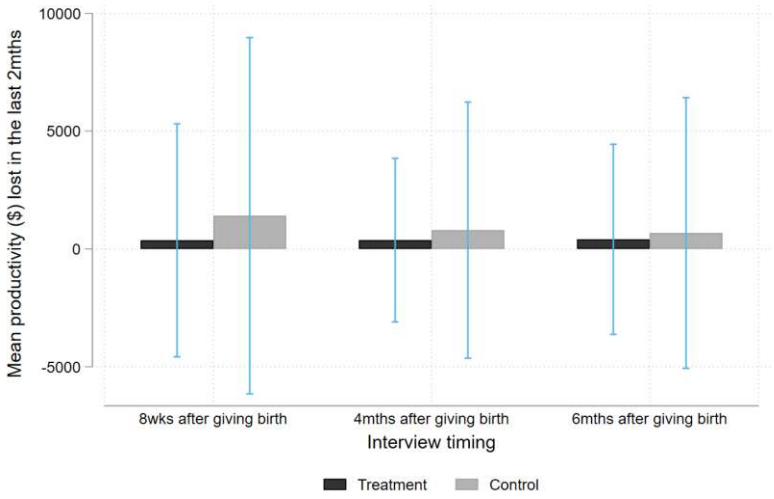
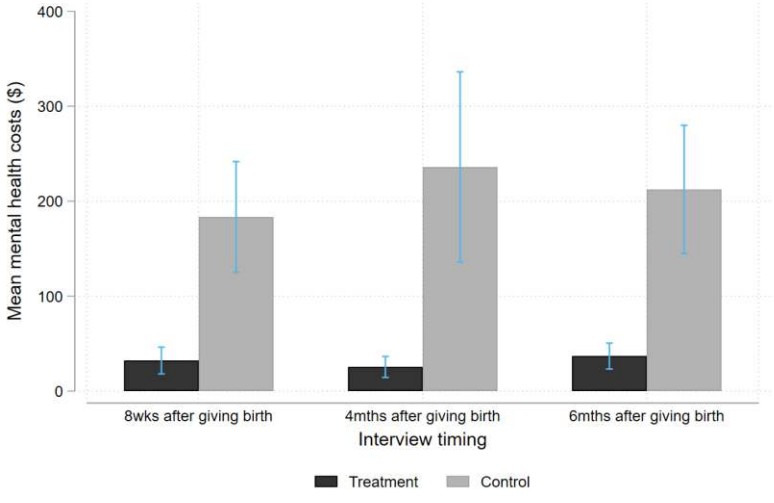
Productivity losses by treatment arm



43

GP/Psychologist/Psychiatrist visit costs



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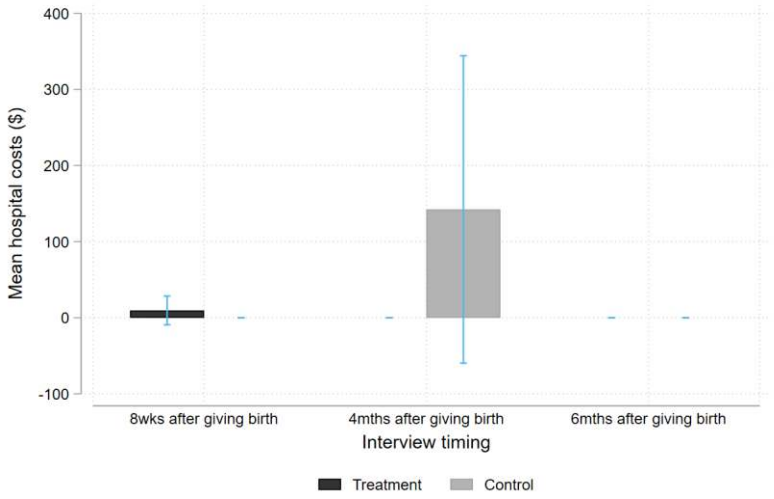
Hospital visit costs by treatment arm



