



Thesis FAQ: Standard vs Manuscript-based Theses

1) What is the purpose of a thesis?

A Master's or PhD thesis is a unique document with a single purpose: to convince the examiners that the candidate meets the academic requirements to be awarded their degree.

2) What are the components of a thesis?

A thesis is presented in a series of chapters, each presenting a logical part of the whole as described at <https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>. Whether a student produces a traditional or a manuscript-based thesis, a narrative should weave the thesis sections together into one cohesive story. The Introduction sets the scene for the thesis as a whole. The Literature Review provides background knowledge (and its interpretation) that sets the foundation for the work carried out by the student. Individual chapters present the work a student has done. Each chapter should stand alone but also clearly present parts of an overarching story. The Discussion should be used to emphasize how the different components of the entire thesis fit together into a single body of work. This is also where the impact of the work should be highlighted, specifically referring to Original Contributions for PhD students.

3) What can be included in a thesis?

Any work carried out by a student while acting as a registered student can be used in their thesis without restriction, unless arranged otherwise at the outset. If intellectual property must be protected, this should be through a signed agreement at the beginning of the research as overseen by the Office of Innovation and Partnerships.

Students writing a manuscript-based thesis can include a manuscript that is published, submitted or to be submitted for publication. They must be first author or co-first author of the manuscript. In the case of co-first authored articles, only **one** student can use the article in a manuscript-based thesis and must have a written agreement from the other co-first author student(s).

4) What is a standard (traditional) thesis?

The format of a thesis is described in detail on the GPS website here: <https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>.

A standard format thesis is a single authored public document that presents the work carried out by the student, a body of background information, analysis and interpretation that together

aims to demonstrate that the student meets the requirements for the degree set out here: <https://www.mcgill.ca/gps/thesis/thesis-guidelines/general-requirements>.

5) What is a manuscript-based thesis?

A manuscript-based thesis involves the presentation of a collection of scholarly papers of which the student is the first author or co-first author. A manuscript-based doctoral thesis must include the text of a minimum of two manuscripts published, submitted or to be submitted for publication. A manuscript-based Master's thesis must include the text of one or more manuscripts. A manuscript-based thesis will be evaluated by the examiners as a unified, logically coherent document in the same way a traditional thesis is evaluated.

A manuscript-based thesis must:

- be presented with uniform font size, line spacing, and margin sizes listed under [Thesis Format](#) on the GPS website (last section on the page);
- conform to all requirements listed under [Thesis Components](#) on the GPS website;
- contain additional text that connects the manuscript(s) in a logical progression from one chapter to the next, producing a cohesive, unitary focus, and documenting a single program of research - the manuscript(s) alone do not constitute the thesis;
- stand as an integrated whole.

6) According to the thesis guidelines, even a manuscript-based thesis needs to have a general introduction and conclusion. Could you clarify whether these sections are necessary and what type of information is appropriate for these sections?

Yes, a manuscript-based thesis must follow the general structure of a thesis as explained here: <https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>. This includes an introduction, a general discussion emphasizing how the different components fit together into a single body of work, and a conclusion.

Generally speaking, a thesis and a manuscript have very different purposes. The purpose of a thesis is to convince the examiners that the candidate meets the academic requirements to be awarded their degree.

A Master's and a PhD degree are awarded based on the student's abilities, not to a body of work. The thesis is their opportunity to demonstrate to the examiners that they have those abilities. These include presenting a body of work focused around a single theme where the student shows that they are aware of the relevant background to the work, that they can carry out a series of experiments towards a common goal, that they can analyze the results and develop a coherent narrative of the larger theme, that they can present the work clearly and can understand its implications in the larger field of their discipline. In addition, a PhD thesis must demonstrate the student has made an original contribution. The thesis guidelines are based on these requirements and aim at giving students the best chance to receive a pass and graduate.

A manuscript has a very different purpose, i.e. to present a single, self-contained, coherent story of a single experimental idea. In doing so it specifically hides the contribution of any single author. This leaves a problem in the manuscript-based thesis for which the evaluation becomes difficult. Therefore, this format often does not prove to be the best choice for a student.

A manuscript-based thesis must include a general introduction to make sure the examiners can assess that the student knows how the work forms one coherent idea. This section is used to explain the bigger picture covered by the different manuscripts and how each fit within that bigger picture to produce something more than is contained within each manuscript separately.

There must be a general literature review to show that the student understands the background to the work they carried out and how it fits within their field.

