A Guide for Internal and External PhD Examiners

PREFACE

Our discussion in this Guide is underpinned and informed by the empirical research on PhD examinations that we have undertaken over the last six years; this involved policy analysis, questionnaire surveys to academics and doctoral candidates, pre- and post-viva interviews with doctoral candidates and interviews with a variety of experts on PhD examining. This research has spanned a range of disciplines, and interested readers can find out more about it by consulting our other publications (see Further Reading Section). Many of the ideas and materials presented in this Guide are based on those in sections of our book '*The Doctoral Examination Process: A Handbook for Students, Examiners and Supervisors*', published in 2004 by Open University Press (see page ? for further details).

We welcome comments on this Guide and suggestions for improvements in future editions.

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INTRODUCTION

This Guide is aimed at examiners of doctorates in the UK. Although there is now a range of doctorates on offer, the Guide will be useful for anyone undertaking an examination that involves assessing a thesis and undertaking a viva.

The Guide has three main parts. Part I outlines what external and internal examining involves and raises some important issues to consider when deciding whether to examine a PhD. Part II focuses on how to assess a doctoral thesis, and includes discussions about the criteria for a PhD, strategies for reading a thesis, and preparing pre-viva reports. Part III deals with the viva, and considers different viva purposes, relationships with co-examiners[1] and supervisors, preparing for and conducting the viva, and post-viva business.

PART I: SHOULD YOU EXAMINE?

What the job entails

When considering whether to accept an invitation to examine a British PhD you need to be clear about what it entails. Examining a PhD takes roughly five days although, in the case of re-examination of the thesis and possibly a second viva, the process can take several days more. The job of examining a PhD involves several elements.

- Practical arrangements. Internal examiners are sometimes responsible for the organisation of the viva and arrangements for the external examiner's travel, accommodation and 'entertainment'.
- Reading and evaluating the thesis.
- Writing a pre-viva report on the thesis.
- Conducting the viva.
- Making a recommendation of award.
- Completing a post-viva report and, if appropriate, outlining corrections.
- Post-viva checks or re-examining. The internal examiner will usually have responsibility for checking and approving minor corrections. Where more substantial changes to the thesis are required, both examiners are usually expected to approve them and then to complete appropriate paperwork. In some cases a candidate may require a second viva.

Should you serve as an external examiner?

External examiners are paid a small fee for examining a PhD – Lynne Pearce suggests that the average is £100[2]; they also receive reimbursement for travel and subsistence costs. Money is not the primary reason for agreeing to externally examine at PhD level, so why should you choose to examine a thesis?

Potential benefits of external examining

There are three *main* benefits to examining at PhD level subject, of course, to certain conditions (discussed later):

- Career development and academic recognition

  An invitation to serve as an external examiner represents recognition of expertise and conferment of academic status; it is a mark of belonging to the academic or discipline-

[1] For ease of communication we use a model of two examiners for each PhD examination (one external and one internal) throughout this guide. However, we recognise that an additional internal or external examiner is sometimes appointed.

[2] Pearce, L. (2005) *How to examine a thesis*. Maidenhead: Open University Press, p. 36.

specific community. Being in high demand as an external examiner is a clear sign that one is recognised as a leading figure within a discipline, or more usually, a specific area within a discipline. Evidence of external examining is often requested when academics seek promotion.

- Intellectual interest
  A principal reason to accept examining is to keep abreast of developments in the field. Interest is also a key factor.

  > There are probably two really good things about examining PhD theses. The first involves reading new research on a topic that is close to my own research interests, or alternatively, if the topic is miles away from what I work on, reading research that uses theories and methods of relevance to my own work. A second benefit is meeting the researcher and having the opportunity to discuss with them what they've done and what they've made of it. (Professor, History)

- Service to academic and/or discipline communities.
  Examining is a means by which academics participate in discipline communities. This participation involves promoting good scholarship, encouraging promising scholars, maintaining standards and gatekeeping. Mullins and Kiley[3] discovered that 'duty', and more specifically the maintenance of standards within a discipline, was a major reason why academics agreed to examine Australian PhDs: 'You are asked to maintain the standards because of your own professional expertise'.

