

Guidelines on Thesis by Publication at Victoria University

From 2011 the Victoria University Policy for Higher Degrees by Research formally recognizes three broad thesis formats for the Doctor of Philosophy degree (HDR Policy Schedule E, E2):

- 1) **Standard Thesis** - in this format the thesis is presented as a single monograph that contains a series of interlinked chapters reporting on the research.
- 2) **Thesis by Creative Project** – in this format the thesis is presented as creative work (Creative Component) and an accompanying critical reflective written work (Analytical Written Component).
- 3) **Thesis by Publication** – in this format the thesis is presented as a number of high quality *Papers* together with framing, linking and concluding material.

The term *Paper* refers to a report of research presented in the format of a journal article, book chapter, published conference paper or any other form of written scholarly work prepared for publication (such as all or part of a book manuscript or technical report) which can be demonstrated to either have been subject to a process of academic peer review similar to that of ranked refereed journals or to be at a standard as certified by the supervisor equivalent to that suitable for presentation for such academic peer review.

The 'Thesis by Publication' (TBP) format supports the development of high quality journal articles and similar publications by providing a recognized means by which some of the reporting of the research can be through the development and publication of papers during the thesis candidature, with these being directly incorporated in the student's overall thesis submission.

These guidelines are designed to assist supervisors and thesis examiners in understanding the University's requirement for a thesis presented in the 'Thesis by Publication' format. Whilst they have been specifically developed for the Doctor of Philosophy degree they may be used to inform policy and practice within other research degrees, such as research professional doctorates within specific disciplines.

1. Background

During 2009-10 commencing with an initial Scoping Paper the Postgraduate Research Committee (PRC) considered models and options for TBP at VU. The Committee's work highlighted that whilst the detailed requirements in relation to TBP varies somewhat by institution, the general thrust, in all cases, is that the student is assessed to a significant degree on material presented in the form of a coherent series of published or publishable journal articles or equivalent publications with supporting contextualizing material about the research program and its outcomes.

Early Australian approaches to TBP, such as that adopted initially at Monash University, were a mechanism to enable existing non-doctoral qualified but research active University academic staff to collate and present a portfolio of their published work and thereby receive retrospective recognition of having generated a body of knowledge equivalent to that required for a PhD. In this approach TBP was viewed by some as being an academically less rigorous and, therefore, a lesser quality 'PhD'/research training experience.

More recently, however, PhD by publication has been adopted in Australia and internationally **as an alternative format for presentation of a coherent program of research**. In this model, normally all research and writing is undertaken during enrolled candidature with the format supporting the production of timely high quality publishable material as part of the overall thesis development process. The model of TBP adopted at

VU reflects this second approach, whilst not precluding the option of the incorporation of previously published material if this is approved through the VU Advanced Candidature Approval process.

With the current expectations about publication output in relation to employability following graduation, this format was considered by the PRC to be attractive and beneficial both to students and to the University. In fact, for suitably qualified students in some disciplines with project structure and timelines that make the format feasible, it was considered that TBP could better prepare students for research careers as it enhances opportunities for learning to write in a manner needed for their ongoing career development and enhances their professional 'capital', including their capacity to compete for research funding and postdoctoral positions post-graduation.

There are also potentially broader benefits to the University as a greater focus on writing for journal publication can contribute to the further development of a quality, publication-focussed research culture, as well as increasing the visibility and profile of VU research groups and further building track record for both students and their supervisors.

2. VU's Approach to 'Thesis by Publication'

In VU's approach TBP is essentially **an alternative style of documenting the research and presenting it for doctoral examination**. The expectations of the rigour, depth and quality of the research and its associated new contribution to knowledge are identical to those expected in other formats.

For example, a PhD student who is planning to work within the format with the support from his/her supervisors will follow essentially the same process as any other student in terms of planning, conducting and preparing their research for examination with the same key milestones, such as:

- an initial pre-candidature period where a detailed research proposal is developed;
- Faculty-aided candidature approval, including approval of the detailed research proposal and plan to adopt a 'Thesis by Publication' format;
- ongoing monitoring and reporting of progress against the planned project timelines and doctoral level performance goals and standards;

Planning/staging of a project to be presented as TBP needs to be amenable to segmentation into discrete components/studies that can be developed and submitted as publications along the way.

The TBP format nominated at the time of candidature approval and the candidature proposal and project timelines and milestones must reflect how planned work and publication outputs will enable a TBP to be completed within standard doctoral degree duration.

3. Candidature and Advanced Candidature Processes for Thesis by Publication

The initial stages of enrolment and candidature for a PhD project in the TBP format follows the same processes as for other thesis formats.