The student must include a Contribution of Authors section that is more expansive in a manuscript-based thesis. This is much more than a simple list of who did what. This is the section where the student must explain how they contributed to the work and which parts of the manuscript refer to the work they did, so the examiner can evaluate it, and which parts they did not do, so the examiner can ignore it. The examiners must do this since the student cannot be given credit for work done by others. This can sometimes annoy examiners since it can take time to figure out which parts of the manuscripts to exclude.

The thesis must include bridging statements between the manuscripts to show how the manuscripts relate to each other and how they fit within the bigger picture. Simply saying “in manuscript 1 I did this, in manuscript 2 I did that”, is not sufficient.

Since each manuscript is self-contained, they have their own Introduction, Background, Discussion and Bibliography. These often end up being repetitive with these sections of the entire thesis. However, since the manuscripts are self-contained, and only part of the bigger story, the thesis needs an overall Discussion section where the student expands on the ideas presented in the manuscripts and shows how they contribute to the overall hypotheses for the thesis and what the implications are for the larger body of work.

If the student produces a standard (traditional) thesis, most of these issues disappear since the entire thesis is presented as one story and all the content is assumed to be their work, unless they specifically say otherwise.

7) What are important considerations if I choose to write a manuscript-based thesis?

- If you are planning to prepare a thesis, the Standard format should be your starting point. You should only use manuscript-based format if you meet all the requirements.
- Students interested in writing a manuscript-based thesis should also consider whether their original contributions are/would be evident in the manuscripts that they include.

The purpose of a thesis and of published manuscripts is very different. In the case of a PhD, demonstration of an original contribution is a requirement for obtaining the degree. The goal of a multi-authored manuscript is to bring the work of many authors into a single, cohesive story. As such, a manuscript may specifically obscure the original contribution of any single author.

The manuscript format therefore makes it specifically difficult for the Examiners to identify how you meet one of the main requirements for the degree.

In a manuscript-based PhD thesis, it is essential that you convince the Examiners that you have made an original contribution. The place to do this is in the Contribution of Authors statement. This statement should not be a simple list of who did what, but should include the thinking process that led to decisions you made to show your original thinking.

Priority of authorship reflects the contribution individuals have made. First authorship typically indicates that a majority of the work was done by that person. If there are co-first authors, this indicates they contributed equally to the work. If there are also other authors, this indicates that each of the co-first authors did less than 50% of the work. If you plan to include a manuscript in your thesis where you are co-first author, you are including more work by other people than you did yourself. Dedicating this space to work that you cannot be evaluated for reduces your opportunity to convince the examiners that you have made an original contribution. It also means the examiners have to read significant amounts of text that are not relevant for evaluating the quality of your contribution.

- Students should consider whether their research and/or written text are appropriate for the manuscript format.

The manuscript format should only be used if you meet all the requirements for this format. If you start asking yourself “how can I rearrange my text so it fits in the manuscript format” you should almost certainly be writing a standard format thesis.

8) What is the difference between a standard (traditional) and a manuscript-based thesis?

The traditional (or standard) thesis is written in monograph style. To meet the criteria for a manuscript-based thesis, the body of the thesis should be manuscripts, culminating in a Discussion chapter that ties the work together. If this is not the case, the thesis must be standard format. The two styles (standard and manuscript) cannot be mixed within a thesis.

9) Should I write a traditional or a manuscript-based thesis?

A thesis can be written and organized either in the traditional monograph style (standard format) or the manuscript (article) based style. It cannot be a mixture of the two. In both cases, theses must conform to the requirements of Library and Archives Canada. These requirements are listed at <https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>.

There is no requirement to have any publications for a Master’s or PhD thesis. In the standard format thesis, you simply describe what you did. The manuscript format should only be used if you meet [ALL the criteria listed on this website](#). These include the requirement that you may not use any manuscript where you are not first, or co-first author. **If you are co-first author, you also need to provide a written agreement signed by the other author that the manuscript will not be used in a manuscript-based thesis by them and that they agree to you using it in yours.**

If you would like to include additional information in a manuscript-based thesis, you should use the standard format instead. If you are wondering “how can I do this” with a manuscript-based thesis, you should use the standard format instead.

Manuscripts for publication in journals are frequently very concise documents. A thesis, however, is expected to consist of more detailed, scholarly work. A manuscript-based thesis will be evaluated by the examiners as a unified, logically coherent document in the same way a traditional thesis is evaluated. Publication of manuscripts, or acceptance for publication by a peer-reviewed journal, does not guarantee that the thesis will be found acceptable for the degree sought.

