Introduction to Cochrane Heart

Cochrane Heart is an editorial group that publishes summaries of the best quality research available to help people make better informed decisions about cardiac healthcare choices. These summaries are known as systematic reviews.

The Cochrane Heart Group's aim is to prepare, maintain and promote access to systematic reviews. Our scope includes primary and secondary prevention, acute treatment and rehabilitation. We cover all forms of heart disease, including ischaemic heart disease, arrhythmias, and congenital heart diseases. We also aim to make the results of research assessing the effects of health care on heart diseases more easily available and more relevant to health care professionals, policy makers and the public.

Cochrane Heart was founded in 1998 and is one of over 50 Cochrane Review Groups across the world. Our research is internationally recognised as the benchmark for high-quality information about the effectiveness of healthcare. We have over 30 editors and nearly 1000 authors who contribute to our Group. Our authors are typically health care professionals and researchers. Our wide membership includes clinicians, researchers and healthcare consumers who share an interest in generating reliable, up-to-date evidence relevant to the prevention, treatment and rehabilitation of particular heart problems.

We have carried out a number of previous prioritisation exercises, which are presented on our website (https://heart.cochrane.org/priority-setting).

Priority Setting Plan

We aim to follow the guidance for priority setting (version 2, October 2018) as provided by Cochrane Knowledge Translation.

Cochrane Heart will be conducting a priority setting exercise, to find out which questions are most important to focus on in terms of treating heart diseases and preventing cardiovascular diseases. We are undertaking priority setting so that our research concentrates on topics that are important to people, and on research that has not yet been done.

We will distinguish between identifying new priority topics and assessing the need for updates of existing reviews within our portfolio.
1. Identifying new priority topics

1.1 Scope

Due to the broad scope of our Group we will focus on different diseases/disease groups. Firstly, we will focus on interventions for the prevention and treatment of coronary artery disease. The aim is to complete the first process in 2021. Secondly, we will focus on heart failure, and anticipate completing the prioritisation process during 2022. We based the choice of these first two areas on our topics and titles priority exercise, which we undertook in 2018. Subsequent topic areas will be identified with experts and consumers starting in 2022.

1.2 Aims

Primary aim
To identify ten priority reviews that answer the most important questions in the chosen disease area (coronary artery disease in the first phase, heart failure during the second phase).

Secondary aims
To raise awareness of the Cochrane Heart Group, and what the group has achieved so far.
To engage effectively with stakeholders (especially consumers) to inform our work.
To raise awareness of the group’s future goals and opportunities arising for authors from this.

1.3 Administration and stakeholder involvement

Cochrane Heart Priority Setting Group (CHPSG)
The CHPSG will include the following stakeholder representation and will be led by the Co-ordinating Editor of the Heart Group:

- Three people living with a relevant cardiac condition or people who care for them (consumers).
- Four external stakeholders, such as healthcare professionals, including doctors and nurses, people linked to organisations that are involved with healthcare research, providing patient information, developing guidelines, or funding research.
- Five Cochrane stakeholders, for example people working in the Cochrane Fields, Cochrane Heart authors and editors.

Priority Setting Steering Group (Steering Group in brief)
The Steering Group currently consists of:

- Cochrane Heart staff: Co-ordinating editor: Rui Providencia (Group lead)  
  Managing Editor: Nicole Martin  
  Information Specialist: Charlene Bridges
- Cochrane Heart editors: Mahmoud Ahmad  
  Nikolaos Papageorgiou

We will send invitations to further members.
Other stakeholder involvement
Cochrane has a number of stakeholders, with whom the Steering Group will engage during the priority setting process.

- Cochrane Heart editors and clinical advisors
- Guideline makers e.g. European Society of Cardiology, American Heart Association
- Patient groups: The Arrhythmia Alliance, British Heart Foundation
- Clinical Groups like British Heart Foundation Clinical Research Collaborative (BHF CRC) and groups they in turn collaborate with, e.g. British Heart Rhythm Society, British Heart Failure Society, British Heart Valve Society
- Colleagues from other Cochrane Groups, Cochrane Centres and Fields

1.4 Collecting research topics and questions

We will use various sources to build a list of priority topics in our disease area of interest (firstly, coronary artery disease).

1.4.1 New Trials
We will look at areas where new trials have been registered (https://clinicaltrials.gov/), to get information on what the up-and-coming research areas in Cardiology are.

1.4.2 Conferences and Guidelines
We will search for trials presented in late-breaking sessions at the major cardiovascular conferences (American Heart Association (AHA), European Society of Cardiology (ESC) and American College of Cardiology (ACC)).

We will also consult relevant guidelines that have been published by major cardiology organisations such as AHA, ESC and NICE (National institute for Health and Care Excellence) to identify areas of uncertainties and those in need of research. Specifically, this can be done by collecting recommendations where there is disagreement between experts (ESC/AHA - Class of Recommendation II), and with levels of evidence B and C (low level of evidence or consensus) in the European and American Cardiovascular Guidelines.