At the time that the student presents for Candidature Confirmation through their Faculty process they are required to nominate the proposed thesis format and, if the proposed format, is TBP, then the confirmation panel is expected to ensure that the project plan and timelines reflect an approach that can enable the planned Papers to be produced and sufficient of them to be accepted for publication prior to the required thesis submission date.

As for all students Confirmation of Candidature includes careful scrutiny of the following:

- A detailed research proposal including literature review, methodology, proposed analysis and thesis format;
- A detailed budget outlining the resources required for the project.

And also takes into consideration:

- The academic merit, feasibility and viability of the student's proposed PhD project;
- The capacity of the Faculty to ensure that adequate supervision, resources and infrastructure are available to support the proposed project;
- The capacity of the student to undertake the project successfully in the format proposed within the time frame of the length of the PhD with the enrolment time fraction proposed.

The University policy allows for the potential to incorporate previously published Papers that relate directly to the research topic and project, **if the incorporation of this material is confirmed to meet University standards and guidelines applying the procedures for Advanced Candidature approval.**

Specifically, a student may apply to be enrolled with Advanced Candidature standing, if they have commenced or produced work on a research project prior to applying for enrolment in a PhD program and have completed one or more Papers for publication that they wish to be considered for incorporation into a PhD project submission in the 'Thesis by Publication' format.

In the case where a student is applying for approval to include Paper/s previously completed, the Advanced Candidature review will involve a rigorous review of the academic merit and quality of the work proposed to be incorporated into the thesis submission, as well as the merit and integrity of the proposed PhD project overall and the suitability of each Paper proposed for inclusion in relation to the PhD project's overall focus and aims. This review should be at least equivalent to that used by the Faculty concerned for candidature confirmation, and must include an external reviewer with demonstrated expertise in the field of the proposed PhD project. The review will determine not only whether Advanced Candidature will be granted, but also which of the proposed Papers are approved for inclusion.

A student accepted with Advanced Candidature on the basis of a project proposal and one or more previously completed/published Papers will be admitted as a candidate immediately and the work already done on the research project will be taken into account in determining the duration of the student's course. Time already consumed will be deducted from the maximum allowable duration for the PhD degree. In all cases the minimum period of enrolment prior to submission of the Thesis for a student admitted with Advanced Candidature is 12 month full-time (or equivalent part-time).

(see also HDR Policy 3.1.2.2, 3.3 Schedule D, D2 and D4)

4. Standards and Expectations for the PhD Degree

The Doctor of Philosophy (PhD) degree provides training and education in research under supervision with the objective of producing researchers capable of conducting research independently, at a high level of originality and quality. A doctoral student is expected to uncover or create new knowledge by the discovery of new information, formulation of theories, development of new approaches, or the innovative re-interpretation of existing ideas, theories or approaches.

A PhD Thesis is expected to equate to a sustained piece of written work of 60,000-100,000 words in length. The University expectations regarding the length of time taken to complete a PhD is three years EFT (36 months), with the possibility of applying for two 6 month extensions to candidature. Maximum duration is 48 months.

A Doctor of Philosophy degree requires the candidate to demonstrate learning outcomes at Level 10 in the Australian Qualifications Framework. It is awarded after independent external examiners are satisfied that the student has demonstrated:

- A deep and thorough understanding of the relevant techniques in the field of research;
- Competence in the chosen field through judicious selection and application of methods to yield a significant body of work;
- Capacity to critically evaluate and effectively present this body of work;
- Independence of thought and approach;
- Has made an original contribution to knowledge.

Regardless of the discipline and the nominated presentation format, the research undertaken and the depth of knowledge demonstrated in the thesis must satisfy the requirements outlined above.

(see also HDR Policy Schedule E, E2)

5. Papers Suitable for Inclusion in a Thesis by Publication Format

Only Papers developed to the standard expected in ERA-ranked journals and ranked conferences and/or for a book chapter or monograph in a scholarly collection contracted to be published by a Higher Education Research Data Collection (HERDC) recognized publisher with demonstrated peer review processes are considered suitable for incorporation in a PhD presented in the TBP format.

Normally all Papers are expected to have been developed and submitted during the period of candidature. However, one or more Papers from research and resulting publication undertaken prior to enrolment in a higher degree program may be approved for incorporation in the thesis through the Advanced Candidature approval process (see below).

No publication that has been published more than 10 years prior to the thesis submission is eligible for inclusion.

The initiation, key ideas, development and writing up of each of the Papers within the thesis should be the primary responsibility of the candidate. Where any Paper has multiple authorship, the candidate must be the principal author of the work. This must be supported by written verification of co-authors, including their permission to incorporate the Paper in the thesis submission.