Considerations when deciding whether to examine a PhD

Although there are some attractions to PhD examining, there are three main questions that you need to address *before* you accept an invitation. First, are you the right person for this particular examination? Second, do you have enough time? Third, are you prepared to examine in the manner specified by the appointing institution? We now address each of these questions in turn.

1. *Are you the right person for this particular examination?* Four main factors need to be considered in relation to this question: i) institutional requirements; ii) personal, academic and financial relationships; iii) area of expertise; iv) fairness.

First, institutions normally stipulate certain qualifications and experiences that an external examiner should have. They also regulate the type of relationship that an external examiner may have to the appointing institution and/or department, and exclude academics from serving as external examiner to a student they have supervised.

Second, an increasing number of institutions also stipulate that examiners should not be closely involved with other examination participants in academic, personal or financial terms. Some institutions identify the types of relationships that are considered unsuitable, others ask potential examiners to declare their interests and/or involvement. Obviously, in order to decide whether or not you are an appropriate examiner, you must read the institution's regulations carefully.

[3] Mullins, G. and Kiley, M. (2002) 'It's a PhD, not a Nobel Prize': how experienced examiners assess research theses, *Studies in Higher Education*, 27(4): 369-386 (p.375).

Even when institutions do not regulate academic, personal and financial relationships between examination participants it is wise to consider whether agreeing to examine could lead to problems. Relationships that may be problematic, and which you should think about carefully before agreeing to examine, include:

- you are involved with the candidate, the supervisor or co-examiner on a personal or financial basis;
- you are a recent ex-student of the supervisor or co-examiner;
- you are working closely with the supervisor, co-examiner or candidate;
- the candidate's supervisor has recently examined and passed your PhD student - are you confident that a 'tit-for-tat' principal of agreeing to serve as examiner does not extend to agreeing to pass the candidate?

Disagreeing with people is often uncomfortable and upholding a position when others disagree can be difficult, but both can be much more difficult when you are working with people who you are closely involved with or who you feel that you owe (for example, they recently examined and passed your PhD student). The question you need to ask yourself, and to answer truthfully, before accepting an invitation to examine is 'if necessary, could I refer, or even fail, this candidate?' If the answer is 'no' then this is an invitation you should *not* accept.

Third, external examiners are usually required to be 'experts'; this is often equated with having published in the area of the candidate's thesis. Whilst some academics subscribe to the view that the candidate's thesis should fall directly within the area of the examiner's work, others are happy with a looser correspondence between the work of the examiner and candidate.

In our view the external examiner must be able to:

- understand the theories and approaches employed by the candidate;
- assess the candidate's understanding and application of these theories and approaches;
- know the broader context(s) and locate the thesis within it;
- judge whether the thesis meets the minimum requirements for a PhD in the appointing institution and particular discipline area. For example, the requirement that a thesis be 'original' and constitute a 'contribution to knowledge'.
- conduct a rigorous, but fair, verbal examination about the thesis and, if required, about the broader context;
- where appropriate, identify ways of revising a thesis for the award of PhD;
- where appropriate, offer guidance on the future development of the research and on publication possibilities.

To help academics decide whether they have sufficient expertise to examine a particular thesis, BPS/UCoSDA[4] recommend that, 'before formal appointment, all proposed examiners should receive a brief abstract of the research, prepared by the candidate… This should outline the topic, the contents, and the theoretical and methodological approaches adopted.' This is a good suggestion, although the success of this practice hinges on the clarity and accuracy of the candidate's abstract. If an abstract is not supplied, you should request to see one before you agree to examine. Even after formal appointment BPS/UCoSDA recommend that you should return the thesis and resign the appointment if you think that you are 'not

[4] British Psychological Society and The Universities and Colleges' Staff Development Unit (BPS/UCoSDA) (1995) *Guidelines for Assessment of the PhD in Psychology and Related Disciplines*. Sheffield: UCoSDA. (p.6)

competent to pass judgement on the written submission'.[5] On occasions, you may not be 'expert' in all aspects of the thesis, this is particularly likely with interdisciplinary or multidisciplinary work. In these instances it may be appropriate to suggest the appointment of an additional examiner with expertise in the areas outside your competencies.