1.4.3 Prioritisation exercises by other groups
We will review prioritisation exercises undertaken by the James Lind Alliance (JLA) and others.

Furthermore, cardiac disorders identified as carrying a significant global burden in the Global Burden of Disease (GBD) project and their representation in the Cochrane Heart portfolio will be considered and gaps identified.

1.4.4 Public survey
We will carry out a public survey with the particular aim to reach consumers, similar to our previous surveys via the Arrhythmia Alliance in 2018 and our Twitter campaign with the support of the World Heart Federation in 2016, which will be disseminated via online media and our stakeholders (patient groups, see 1.3).
1.4.5 Expert opinion
We will consult experts in the field/opinion leaders regarding areas of uncertainty. We will aim to do so with a targeted survey for an expert audience. We will disseminate this survey with the help of our stakeholders (clinical groups, see 1.3).

1.5 Data cleaning

The work from points 1.4.1 to 1.4.5 will result in a list of topics that will need to be refined before ranking of the importance of topics can occur. Topics will be removed from the list if:

- A high quality, current systematic review already exists and new evidence is unlikely
- they are beyond our scope
- they are unclear
- they duplicate topics already in the list

1.6 Prioritisation – consensus process

In addition to the topics, we will provide some additional information to aid the consensus process (Table 1, heavily customised SPARK tool, Elie 2017)

<table>
<thead>
<tr>
<th>Questions</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Addressing this question responds to a problem that is of large burden</td>
<td>Yes/No/unclear</td>
</tr>
<tr>
<td>Addressing this question responds to the needs of (tick all that applies):</td>
<td>Consumers</td>
</tr>
<tr>
<td></td>
<td>Healthcare professionals</td>
</tr>
<tr>
<td></td>
<td>Policy makers</td>
</tr>
<tr>
<td></td>
<td>Funders</td>
</tr>
<tr>
<td>Addressing this question is expected to positively impact equity in health (e.g. relevance for people in low and middle-income countries)</td>
<td>Yes (details)/No/unclear</td>
</tr>
<tr>
<td>The question can be translated into an answerable systematic review question</td>
<td>Yes (suggestions)/No</td>
</tr>
<tr>
<td>Are there any relevant Cochrane reviews? (list titles, year of publication)</td>
<td>Yes (up-to-date review)</td>
</tr>
<tr>
<td></td>
<td>Yes (review that needs updating)</td>
</tr>
<tr>
<td>Are studies available for inclusion in the systematic review (or new studies if there is a review that needs updating)?</td>
<td>Yes (how many?)/No</td>
</tr>
<tr>
<td>List any potential author teams or funding opportunities</td>
<td></td>
</tr>
</tbody>
</table>

Table 1

The CHPSG will be given a list of the topics with the additional information (Table 1). They will be invited to add to the assessments via email and discussion.

The review topics will be ranked by the participants (very high priority, high, medium, low, very low) over email, and then a consensus meeting will take place to identify the top 10 topics which are:

- Of high relevance to a number of stakeholders
- Feasible
1.7 Dissemination

The process and identified 10 high priority topics will be disseminated via:

- Cochrane Heart website
- Email to the participants of the CHPSG
- our monthly newsletter
- Twitter
- Cochrane Priority Reviews List (to seek new author teams and qualify for the Cochrane Review Support Program)
- Relevant stakeholders (patient groups, clinical groups, see 1.3)
- Current Cochrane Group Priority Setting Projects

We will disseminate published reviews through the above channels and in addition, by putting them forward to Cochrane Knowledge Translation.

1.8 Review production

The top ten priorities are likely to consist of some titles for which new reviews are required and some already published reviews that require updating. We will advertise the titles in need of author teams to allow for a transparent and competitive process, with the aim of finding the best author teams to conduct these high priority reviews. We will liaise closely with author teams of already published reviews to ensure the timely delivery of an update. If that is not possible, we will seek new author teams to take over the update of that review.

We will explore funding options to support the timely production of these reviews, e.g. NIHR Incentive Funding and the Cochrane Review Support Programme. We will explore further opportunities should they arise.

1.9 Evaluation

The priority setting process will undergo an evaluation, to understand the strengths and weaknesses of this approach, and the lessons learned for future prioritisation exercises.

We will send participants of the CHPSG a questionnaire with the following questions:

- Did you feel your opinions were listened to during the process?
- Were you happy with the consensus result? If no, why not?
- What improvements would you recommend for next time?
- Would you like to participate in this again? If no, why not?
- Approximately how many hours did you spend on the tasks between meetings? On what?
- Were you happy with the report we disseminated? If not, why not?
- Did you get enough information from Cochrane Heart to support you throughout the process? In not, what would you have like to have received?
- Any other comments?