10) If I have published papers, should I write a manuscript-based thesis?

Just because you have published/submitted papers does not necessarily mean you should write a manuscript-based thesis. You can refer to those papers in a standard format thesis and choose to include only the work you yourself did for a co-authored paper, whereas you would have to include the complete, unmodified article in a manuscript-based thesis and then specify which part of the work was yours. **You would also need approval from any co-first author** to use the manuscript in your thesis and a statement from them saying that they will not use it in their own manuscript-based thesis. However, your co-authors can still use their own results included in the manuscript if they write a standard (traditional) thesis.

If you choose to write a manuscript-based thesis, all manuscripts must be included as submitted/published and cannot be blended into other parts of the thesis. The only changes that can be made are in formatting style. If you submit a thesis in the standard format, you can rewrite the text any way you feel is most appropriate (e.g. standardizing terminology to ensure consistency across the entire thesis).

In a standard (traditional) thesis, you can include all the work you have done during your degree, without reservation, even if it has been published in a multi-authored article. You must cite work done by others as you would for any journal article that you cite. You should also cite yourself, to make sure the reader knows the published article exists. If you include text and/or figures from the published article, make sure that it is clear to the reader that you have done this, where it came from, and who contributed to the writing/editing/producing of those figures.

11) I started off writing a manuscript-based thesis. Can I switch to a standard thesis instead?

Yes. As you advance in your writing, you may come to a realization that a standard thesis would be better after all, and it is perfectly fine to switch to it as long as you don't mix the two styles within a single thesis. At submission, your thesis must conform to either standard or manuscript-based thesis, not a mixture of the two.

If your manuscripts require too much editing to conform to the requirements of a publisher, it may be preferable to use the original version as the basis of a standard thesis instead. A

standard thesis will allow you to show more of your own work than a manuscript-based thesis. It will also help avoid the redundancies that are inevitable with a manuscript-based thesis.

12) Can I include previously published work in a standard thesis?

A thesis presents work that a student has done. As a single authored document, there is an implicit assumption that anything contained in the thesis was done by the student. Any work or ideas originating from others can certainly be included but should be clearly identified as such to avoid any suggestion that the student is taking credit.

Students often publish at least part of the research included in a thesis before submission of their thesis. The ownership of published work rests with the copyright holder. In many cases, Journals are assigned copyright by the author during the manuscript publication process. Since you then no longer own that work, you need the Journal's permission to republish. This is such a common and well understood practice that obtaining such permission from the Journal is routine.

Copying text or ideas that you have written in previously published work, such as journal articles, Wikipedia pages, books, multimedia presentations etc. is perfectly ok but you must make it very clear that they are copied and where they came from and in what circumstances. Failure to do so implies the content is original and developed specifically for the thesis.

13) Can I include manuscripts that have not yet been published in my manuscript-based thesis?

Yes. The manuscripts included in a manuscript-based thesis can be either published, submitted or to be submitted for publication.

Note that if you choose to submit a manuscript-based thesis, the sections must be presented as complete, unedited manuscripts. There is no requirement that they have, or will ever be, published – but they must meet the formatting requirements for a manuscript.

14) What is the minimum number of manuscripts required for a manuscript-based thesis?

A manuscript-based Master's thesis must include the text of at least one manuscript. A manuscript-based Doctoral thesis must include the text of at least two manuscripts.

15) Can the department reject a manuscript-based thesis and tell the student to rewrite it as a standard (traditional) thesis if the manuscript(s) used for the thesis were not accepted for publication?

No. According to GPS guidelines, the manuscript(s) included in a manuscript-based thesis must be either published, submitted or ready to be submitted for publication.

16) Can the department reject a standard thesis if none of the components have been published?

No. A thesis must meet the [General Requirements for Master's and Doctoral Theses](#) and include all [Thesis Components](#) but there is no requirement to have any publications for a thesis. A Master's or PhD thesis is a unique document with a single purpose: to convince the examiners that the candidate meets the academic requirements to be awarded their degree. Publication is not a requirement for graduation.

17) Can I make changes to the manuscripts included in my thesis?

Any manuscripts that are under review, accepted or published in a journal must be included in your initial thesis without changes (i.e. identical to the published or submitted versions, except for font and some formatting changes, as explained here:

<https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>).

