# WRITING A REVIEW

## CMSG REVIEW AUTHOR RESOURCE PACK


Cochrane Musculoskeletal Review Group (CMSG)
*Institute of Population Health, University of Ottawa, Canada*
*Cabrini Institute, Melbourne, Australia*

Cochrane Musculoskeletal Group
www.cochranemsk.org

Congratulations, your protocol has been accepted by the Cochrane Musculoskeletal Group and will be published in The Cochrane Library!

Thank you for your hard work and commitment during the protocol development process. Please use RevMan 5 to "check out" the protocol from Archie and work with this file to develop your review.

When your review is ready to be submitted for editorial approval, please run the Validation Report in RevMan (File>Reports>Validation Report) to ensure there are no errors with your RevMan file. When you check the review into Archie, please send an email to the editorial base to let us know you have checked in the review for editorial approval. A completed review checklist should be attached to this email.

In addition to this letter, there are four documents which will ensure that the necessary information and standards will be included in your review:

- The Cochrane Handbook for Systematic Reviews of Interventions
  - Guides you to make the right decisions on the methods used in your review
- The Cochrane Style Guide
  - Ensures all Cochrane protocols, reviews and documents are in Cochrane format
- CMSG Review Checklist
  - Ensures that all criteria of the review have been met
  - Please complete the checklist before you submit your review to the editorial base
- Model of a Peer Reviewer Assessment Form
  - Provided as a model, with the purpose of illustrating what a peer reviewer will be looking for when considering your review

Please do not forget to regularly refer to the *Cochrane Handbook for Systematic Reviews of Interventions* (www.cochrane-handbook.org), and the *Cochrane Style Guide* (www.cochrane.org/style/csg.htm) to ensure the required Cochrane standards are being achieved.

Please feel free to contact us if you have any questions.

Congratulations again on your protocol, and good luck with your review.

Best regards,
**Elizabeth Ghogomu and Renea Johnston,**
**Managing Editors (Ottawa and Australian Editorial Bases)**
On behalf of:
The Cochrane Musculoskeletal Group
Email: cmsg@uottawa.ca and renea.johnston@med.monash.edu.au

# THE COCHRANE HANDBOOK FOR SYSTEMATIC REVIEWS OF INTERVENTIONS

The Cochrane Handbook for Systematic Reviews of Interventions is the official document that describes in detail the process of preparing and maintaining Cochrane systematic reviews on the effects of healthcare interventions. The current version of the Handbook is 5.1.0 (updated March 2011). It is available in various formats:

- Printable PDF version accessible through Archie
- Browsable version online
- Browsable version from the help menu in RevMan 5

It is divided into three parts and contains 21 chapters in total:

- Part 1, relevant to all reviews, introduces Cochrane reviews, covering their planning and preparation, and their maintenance and updating, and ends with a guide to the contents of a Cochrane review or protocol.

- Part 2, relevant to all reviews, provides guidance on preparing reviews, covering eligibility criteria, searching, collecting data, within-study bias, analyzing data, reporting bias, presenting and interpreting results.

- Part 3, relevant to some reviews only, addresses special topics, including particular considerations in addressing adverse effects, meta-analysis with non-standard study designs and using individual participant data. This part has *new* chapters on incorporating economic evaluations, non-randomized studies, qualitative research, patient-reported outcomes in reviews, and reviews in health promotion and public health. A final chapter describes the new review type of Overviews of reviews.

To access the *Handbook* online please visit:
http://www.cochrane-handbook.org/

If you have any questions about the *Handbook*, please feel free to email cmsg@uottawa.ca or renea.johnston@med.monash.edu.au

# COCHRANE STYLE GUIDE

As well as using the Cochrane Style Guide, remember to think about the **reader** when writing your Cochrane protocol, review, or document. You can help the reader by:

(1) Writing in the active (not the passive) voice, for example "we extracted data" (not "the data were extracted");

(2) Using short sharp sentences (get to the point quickly);

(3) Letting someone else read your review (they may give you tips on how to make it easier to read or tell you if it doesn't make sense);

(4) Using plain English (you don't have to use complicated language to talk about science);

(5) Writing protocols in the future tense ("we will search") and reviews in the past tense ("we searched"); and

(6) Being consistent in your choice of punctuation and spelling.

