Quality of life and patient benefit: The view of NICE – and a NICEr one

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Background

- How do we determine the most efficient allocation of resources when we do not rely on the market
  - e.g. in the case of non-market goods like health?

- The UK Treasury recommends:
  - using market data (revealed preferences)
  - constructing a market (stated preferences)

- In health we do something slightly different

Quality adjusted life years

- QALYs express the value of quality of life and length of life in a single index number
  - Q expressed on a 0-1 (death-full health) scale
- We look at QALYs with and without treatment and compare the benefits to the costs of treatment
  - Invest in low-cost QALYs e.g. below £30,000
- QALYS ARE A VERY GOOD IDEA

A NICE set of questions

- What?
  - Description of health
    - A generic measure e.g. the EQ-5D
- How?
  - Valuation of health
    - Preferences e.g. time trade-off (TT0)
- Who?
  - Source of values
    - Representative sample of the population

The EQ-5D

1. Mobility

I have no problems in walking about
I have some problems in walking about
I am confined to bed

2. Self-care

I have no problems with self-care
I have some problems washing or dressing myself
I am unable to wash or dress myself

3.Usual Activities

I have no problems with performing my usual activities
I have some problems with performing my usual activities
I am unable to perform my usual activities

4.Pain/Discomfort

I have no pain or discomfort
I have moderate pain or discomfort
I have extreme pain or discomfort

5.Anxiety/Depression

I am not anxious or depressed
I am moderately anxious or depressed
I am extremely anxious or depressed

The time trade-off

- Imagine that have some problems walking about for the next years and then dying
- How many years in full health is equal to this?
  - if you say 8.5 years
  - then having problems walking about = 0.85

General public TTO tariff for the EQ-5D

Dimension	Level	Coefficient
Constant		.081
Mobility	2	.069
	3	.314
Self-care	2	.104
	3	.214
Usual activity	2	.036
	3	.094
Pain/discomfort	2	.123
	3	.386
Anxiety/depression	2	.071
	3	.236
N3		.269

Problems with preferences

- Focussing
  - Attention on ‘becoming’ and not on ‘being’
  - Attention on negative things
  - Thinking about it means attending to it
- Fear
  - Responses reflect affective reactions
- Even patients suffer from similar biases

An alternative?

- Elicit subjective well-being (SWB) ratings
  - e.g. Global evaluation of life satisfaction

- Elicit health state descriptions and allow regression analysis to determine the effect of different states on SWB

An example

- The SF-36 health measure contains different levels of e.g. pain and mental health
  - And can be used in valuing the Q in the QALY

- It has been used in:
  - 600 members of the UK general public asked to imagine being in different health states
  - 10,000 in the British Household Panel Survey rate life satisfaction and describe health

Selected results

Worst level	SG	LS
Pain	.167 [1]	.034 [4]
Mental health	.128 [2]	.159 [1]
Physical functioning	.111 [3]	.071 [3]
Vitality	.091 [4]	.089 [2]

Conclusion

- QALYS ARE STILL A VERY GOOD IDEA
- We just need to elicit the Q differently

- THANK YOU