Depending on the feedback of your examiners and/or the oral defence committee, you may be required to make revisions to your thesis before final submission. The committee's comments must be addressed in the connecting text between chapters and/or the discussion section. You must not make any changes to the manuscripts themselves in your final thesis.

18) I found typos in the published manuscript which is included as part of my thesis. Can I correct the typos before inserting the manuscript in my thesis?

You must leave the typos in the manuscript when you initially submit your thesis. As per the thesis preparation guidelines (<https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>), you can only change the formatting (e.g. font size, line spacing) for the sake of consistency. Typos can be corrected for the final thesis submission.

19) Am I allowed to include a manuscript where I am not first author?

No. You can only include a manuscript where you are either first author or co-first author.

You must also explain clearly what part of the manuscript is your own work and what is not. This includes writing the text, editing, figures, data generation etc. Only the work you did will be evaluated for the degree.

If you are listed second, but with a note to say you are co-first author, you can include the manuscript. However, in the case of co-first authored articles, only **one** student can use the article in a manuscript-based thesis and must have written permission from the other co-first author student(s). The other co-first authors can still use their own contribution from the published article in their standard format thesis. In this case, the text in their thesis must be distinct from that of the publication.

Note that you can present any work you have done in a standard format thesis. If you only contributed a small amount and appear as fourth author for example, you can describe the part that you did in a standard thesis and cite the manuscript for all the things you did not do. If you use the manuscript format, you cannot include a fourth authored manuscript.

20) I have co-first authored a manuscript with my fellow student. Can we both use the manuscript in our respective thesis, if one of us writes a manuscript-based thesis and the other one writes a standard thesis?

Yes. A co-first authored manuscript can be used in only one manuscript-based thesis. When the co-first authored manuscript is included in a manuscript-based thesis, written permission must always be obtained from the other co-first author(s).

21) How should I present the Contribution of Authors for a manuscript-based thesis?

A thesis presents work that a student has done. As a single authored document, there is an implicit assumption that everything contained in the thesis was done by the student. Manuscripts specifically hide this information. This means that it is not possible for the examiners to see your contribution in the manuscript, and to determine as well the contribution of all the other authors. For a PhD thesis, you must also convince the examiners that you have made an original contribution. You must clearly spell out your contribution, and your thinking process, to demonstrate that you have made an original intellectual contribution separate from any other authors on the manuscripts. You need to do this for all manuscripts where you are a co-author.

22) How should the bibliography be presented for a manuscript-based thesis where each article includes its own reference list?

For a manuscript-based thesis, each individual chapter (manuscript) should be identical to the published/submitted version of the paper, including the reference list. In other words, each chapter represents a full manuscript and has its own reference list in the manuscript's style. At the end of the thesis, you must include a master reference list which includes all the other references cited throughout the other sections of the thesis, mostly within the general introduction but also the general discussion.

23) Do I need special permission from the journal to include the figures from the manuscript in my thesis?

Typically, permission to use a figure is required from the journal in order to use it in a thesis. Many journals have an online form to request permission, and some explicitly state that as an author you are authorized to reuse the paper in your thesis. This permission typically says that

the figure must be reproduced without modification, which is already a requirement for a manuscript-based thesis.

24) If the manuscripts included in my manuscript-based thesis are in English, can I write the other parts of the thesis (introduction, general discussion, conclusion) in French?

Any manuscript-based thesis must include the manuscripts as is, in the original language, with only formatting changes to make the presentation style the same throughout the thesis. As per the thesis regulations, theses can be written in English or in French so your thesis does not have to be exclusively in English or French throughout. In such a case, however, you will need to secure an examiner who is fluently bilingual.

25) My manuscript-based thesis was not passed by one of the examiners. Their comments include required revisions to a chapter that is in fact a published paper. The thesis guidelines state that manuscripts included in the thesis should be identical to the published/submitted version. How can I revise and resubmit my thesis to take into account the examiner's comments?

Any manuscripts that are under review, accepted or published in a journal must be included in your thesis without changes (i.e. identical to the published or submitted versions, except for font and some formatting changes, as explained here: <https://www.mcgill.ca/gps/thesis/thesis-guidelines/preparation>). The examiner's comments must be addressed in the connecting text between chapters and/or the discussion section. You must not make any changes to the manuscripts themselves in your thesis.

26) I would like to submit a PhD thesis that is neither a traditional (standard) format nor a manuscript-based thesis. Is this possible?

No.