**Need more Cochrane style guidance??**
**Please download the free "Cochrane Style Guide" at**
www.cochrane.org/style/csg.htm

**Also available from the help menu in Review Manager 5**

# REVIEW CHECKLIST

Please do not send us any reviews until you have checked them against this checklist! Please ask the editorial base for a Word version.

The completed checklist should be emailed to the editorial base when you send an email to let us know you have checked in the review for editorial approval.

Please run the Validation Report button in RevMan (File>Reports>Validation Report) to ensure there are no errors with your RevMan file.

**Title of review:**

**General:**

- ☐ Have you completed the risk of bias tables?
- ☐ Have you completed summary of findings tables?
- ☐ Have you included a PRISMA flow diagram?
- ☐ Have you proof-read the review?
- ☐ Have you given the review to someone else to proof-read, preferably someone not an expert in the field?
- ☐ Have you run a spell-check? (included in RevMan)
- ☐ Is the structure logical and easy to follow?
- ☐ Is the style such that the review is comprehensible for the non-expert?
- ☐ Have you explained technical terms?
- ☐ Have you avoided abbreviations?
- ☐ Have you referenced any appropriate Cochrane reviews that relate to this topic?
- ☐ Have you avoided clinical jargon?
- ☐ Have you added references to substantiate statements?
- ☐ Have you called people 'participants', 'people with...' or 'women', rather than 'patients'?
- ☐ Have you changed all the text in future tense in your protocol to past tense?
- ☐ Check your review against your protocol: have you done all you set out to do and have you explained how you achieved that? If you have not done all you set out to do, or added additional methodology, have you explained why?
- ☐ Have you listed the contributions of all co-reviewers in the Reviewers section of RevMan?
- ☐ Have you declared all potential conflicts of interest or stated "None known" if there were none?
- ☐ Have you checked the Cochrane Style Guide (www.cochrane.org/style/csg.htm) to make sure the review meets these guidelines?

**Acknowledgements:**

- ☐ Have you included the reason(s) for acknowledging people?

**Search strategy:**

- ☐ If your protocol stated that you would search reference lists of textbooks and reviews, that you would hand search journals and/or conference proceedings, and that you would contact experts and manufacturers, make sure that you outline *exactly* what you really did
- ☐ Have you stated the dates for the electronic databases you searched (eg. EMBASE 1980 to June 2001)?

**Methods:**

- ☐ Have trials selection, assessment of risk of bias in included studies, and data extraction all been done in duplicate?
- ☐ Have you given details about how you performed trial selection, assessment of risk of bias in included studies, and data extraction?
- ☐ Have you detailed the meta analyses, sensitivity analyses, subgroup analyses and investigations of heterogeneity that you performed?

☐ Have you reported which trialists you contacted about missing data and what response you got?

**Description of studies:**

☐ Have you included a brief section on 'excluded studies' with a brief summary of reasons for exclusion?
☐ Have you considered all the criteria mentioned in the 'inclusion criteria' section of your protocol?
☐ Have you listed study designs?
☐ Have you listed participant characteristics, such as age, sex, co-morbidity and other relevant variables, similarity between comparison groups, representativeness?
☐ Have you discussed interventions and comparison treatments, including route of administration, dose, timing, duration of treatment, concomitant treatments?
☐ Have you discussed the outcomes that were assessed and the timing of the outcome measurement?
☐ Have you discussed the outcome measures that were not assessed but that you think should have been assessed?
☐ Have you given the citations for the studies you are referring to?
☐ Have you made sure that no actual results (i.e. treatment effects) are included in this section?