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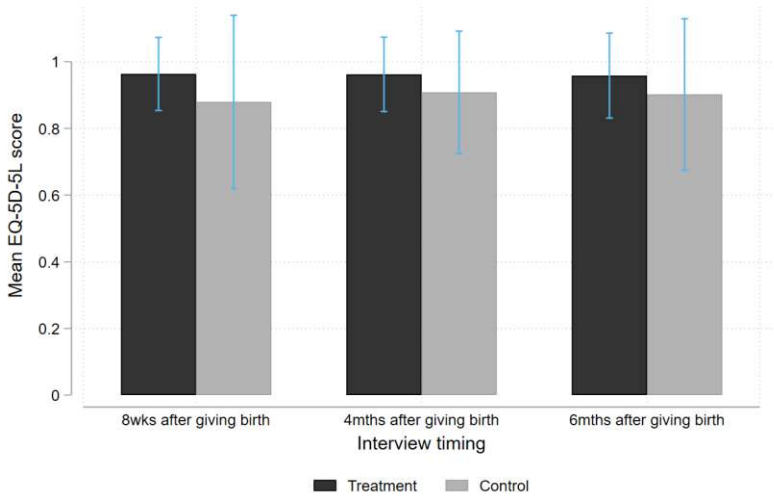
Health utilities by treatment arm



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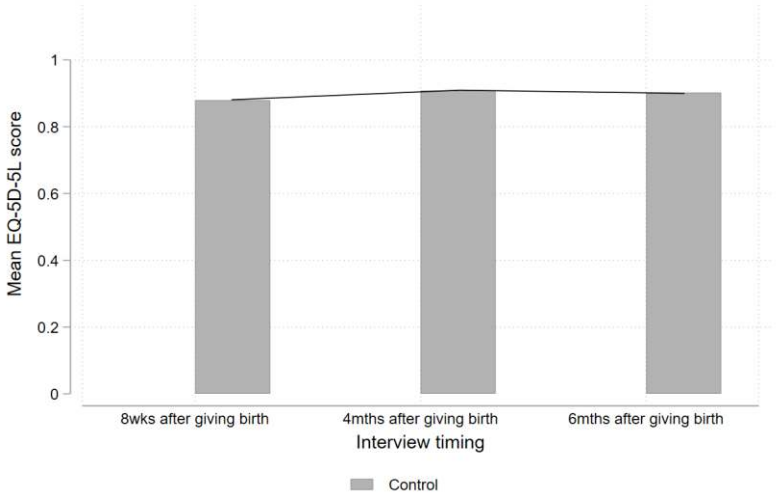
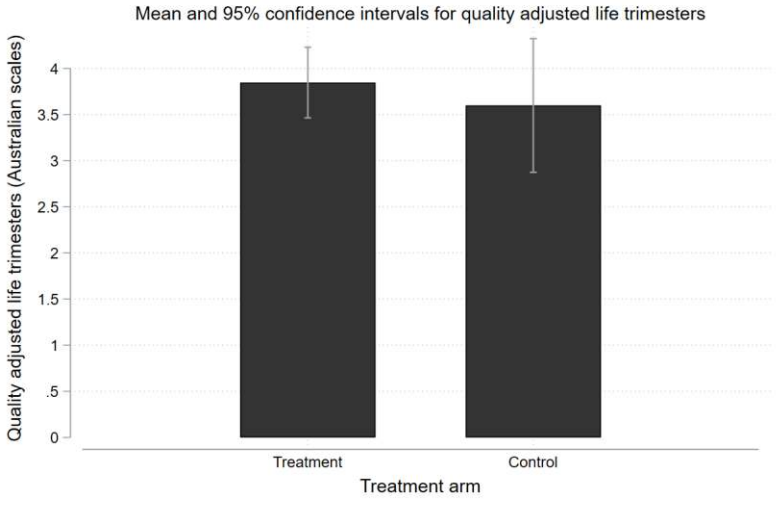
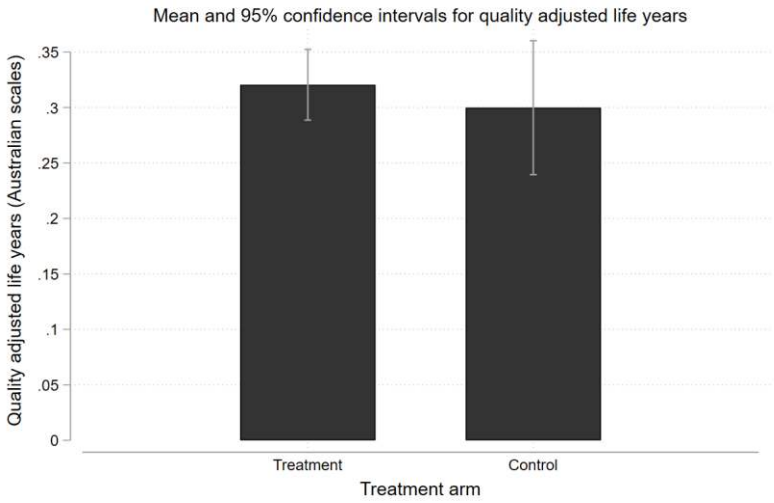
Turning health utilities into QALYs: Area under the curve



