## How have qualitative methods been used to understand the valuation of preference-based measures? A scoping review

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## Abstract

**Objectives:** Qualitative research methods are growing in popularity for use in understanding how respondents complete preference elicitation tasks used to value generic preference-based measures (GPBMs) of health-related quality of life (HRQoL). The results of these investigations can be used to support the further design of valuation studies. However, there is no existing review that syntheses the qualitative evidence to date. This scoping review fills the gap and aims to summarize the existing qualitative evidence exploring valuation tasks, and the thought processes of respondents when completing the tasks.

**Methods:** The scoping review was conducted under the methodological framework developed by Arksey and O'Malley (Int J SocResMeth 8(2005) 19-32) and aligned with the checklist of Preferred Reporting Items for Systematic reviews and Meta-Analyses extension for Scoping Reviews (PRISMA-ScR). A systematic search of 4 databases identified literature that used qualitative methods to understand the thought process in the valuation of GPBMs. Data extracted from the literature included qualitative data collection and analysis methods, health states valuation methods, and the themes that emerged from the qualitative data. The quality of the studies was assessed using the Critical Appraisal Skills Programme (CASP) Qualitative Studies Checklist.

**Results:** In total, 2693 studies were screened and 2679 studies were out of scope for this review. Data extraction was carried out on the remaining 14 studies.

The majority of the studies focused on the EQ-5D-5L (40%), EQ-5D-Y-3L (27%), and EQ-5D-3L (20%) while the CHU-9D and SF-6D were investigated once each. Two studies recruited children and adolescents as respondents while the other studies' sample population was adults. The most common valuation method investigated was TTO (52%), followed by DCE(24%), VAS(14%) BWS(5%), and MACBETH(5%). To note, multiple categories may apply to one study.

Themes identified from the qualitative analysis regarding the thought process in valuations fell into 5 aspects: personal experiences, health/non-health consequences of health states, non-health conversion factors, difficulties in understanding the instruments, and difficulties in the valuation tasks. Overall, 57% of the papers reported that respondents drew on personal health experience and vicarious experience in valuation, and 79% suggested respondents made decisions considering not only the consequences of health states on themselves (such as loss of autonomy, independence, and integrity) but also the consequences on others, such as being a burden on families. The most common theme (85%) was the non-health conversion factors referring to personal interests or societal influence that might impact the valuations. The non-health conversion factors most often reported were individuals' coping strategies and availability of support.

**Conclusions:** This is the first review to assess the literature using qualitative methods to understand GPBMs valuation tasks and the completion strategies of respondents. Qualitative work is an essential part of developing valuation studies, as the results can inform study design, and provide context for the responses provided. However, qualitative assessment is limited, especially for the paediatric population. Further qualitative research is warranted to investigate the potential challenges in the valuations of paediatric GPBMs.