INAHTA

A checklist for health technology assessment reports

Introduction

Objective
This checklist has been prepared as an aid to furthering a consistent and transparent approach to health technology assessment. A general theme is the clear identification in an HTA report of what has been done in an assessment and of any significant limitations in the analysis.

A key to improving the usefulness and generalisability of HTA reports is to aim for transparency in the assessment process. Assessments will vary considerably in their depth and scope of analysis, given differences in the types of problem being addressed, policy requirements and the time and resources available for assessment. However, readers of an HTA report need to be able to easily obtain information on the purpose of the assessment, the methods used, assumptions made and conclusions reached.

Intended audience
The checklist is intended as a guide both for those who use HTA reports as a source of information and for those who prepare such documents.

For those reading reports prepared by other organisations, the checklist gives guidance on what to look for in an HTA report and in assessing the reliability of the information provided.

For those undertaking HTA, the checklist gives points that should be considered during the planning, conducting and reporting of the assessment. It is hoped that this guidance will help to improve the quality of HTA reports.

Context of material in the checklist
The checklist contains only brief details of a number of important points relating to HTA reports and is intended for initial guidance. The checklist should be seen as complementary to the authoritative guidelines for assessment of health technologies that have been prepared by a number of agencies.

It is stressed that an HTA report may be a valid and useful source of information even if it does not include a number of elements from the checklist. It is not essential for an HTA report to include all the attributes given in the checklist.

The checklist will help those reading and preparing HTA reports in consideration of which elements have been included and which omitted. The significance of any omissions in an HTA report will depend on how it is to be used by the reader. Those needing further assurance of the nature and quality of an assessment may well have to contact those who prepared the HTA report.
Contents of the checklist

The checklist includes 17 questions to be considered by those reviewing or preparing an HTA report.

Two of the questions, dealing with medico-legal implications and suggestions for further action, relate to points that may not be addressed in some reports.

The remaining questions deal with matters that should be considered for all HTA reports. Some of these cover provision of basic information and details of context; others refer to the steps taken in performing the assessment. Those dealing with selection and appraisal of information are followed by additional points for consideration, whose application will vary, depending on the scope of the report under review.

Under most of the questions, some further points and suggestions have been added in italics.

At the end of the checklist is a summary sheet that may be helpful for recording conclusions regarding the content of an HTA report.
The checklist

Preliminary information

1. Are there appropriate contact details for provision of further information?

Include a contact person or position with appropriate addresses.

2. Are those who prepared the HTA report identified as authors or in other ways?

Approaches and conventions will vary, but it will be desirable to have a clear indication of persons who were involved in preparing the report and of their roles. These persons may include authors, committee members (if that has been the approach used) and persons providing technical or administrative support.

It may be helpful to include a statement to the effect that the assessment has drawn on available published material and expert comment and is intended to be current at the date of publication.

3. Is there a statement regarding conflict of interest?

Conflict of interest is of concern here because of the perception that it could lead to unreasonable bias in an HTA report. A statement on conflict of interest would refer to those who prepared the report. There may be a need only to indicate there is no conflict of interest. It will be appropriate for reports to indicate whether funding for the assessment has been provided by sources other than those responsible for the author agency's usual budget.

It should be noted that conflict of interest may arise in relation to non-financial matters.

4. Is there a statement on whether the report has been externally reviewed?

External review of a report is generally regarded as a measure that improves its quality and credibility. Details provided regarding the review process will vary, but it is helpful to include names and affiliations of persons who have provided comment or information during preparation of the report.

5. Is there a short summary that can be understood by the non-technical reader?

This is a highly desirable feature of an HTA report. Many of the policy makers and other non-technical recipients of the report will only read the summary. This is a major aid to getting the message of the assessment across to a wider audience. The summary might cover the purpose and scope of the assessment, refer to the approach taken, give leading results and include clear conclusions. It should preferably not exceed two pages — longer summaries tend not to be read.

It is highly desirable for non-English language HTA reports to include an English version of the summary.

Inclusion of a structured abstract can be a helpful approach to concise presentation of essential details.
Why the assessment has been undertaken

6. Is reference made to the question that is addressed and the context of the assessment?

The context of an HTA report is an important aspect in considering its contribution to knowledge about a technology.

Reports should specify why an assessment has been undertaken and, where appropriate, who has requested this work. It will also be important to outline the relationship of the HTA question to the health care system, with reference to related health services and technologies, and the population for whom the technology is intended.

7. Is the scope of the assessment specified?

The report should indicate which attributes of the technology are addressed and preferably also clearly indicate areas that are not included in the assessment.

8. Is there a description of the health technology that has been assessed?

A short description of the technology will be helpful for the general reader. Details of what the technology does and how it works will be useful but should be concise - a textbook approach is not needed. Brief reference to alternative or competing technologies may also be helpful.

How the assessment has been undertaken

9. What sources of information have been used?

- Details of the literature search should be provided. These should include databases used, years covered, any language restrictions and key search terms. Details of other sources of information should also be given.
- Details of the source and basis of any cost data should be given, preferably with comment on their accuracy.
- Information on the source of any other administrative data should be provided, with comment on their scope and accuracy.
- A list of references/bibliography should be included.