**Assessment of risk of bias in included studies:**

☐ Have you discussed all the items listed in the 'assessment of risk of bias in included studies' part of your methods section, in the same order?

**Results:**

☐ Have you checked that the order in which you talk about different comparisons and outcomes coincides with that in previous sections?
☐ Have you presented the sensitivity analyses you said you would do (if applicable)?
☐ Have you presented the subgroup analyses you said you would do (if applicable)?
☐ Have you presented the analyses of heterogeneity you said you would do (if applicable)?
☐ Have you explained to the reader in easily comprehensible terms what any treatment effect means?
☐ Have you made sure that this section contains no interpretation of results?
☐ Have you double checked any unusual or unexpected results to ensure data was correctly extracted and entered into RevMan?
☐ Have you created summary of findings tables for your review (if applicable)?

**Discussion:**

☐ Have you distinguished between statistical and clinical significance?
☐ Have you discussed applicability of results?

**Implications for practice:**

☐ Have you made sure that you do not give advice but just summarise the evidence?

**Implications for research:**

☐ If you conclude that further research is required, have you included a mini research proposal (e.g. Suggest criteria that a good trial should fulfill, and providing a power calculation)?

**References/Citations:**

☐ Are reference IDs in the correct format? (e.g. Smith 1983; UKPDS 1990)
☐ Do all the citations in the text appear as links?
☐ Are the citations separated by semicolons?
☐ Are the citations in: 1. Alphabetical or 2. Chronological order?
☐ Have you used 'et al' in a reference only for more than six authors?
☐ Are both English and foreign titles given for foreign publications?
☐ Are all the journal names written out?
☐ Have you double-checked the format of the references by selecting 'view citation'?
☐ Have you checked whether some of the citations identified are duplicate publications of the same trial?
☐ Have you checked that all the references you are citing are the primary references for the issue you refer to?
☐ Have you listed publications referring to the same trial under a single study ID?
☐ Are published versions of the review listed?

# COCHRANE MUSCULOSKELETAL REVIEW GROUP
## Peer Reviewer Assessment of a Review

**Title of review:**

**Date sent to editors and external peer reviewers:**

**Latest date to be returned to the editorial base:**

**Name of editor / external peer reviewer:**

**Please indicate any conflict of interest that would interfere with your ability to fairly critique the review:**

**Do you wish your comments to remain anonymous?**

In the light of the comments you have made following, please give an overall opinion of the review (copy the * symbol and paste it next to the appropriate statement):

(i) Acceptable for publication in its present form

(ii) Acceptable for publication with minor revisions

(iii) Acceptable for publication with substantial revisions

| **1. Major comments** |
|---|
| (Begin writing here and the box will expand automatically as you write) |
| *Author response:* |
| **2. Minor comments** |
| (Begin writing here and the box will expand automatically as you write) |
| *Author response:* |

# Plain Language Summary (PLS) Guide for Authors

## Contents

# 1. About Cochrane Plain Language Summaries (PLS)

## Who is this guide for?

This guide is meant for authors wishing to write a Plain Language Summary (PLS) of their Cochrane review, and who have developed a Summary of Findings table (SoF) for their review.

## What is a Cochrane PLS?

According to the *Cochrane Handbook*, Chapter 3.2, a "plain language summary" of a systematic review should be included in all Cochrane systematic reviews. It "aims to summarize the review in an easily understood style which would be understandable by consumers of healthcare."

## What are the core guiding principles for Cochrane PLSs?

1. The Cochrane PLS is short, consistently structured, and can be read in 4-5 minutes maximum.
2. The language should be friendly, clear, and concise. Reading level should be similar to "Reader's Digest" or similar popular magazine.
3. The Cochrane PLS is related to clinical outcomes, based on the summary of findings tables and/or forest plots where they exist.
4. The Cochrane PLS concentrates on the results, and our confidence in these, not the methods.
5. The PLS does not make recommendations.