(see also HDR Policy, Schedule K2)

6. Thesis Format

The thesis **must contain** some published Papers or Papers fully accepted for publication (ie in press). It may also include some Paper manuscripts submitted and under review or revisions, and/or completed and ready to submit. At minimum at the time of thesis submission **at least 50% of the presented Papers** are expected either to have been published, or to be in press following acceptance for publication or to be undergoing final revisions following positive refereeing.

The number of Papers can vary according to discipline, and partially also depends on the proportion of the overall thesis that is presented as Papers. Please refer to your Faculty or School for more specific guidance on the number and length of papers that would normally be expected in your discipline.

A thesis in the TBP format **must include additional framing and linking material as part of the thesis submission** to:

- contextualise the research problem,
- justify the theoretical framework,
- review the relevant literature (especially that not covered in depth within the Papers),
- account in detail for the research design, including linking of the Papers to the broader research problem and approach, and
- draw conclusions in relation to the overarching research problem or theme about its contribution to knowledge, its limitations and future development.

In all cases the preparation of framing and linking materials is expected to be undertaken whilst the student is an enrolled candidate for the degree and with regular supervisory input and support.

Overall the material presented for examination needs to equate to that which would otherwise be presented in the standard PhD thesis format. The supervisors and the Faculty postgraduate research committee are the main sources of appropriate advice to PhD candidates with respect to disciplinary norms in these matters, and on the integrity and equivalence of the proposed thesis submission to that presented in a standard thesis format.

Some of the elements included in the thesis presentation are likely to take a different form when presented in a Thesis by Publication format. For example, the Abstract needs to summarise the main findings presented in each of the published papers or manuscripts. It should indicate how the included works are tied to a coherent intellectual framework, and how, when considered together, they demonstrate a significant new contribution to knowledge in the discipline or field.

(see also HDR Policy, Schedule K2)

7. Declarations of Authenticity and Authorship Contribution in the Thesis by Publication Format

A submission in the 'Thesis by Publication' format requires two types of declarations to be included:

1. A signed declaration of authenticity that attests (among other things) that the maximum word limit for the degree has been adhered to (or an exception to the maximum word limit has been approved. This is a standard declaration required for all theses. Please refer to OPR website for the exact wording of the student declaration (<http://www.vu.edu.au/research/research-students/thesis-submission>).
2. Declarations and substantiation in relation to the incorporated Papers:
 - List of Paper publications and/or Paper manuscripts, including verification of ranking or impact factor of the journal or conference publication and of the status of the paper in relation to its submission, review or acceptance
 - For each Paper a declaration about authorship and contribution to the work, including acknowledgement of joint or multiple authors and verification of each of their contributions and permissions (see VU's authorship acknowledgement guide)
 - Copies of the published Papers and submitted and/or final draft Paper manuscripts

Please refer to OPR website for the format recommended for these declarations (<http://www.vu.edu.au/research/research-students/thesis-submission>).

All the declarations should be included at the beginning of the thesis, immediately following the title page and abstract. Unless they are included the thesis will not be accepted for examination.

(see also HDR Policy, Schedule K2)

8. Inclusion of Publications Completed Prior to Enrolment

A student may be granted approval to include research and (an) associated Paper/s completed and/or published prior to enrolment in the research degree program in some circumstances.

The Advanced Candidature approval process is the mechanism that is used for a student applying for admission to make the case for the appropriacy and merit of Papers completed and/or published prior to enrolment for inclusion in a the thesis research (see further detail in 4. above).

No Papers that will have been published more than 10 years prior to the expected thesis submission date can be considered for inclusion. Similarly, no Papers can be considered for inclusion that have arisen from research previously submitted for examination for another degree.

(see HDR Policy, Section 3.3.5 and Schedule D, D4)

9. Approval of Thesis Format and Thesis Format Changes

The proposed PhD thesis format is approved through the candidature approval process.

However, it may become apparent through the course of the student's ensuing candidature that a change in thesis format is desirable.

This may occur because the planned schedule of producing publications and getting them accepted for publication has not been achieved, so it is judged more appropriate to produce a thesis in the standard format.

Alternatively, it may be that many Papers have been written and accepted for publication in the course of the candidature to date and it is considered by the supervisor/s and student that it would be advantageous for the thesis submission to be able to directly incorporate these by changing from the standard to the TBP format.

In each case where a change in format is judged by the supervisor/s to be appropriate, the student can apply to their Faculty for a change in thesis format on the *Application for Change of Thesis Format* form. If the Faculty PRC approves the change, the thesis submission will be expected to take place in that format.

When examiners are appointed they are notified of the format of the thesis and provided with the standard VU Examination guidelines together with additional supporting guidelines about TBP at VU.

(See also HDR Policy, Schedule D, D5.6)