Fourth, our research and other sources suggest that some people examine in ways that are unfair to the candidate. Typically the examination seems to be used as an opportunity to block certain academic developments and/or to work out a grudge against the candidate, their supervisor or the department. To examine fairly you must be prepared to engage with the candidate's work on its own terms. If you feel that you cannot, or are not willing to do this, then you should decline the invitation.

2. *Do you have enough time?* Be realistic about whether you can read the thesis and conduct the viva within the timeframe specified by the appointing institution. Our academic interviewees reported a few occasions when their co-examiner had quite clearly not read the thesis properly.[6] This is not fair to the candidate, their supervisor or the co-examiner(s). It is also a breach of the contract that an examiner makes with an institution when they agree to examine. If you are unlikely to have, or to make, sufficient time to read the thesis carefully and fully then you should decline the invitation to examine.

3. *Are you prepared to examine in the manner specified by the appointing institution?* Many academics assume that the regulations for examining a PhD are fairly standardised, but they are not[7]. Some universities have procedures that you may feel uncomfortable with (for example, rules that stipulate that the pre-viva examiners' meeting must be minuted by an administrator). It is wise to ask to see the guidance for examiners *before* you agree to examine – ensure that you know what you are letting yourself in for when you say 'yes'.

Should you serve as an internal examiner?

Whereas external examining carries some kudos, internal examining is of much lower status and is usually unpaid, although examiners often get a 'free' lunch. So why agree to serve as an internal examiner?

Potential benefits of internal examining

- Internal examining is a way in which academics acquire the skills, experience and confidence to undertake external examining - it therefore contributes to career development.
- Internal examining, like external examining, is also a service to the wider academic community and is a useful way of getting to know colleagues in your own, or related, areas.
- Internal examining is part of an academic's job. It is a responsibility we have within our own institutions to the postgraduate student community and our colleagues who supervise PhDs.
- Internal examining can be academically interesting and provide opportunities to keep abreast of new developments.

[5] Ibid., p.9.
[6] See also Phillips, E.M. (1994) Quality in the PhD: points at which quality may be assessed, in R.G. Burgess (ed.) *Postgraduate education and training in the social sciences*. London and Bristol: Jessica Kingsley (p.134).
[7] See Tinkler, P. and Jackson, C. (2000) Examining the doctorate: Institutional policy and the PhD examination process in the UK, *Studies in Higher Education*, 25 (2): 167-180.

For all these positive reasons to examine there are also several important considerations that you need to address before making a decision.

Considerations when deciding whether to examine a PhD

Whilst some of the considerations discussed in relation to external examining may be pertinent to internal examining, the issues for internal and external examiners are slightly different. When asked to serve as an internal examiner you are advised to consider carefully the following four questions. 1) In academic terms, can you examine this thesis? 2) Are you doing too much PhD examining? 3) Can you examine this PhD thesis fairly? 4) Do you have experience of examining a PhD?

In academic terms, can you examine this thesis? One of the downsides of being invited to serve as an internal examiner is that the thesis is not always, or even usually, directly in your area of expertise. This does not mean that you should refuse to examine the thesis; in most cases it is unlikely that there will be another academic, aside from the supervisor, who will be working in the same area as the candidate. The important considerations are a) whether it is in an area that you understand and have general knowledge of and b) whether you find the thesis, or aspects of it (topic, theory, methodology), interesting.

Are you doing too much PhD examining? Some people are in more demand as internal examiners than others because of their areas of interest, their reputation as a good examiner, their availability relative to colleagues and so on. Bearing in mind that internal examining takes almost as much time as external examining, it is sensible to work out a feasible annual limit and to stick to it. It makes sense that academics who do a lot of external examining may be disinclined to take on internal examining as well. However, internal examining does provide a means of keeping in touch with standards within your own institution and it is a service that is fundamental to PhD provision within it.

Can you examine this PhD thesis fairly? Internal examiners frequently know the supervisor, and even the candidate, quite well. Whilst this is unavoidable, you still need to reflect on the implications of agreeing to examine and whether you may be compromised by your relationship with the supervisor and/or candidate. The pressure on internal examiners to pass a thesis against their better judgement is often heavier than that on external examiners, particularly where the internal examiner is junior to the candidate's supervisor, or the supervisor is head of department. In these instances, the internal may feel under pressure to pass a weak thesis in order to protect their current and future position in the department.