## Where are they published?

To reach a large audience, these summaries are freely available on the Website of the Cochrane Collaboration at http://www.cochrane.org/reviews.

They are also translated (when needed) and sent to local patient groups for distribution and for publication on their websites.

## Who is the target audience?

Consumers, including patients and their families.

## Who will prepare the Cochrane PLS?

Authors will prepare the PLS and they will be peer reviewed and edited with the rest of the review.

## How will you ensure consistency of style across the Cochrane PLS?

We have prepared a Cochrane PLS template. This includes the fixed headings and provides guidance on content, style, and word count.

# 3. Cochrane PLS format

## Format

Use the Cochrane PLS table to guide you and use the headings, to ensure consistency.

## Length

Each Cochrane PLS must be roughly 400 words.

## Images

For now, images and tables are not supported in the PLS.

## Writing style

- Use the same terms consistently throughout the text (e.g. for outcomes, intervention, condition, etc.)
- When the medical term is difficult, consider using the lay term with the medical term in parentheses the first time it is used.
- Use generic drug names (recommended International Non-proprietary Name (rINN)) as standard, but trade names can be included in brackets if used internationally.
- For the term placebo, consider using “fake medication” or provide a definition such as: A placebo is an inactive, fake, "dummy" medication or treatment designed to resemble a drug or treatment and given in the same way.
- Use terms that the target audience is likely to understand (e.g. go to consumer organisation web sites to see terms used)
- Refer to the population as ‘people’, ‘women’, ‘men’, or ‘children’ rather than ‘participants’, ‘consumers’, ‘subjects’, ‘patients’.
- Use short sentences.
- Ask a non-medical person to read through and comment.

## Content and examples

| | |
|---|---|
| **Title** | The plain language title is the same as the review title unless the terms are not easily understandable. The plain language title should not be declarative (it should not reflect the conclusions of the review). It should be written in sentence case (i.e. with a capital at the beginning of the title and for names, but the remainder in lower case), it should not be more than 256 characters in length, and should not end with a period. |
| *Example* | “Abatacept for rheumatoid arthritis”<br><br>Surgery for thumb (trapeziometacarpal joint) osteoarthritis’ might have a plain language title ‘Surgery for osteoarthritis of the thumb’**.** |
| **Introduction** | Standard text is used to introduce the PLS: This summary of a Cochrane review presents what we know from research about the effect of [intervention] for [condition]. The review shows that: |

| | |
|---|---|
| *Example* | This summary of a Cochrane review presents what we know from research about the effect of abatacept for rheumatoid arthritis. The review shows that: |
| **Bullet points of key messages section** | For wording of the individual bullets please see **Appendix A** at the end of this guide<br><br>In [population], at [measurement time point], [intervention] compared to [control]:<br><br>• Xx<br>• Xx<br>• Xx<br>• xx<br><br>We often do not have precise information about side effects and complications. This is particularly true for rare but serious side effects. Possible side effects may include [add specific harms discussed in the review]. Rare complications may include [add specific harm]. |
| *Example* | In people with rheumatoid arthritis,<br>• Abatacept probably improves pain, function and other symptoms of rheumatoid arthritis. Abatacept probably reduces disease activity.<br>• Abatacept probably reduces joint damage as seen on the x-ray.<br><br>We often do not have precise information about side effects and complications. This is particularly true for rare but serious side effects. Possible side effects may include a serious infection or upper respiratory infection. Rare complications may include certain types of cancer. |
| **Background Section** | What is [condition] and what is [intervention]?<br><br>Give brief description of:<br>• population/health problem<br>• intervention - provide enough information for readers to judge whether the intervention is comparable to those available to them<br>• the control intervention if necessary<br>• why this review is important (e.g. controversies or doubt) |
| *Example* | What is rheumatoid arthritis and what is abatacept?<br>When you have rheumatoid arthritis, your immune system, which normally fights infection, attacks the lining of your joints. This makes your joints swollen, stiff and painful. The small joints of your hands and feet are usually affected first. There is no cure for rheumatoid arthritis at present, so the treatments aim to relieve pain and stiffness and improve your ability to move.<br>Abatacept is one of a group of medications called selective costimulation modulators (immunomodulators). It works by blocking the activity of T-cells, a type of immune cell in the body that causes swelling and joint damage in people who have rheumatoid arthritis. Although expensive, if supported by the overall body of evidence, the claims of their benefit upon both symptoms and radiographic progression, and their low rate of short term side effects make them of great interest to patients with RA. |
| **Best Estimate Section** | This section includes the results of the review based on the Summary of Findings table<br>• Include all outcomes from your SoF table in this table, including outcomes with no data, and outcomes related to side effects and complications.<br>• Provide absolute event rates so the reader has a basis for comparison<br>• Include information about the scale used in the study |