Some reports will include more extensive details of the literature search. It is suggested that full details of the literature search should be available on request, but not necessarily included in the report. Quality and relevance of cost data will vary with their source and nature, which may range from administrative data collected for other purposes to a bottom up approach specifically directed towards the assessment being undertaken. If arbitrary values have been assigned to costs, appropriate justification should be provided.

Usually, only references selected for inclusion in the analysis or commentary will be cited in the report. However, details of rejected references should be available on request.
10. Is there information on the process for selecting material for assessment?

- Process used by assessors
  (The report should indicate who has undertaken selection and extraction of data and how this processing has been done.)

- Technical issues
  (If these are addressed, include the source of material, and the basis for selection.)

- Safety
  (For example, regulatory decisions; information on adverse effects. The basis for selection of material should be indicated.)

- Efficacy/effectiveness
  (Details of the basis for selection should be given — for example, consideration of study design, numbers of subjects. Is it made clear why the selected papers have been chosen and not others?)

- Economic impact
  (May include cost or economic studies of similar applications; the basis for selection should be given.)

- Equity
  (Material relevant to the local health care system and community, possibly also to the disease or condition for which the technology is to be used. Details of the basis for selection should be given.)

- Societal and Ethical issues
  (Any specific issues relevant to the technology and its use should be included.)

- Organisational issues
  (Any issues specific to the local health care system that are related to the acquisition and operation of the technology.)

Accuracy and consistency in data extraction are extremely important. Errors can be minimised by designing data extraction forms with clear instructions and using at least two reviewers to perform data extraction independently.

If the sources of information have been identified, are there details to indicate how material has been selected for inclusion or exclusion in the report? Use of a CONSORT type diagram to summarise what has been included and excluded in the literature selection process would be a helpful feature. Some attributes (for example, safety of the technology) may not be covered in some reports.
11. Is there information on the basis for interpretation of selected data?

- Technical issues
  (If technical issues related to the technology have been assessed, they should be addressed clearly and appropriately.)
- Safety
  (The relevance to the specific application and the local health care system should be made clear.)
- Efficacy/effectiveness
  (The report should describe results of relevant studies and consider their quality and limitations. There should be an indication of how these results have been synthesised; the approach taken to any non-quantitative synthesis should be outlined.)
- Economic impact
  (The approach to any synthesis and extrapolation of results from the literature selected should be described. If the HTA report includes cost or economic analysis, details of methods used and assumptions made are required. The quality of available studies should be considered. There should be adequate sensitivity analysis.)
- Equity
  (There should be a description of what has been done in the analysis, including the arguments and approaches used.)
- Societal and ethical issues
  (The basis for discussion should be clearly outlined.)
- Organisational issues
  (Sources of information should be clear and analysis transparent.)

Appraisal of the quality of the available material should be an important component of an HTA report. Assessment of quality of life studies should consider whether valid instruments have been used. For these and other types of study attention should be paid to whether there is good comparison between groups.

**The results of the assessment**

12. Are the results of the assessment clearly presented?

There will be a synthesis from the analysis of the material selected for assessment — quantitative or non-quantitative. Absolute values should be presented, not just relative values. Estimates or indications of uncertainty and potential bias should be included.

13. Is there interpretation of the assessment results?

There should be a clear interpretation of the results. It will be helpful to include comment on their likely relevance to clinical practice and to the health care system.

*Tabular presentation of material is a commonly used and helpful approach.*
Implications of the assessment results and conclusions

14. Are the findings of the assessment discussed?

Discussion of the findings should include:

- The relationship of the results obtained to the question being addressed by the assessment.
  (Information from the literature may help only to a limited extent.)
- Comment on missing or uncertain information, and the reliability of the analysis
  (This may perhaps be brief.)
- The basis for the opinions and conclusions in the report.
  (Do the assessment findings follow from the data? Are additional assumptions or opinions contributing to the position taken? If so, what are they? Has the report addressed all the potential benefits and disadvantages of the intervention? Have the objectives of the assessment been met?)

The discussion should be bringing earlier components of the report together in the context of the question that has been asked.

Frequently, judgments will have to be taken in the absence of definitive data on the performance of a technology. The nature and basis of such judgments should be made explicit. As in other parts of the report, transparency should be a key feature. The reader should be given a clear account of what has been done, what has been assumed and what has not been done.

15. (If relevant to the assessment, are medico-legal implications considered?)

16. Are the conclusions from the assessment clearly stated?

The report should reach clear conclusions, which will make reference to the question addressed by the assessment and, where appropriate, its context. The conclusions should flow from the evidence that has been reviewed.

Some HTA reports will include recommendations. Not all agencies will have a mandate to make explicit recommendations, but the conclusions of the assessment should be clear to the reader.

17. (Are there suggestions for further action?)

It may be helpful for the HTA report to include discussion of current research/information gaps, directions for future research and assessment and approaches to dissemination of findings.

It may be useful for HTA reports to address the implications of their findings for policy, where such analysis is within the mandate of the assessment organisation.
A summary for HTA reports

This summary form is intended as an aid for those who wish to make a record of the extent to which a health technology assessment report meets the 17 questions given in the checklist.

It is NOT intended as a scorecard to rate the standard of HTA reports — reports may be valid and useful without meeting all the criteria that have been listed.

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