QALYs by treatment arms



QALYs by treatment arm



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ICERs by treatment arm (Mean [SE])

- We found that the hypothetical treatment was associated with lower costs and higher QALYs, indicating the treatment dominated the control.

	Treatment	Control	Difference
Productivity costs	$749.10	$2032.16	-$1283.06***
	[$3570.71]	[$5728.97]	[$19.98]
Healthcare costs	$78.89***	$506.49***	-$427.59***
	[$14.27]	[$71.55]	[$45.52]
Hospital costs	$8.71	$90.25	-$81.54**
	[$12.78]	[$64.21]	[$33.74]
QALYs	0.321***	0.300***	0.021***
	[0.016]	[0.031]	[0.002]
ICER ($/QALY)			-$85,342.38

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Health economics short courses

- https://mspgh.unimelb.edu.au/centres-institutes/centre-for-health-policy/research-group/health-economics/study/short-courses-in-health-economics
- Introduction to Cost-Effectiveness Analysis in Health (one day)
- Practical Methods for Health Economic Evaluation (three day)
- Designing Health Economic Evaluation Alongside Clinical Studies (one day)
- Evaluating Public Health Interventions using Economic and Epidemiologic Methods (one day)

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Some food for thought (1)

An RCT was conducted in patients with type 2 diabetes to compare the effects of two drugs on reducing risk of fatal cardiovascular complications. Based on available funding, 100 patients were recruited and followed up for 24 months in each treatment arm. Health-related quality of life was measured using EQ-5D-5L at baseline and at the end of the follow-up period. The results showed no statistically significant difference in survival rates between the two treatments.

1. Because the survival rates were not significantly different, should we conduct a cost-minimisation?

2. With the measurements of health-related quality of life, can we accurately calculate QALYs and conclude which drug produces a better health outcome?

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Some food for thought (2)

An RCT is designed to compare a novel lipid-lowering therapy with the traditional drug. The primary health outcome is a reduction in LDL-cholesterol at 3 months and the secondary outcome is quality of life measured on a simple visual analogue scale with 0 indicating death and 1 indicating perfect health. No other health outcomes are measured. All costs related to the treatments and health care resource utilisation are captured.

1. Is this study design adequate for a cost-utility analysis?

2. By conducting a trial-based cost-effectiveness, can policymakers use the results from this analysis only to conclude that the novel therapy is cost-effective compared with the traditional drug?

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Thank you

- Recording:- https://machaustralia.org/
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