| | |
|---|---|
| | • Do not include non-significant results. These results can be listed in the bullet points of key messages section<br>• If necessary, Include additional information about population or intervention/control here. For example, specific dosages, duration of treatment.<br><br>Best estimate of what happens to people with [control] or with [intervention] |
| *Example* | Best estimate of what happens to people with rheumatoid arthritis who take abatacept:<br>X-rays of the joints<br>-There was no damage to joints of people who took abatacept after 12 months.<br>-The damage to joints of people who took a placebo was 0.27 units on a scale of 0 to 145 units.<br><br>Pain (higher scores mean worse or more severe pain)<br>- People who took abatacept rated their pain to be 12 points lower on a scale of 0 to 100 after 12 months with abatacept (12% absolute improvement).<br>-People who took abatacept rated their pain to be 37 on a scale of 0 to 100 after 12 months.<br>-People who took a placebo rated their pain to be 49 on a scale of 0 to 100.<br><br>ACR 50 (number of tender or swollen joints and other outcomes such as pain and disability)<br>-20 more people out of 100 experienced improvement in the symptoms of their rheumatoid arthritis after 12 months with abatacept (20% absolute improvement).<br>-37 people out of 100 experienced improvement in the symptoms of their rheumatoid arthritis.<br>-17 people out of 100 who took a placebo experienced improvement.<br>Physical Function<br>-25 more people out of 100 had better physical function after 12 months with abatacept (25% absolute improvement).<br>-64 people out of 100 had better physical function.<br>-39 people out of 100 who took a placebo had better physical function.<br>Disease activity<br>-32 more people out of 100 were considered to have low disease activity of their rheumatoid arthritis after 12 months with abatacept (32% absolute improvement).<br>-42 people out of 100 were considered to have low disease activity of their rheumatoid arthritis.<br>-10 people out of 100 who took a placebo were considered to have low disease activity of their rheumatoid arthritis. |
| **Source note** | This is a Cochrane review abstract and plain language summary, prepared and maintained by The Cochrane Collaboration, currently published in The Cochrane Database of Systematic Reviews [Issue and date] © [year] The Cochrane Collaboration. Published by John Wiley and Sons, Ltd.. The full text of the review is available in The Cochrane Library (ISSN 1464-780X).<br><br>This record should be cited as: [citation] |
| *Example* | This is a Cochrane review abstract and plain language summary, prepared and maintained by The Cochrane Collaboration, currently published in The Cochrane Database of Systematic Reviews 2010 Issue 7, Copyright © 2010 The Cochrane Collaboration. Published by John Wiley and Sons, Ltd. The full text of the review is available in The Cochrane Library (ISSN 1464-780X).<br><br>This record should be cited as: Maxwell L, Singh JA. Abatacept for rheumatoid arthritis. Cochrane Database of Systematic Reviews 2009, Issue 4. Art. No.: CD007277. DOI: 10.1002/14651858.CD007277.pub2 |

# 4. Sample Cochrane PLS

**Abatacept for rheumatoid arthritis**

This summary of a Cochrane review presents what we know from research about the effect of abatacept on rheumatoid arthritis:

**The review shows that in people with rheumatoid arthritis:**

- Abatacept probably reduces joint damage as seen on the x-ray.
- Abatacept probably improves pain, function and other symptoms of rheumatoid arthritis.
- Abatacept probably reduces disease activity.