We will also complete a longer term, analytical evaluation two years after the production of priority reviews has started (part 1 – around April 2023) considering the following:
How many of the reviews were published?
Comparison of metrics of these reviews versus all other reviews published that year, including Altmetrics, citations and number of citations in guidelines.
How many studies were included in the reviews?
How many reviews led to a change in practice? i.e. introduction/recommendation of a new treatment, or disinvestments.

1.10 Timelines

1.10.1 Part 1: coronary artery disease
- October 2019 to March 2020: Invites for CHPSG sent out
- April - July 2020: collection of research topics (1.4)
- September-October 2020: data cleaning (1.5)
- November to December 2020: email consensus process (1.6)
- January 2021: consensus meeting (1.6)
- February to March 2021: write reports and disseminate findings (1.7)
- April 2021: process evaluation (1.9)
- April 2021 onwards: review production (1.8)

1.10.2 Part 2: heart failure
Starting in 2021, the process as for part 1 (1.10.1) will be repeated for the topic of interventions for the prevention and treatment of heart failure with similar timelines, aiming for completion by late 2022.

1.10.3 Review of priority setting plan
During 2023 we will review our current priority setting plan by incorporating the feedback of the CHPSG and the experience of the members of the Steering Group. The aim is to publish an updated plan for the next two years starting in 2024.

2. Assessment of published reviews

2.1 Scope
This part of the prioritisation plan concerns our existing published reviews. Cochrane reviews, as per the guidance document for the Update Classification System (version July 2016) should be updated if the following conditions are met:
- The review question is of current relevance.
- The review had good access/usage/impact.
- There are new relevant studies or there are relevant new methods that are likely to change the findings/conclusions of the review.

We would also accept a review for updating if it’s commissioned by a guideline maker or similar professional body.
2.2 Aims

To prioritise existing reviews for updating.
To assign an update classification status (up-to-date, update pending or no update planned) to each of our published reviews.

2.3 Administration and stakeholder involvement

We are planning to use the same stakeholders as detailed in point 1.3.

2.4 Prioritisation and consensus

Any of the below steps may in addition be informed by the outcome of the prioritisation process outlined in point 1.

2.4.1 Currency of review question

Involving expert opinion via the CHPSG and the authors’ of the published reviews, we will come to a consensus on the currency of the review question.

In addition, one good indicator is whether there are any ongoing studies (as identified by the published review or via a quick search on clinicaltrials.gov). Findings from point 1.4.1 may also provide input here.

2.4.2 Access/impact of published review

We will assess the usage and impact of our published reviews based on metrics like number of citations, downloads, Altmetric, citations in guidelines.

We will trial a points system with the top 50% of reviews based on each of the above metrics getting 1 point and the top 25% getting two points. Based on the points, we will create a ranking. However this can be bypassed if new evidence becomes available (see point 2.4.3).

2.4.3 New relevant studies

If the review question has been identified as still relevant (point 2.4.1) and has ranked as a top priority (point 2.4.2), the authors of the review will be invited to screen the latest search results to see if any new studies meet the inclusion criteria. If there are new studies, the next step is for the authors to assess whether they change the findings/conclusions of the review. If so, the review will need updating.

If the authors of the published review are not available to assess the latest evidence, Cochrane Heart staff will aim to screen the latest evidence or we will aim to find volunteer contributors.

In parallel, we will also set up search alerts for ongoing studies identified by the published review, so that we are immediately aware when they are available.

2.4.4 Consensus

A review is updated as a priority when the review question is relevant, the published version had good usage and new relevant studies are available.
Reviews that have a relevant question and new relevant studies, even with low impact of the existing publication, will be considered for updating if the resources are available (especially referring to the existing authors being available to update the review).

A review gets the status ‘up-to-date’ if the review question is relevant, and either no new studies are available or new studies are available but they don’t change the findings/conclusions of the review.

A review gets the status ‘no update planned’ if the review question is no longer relevant.

For any uncertain decisions, the Steering Group will consult with the CHPSG and, if available, the authors of the review, to come to a consensus.

2.5 Dissemination

We will disseminate this process via our website and monthly newsletter. Decisions on individual reviews will be publicised via the Update Classification System on the Cochrane Library.

2.6 Update production

We will work closely with author teams of existing reviews to produce high priority updates. High priority reviews in need of updating, but for which we need a new author team, will be advertised on our website and disseminated via our newsletter and Twitter.

We will explore funding options to support the timely production of these reviews, e.g. NIHR Incentive Funding and the Cochrane Review Support Programme. We will explore further opportunities should they arise.

2.7 Timelines

We plan to review the status of a published review around two years after publication. If we become aware of new evidence beforehand, we will consider reviewing the update status sooner.

Twice annually we will look at our review portfolio and undergo the steps as outlined in point 2. We currently have a backlog of update decisions and will aim to complete this by the end of 2020.

Acknowledgements

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Contact

Please send any questions or comments about the priority setting exercise to Cochrane.heart@ucl.ac.uk.