We do not have precise information about side effects and complications. This is particularly true for rare but serious side effects. Possible side effects may include a serious infection or upper respiratory infection. Rare complications may include certain types of cancer.

**What is rheumatoid arthritis and what is abatacept?**

When you have rheumatoid arthritis, your immune system, which normally fights infection, attacks the lining of your joints. This makes your joints swollen, stiff and painful. The small joints of your hands and feet are usually affected first. There is no cure for rheumatoid arthritis at present, so the treatments aim to relieve pain and stiffness and improve your ability to move.

Abatacept is one of a group of medications called selective costimulation modulators (immunomodulators). It works by blocking the activity of T-cells, a type of immune cell in the body that causes swelling and joint damage in people who have rheumatoid arthritis. Although expensive, if supported by the overall body of evidence, the claims of their benefit upon both symptoms and radiographic progression, and their low rate of short term side effects make them of great interest to patients with RA.

**Best estimate of what happens to people with rheumatoid arthritis who take abatacept:**

X-rays of the joints

-There was no damage to joints of people who took abatacept after 12 months.
-The damage to joints of people who took a placebo was 0.27 units on a scale of 0 to 145 units.

Pain (higher scores mean worse or more severe pain)
- People who took abatacept rated their pain to be 12 points lower on a scale of 0 to 100 after 12 months with abatacept (12% absolute improvement).
-People who took abatacept rated their pain to be 37 on a scale of 0 to 100 after 12 months.
-People who took a placebo rated their pain to be 49 on a scale of 0 to 100.

ACR 50 (number of tender or swollen joints and other outcomes such as pain and disability)
-20 more people out of 100 experienced improvement in the symptoms of their rheumatoid arthritis after 12 months with abatacept (20% absolute improvement).

-37 people out of 100 experienced improvement in the symptoms of their rheumatoid arthritis.
-17 people out of 100 who took a placebo experienced improvement.

Physical Function
-25 more people out of 100 had better physical function after 12 months with abatacept (25% absolute improvement).
-64 people out of 100 had better physical function.
-39 people out of 100 who took a placebo had better physical function.

Disease activity
-32 more people out of 100 were considered to have low disease activity of their rheumatoid arthritis after 12 months with abatacept (32% absolute improvement).
-42 people out of 100 were considered to have low disease activity of their rheumatoid arthritis.
-10 people out of 100 who took a placebo were considered to have low disease activity of their rheumatoid arthritis.



This record should be cited as: Maxwell L, Singh JA. Abatacept for rheumatoid arthritis. Cochrane Database of Systematic Reviews 2009, Issue 4. Art. No.: CD007277. DOI: 10.1002/14651858.CD007277.pub2

## 5. Appendix A: Wording for bullet points of key messages

Use the grid below to determine the qualitative statements in the following statements when determining the Bullet points of key messages about the conclusions of the review.

| | **Important benefit or harm** | **Less important benefit or harm** | **No important benefit or harm or null effect** |
|---|---|---|---|
| **High Quality evidence** | will improve | will improve slightly | will not improve |
| **Moderate quality evidence** | probably improves | probably improves slightly | probably will not improve |
| **Low quality evidence** | may improve | may improve slightly | may not improve |
| **Very low quality evidence** | We are uncertain whether [intervention] affects [outcome] because of the very low quality of the evidence. | | |
| **Not measured/ not reported/ no events or rare events** | Not measured or not reported or no ‘events/outcomes’ occurred | | |
| **No studies** | No studies were found that looked at [outcome] | | |