> …junior, internal examiners especially are locked into academic, social, political and economic relationships which have the potential to put a strain on the independent exercise of their judgement and integrity. Their career, promotion, friendships and entire future could be on the line if they want to demur from a favourable view taken by the student's supervisor/s and the other examiner.
> Typically: senior academic and principal supervisor (possibly head of department) engages guru at University of Wessex with whom he (sic) has worked for many years – and who owes him a favour – to act as external examiner. He then approaches some malleable departmental colleague in the department inviting her (sic) to act as internal. She feels privileged, obliged to accept (for what grounds are there for refusal?) or merely that this is an important opportunity in her professional development. She finds thesis of poor standard, but is then called by the external saying 'there's no problem here is there?' etc

> etc etc. But, if not a guru, it could be your best friend, the editor of your professional journal or fellow member of the AUT executive… (Professor, Independent Studies)

The question you need to consider when invited to examine is the same one you should consider when approached to be an external examiner - if necessary, could you refer, or even fail, this candidate? Novice examiners, or junior members of a department, are advised to check out the candidate and supervisor before agreeing to serve as an internal examiner. It is not a good idea to be involved in examining a weak student if the supervisor is senior to you and known to be difficult; a more senior or experienced colleague would be better placed to serve as an internal examiner in this situation.

Do you have experience of examining a PhD? Internal examining is usually the first stage in developing experience as a PhD examiner. If you are invited to serve as an internal examiner but have no experience of PhD examining it is a good idea to check what support is available. For instance, some institutions provide a mentor (possibly a co-internal examiner) to help new internal examiners through the process. Some provide an independent chair for the viva to reduce the internal examiner's responsibilities. Staff development courses may provide a means of gaining knowledge about procedures and practices at your institution.

There is not space here to discuss questions about how to deal with more unusual examining appointments; these are covered in our book.

PART II: HOW TO ASSESS A THESIS

In this section we do not attempt to provide a model of assessment. Instead we draw upon sources of available guidance to provide a tool kit that examiners can adapt to their individual needs. We begin by considering what examiners need to look for when assessing a thesis and then discuss strategies for reading and preparing a report on it.

Formal guidelines on assessment

Institutional guidelines

When you accept the job of examining a PhD thesis you agree to comply with the rules of the appointing institution. This means that the criteria you use to assess the thesis must be those set out in the institution's policy – it is important to read these carefully *before* reading the thesis and *before* agreeing to be an examiner. It is erroneous to assume that the regulations in place at your own institution, or those that were used to assess your own PhD, are standard. Institutions vary considerably in the ways that they define a PhD and in the criteria they present for assessing a doctoral thesis. Bear in mind, though, that although some policy guidelines are very specific, some (probably most) are extremely vague.

Discipline guidelines

A few disciplines provide guidelines about what constitutes a PhD. Such discipline guidelines should not be regarded as a replacement for institutional policy, but rather as a useful *supplement* to it. As the Royal Society of Chemists[8] state: 'Every institution will have its own formal regulations regarding the final examination for the PhD. It is not the intention of these guidelines to seek to supersede such regulations, though they may serve to inform their interpretation.'

[8] Royal Society of Chemists (1995) *The Chemistry PhD – the Enhancement of its Quality*, http:www.rsc.org/lap/polacts/phd.htm (p.9) (accessed 30 March 2003).

QAA and research funding bodies

The Quality Assurance Agency (QAA) suggest learning objectives for doctoral work. Those relating to knowledge and research skills are of particular salience for the assessment of a thesis. QAA propose that doctorates are awarded to students who have demonstrated:

> i) the creation and interpretation of new knowledge, through original research or other advanced scholarship, of a quality to satisfy peer review, extend the forefront of the discipline, and merit publication;
> ii) a systematic acquisition and understanding of a substantial body of knowledge which is at the forefront of an academic discipline or area of professional practice;
> iii) the general ability to conceptualise, design and implement a project for the generation of new knowledge, applications or understanding at the forefront of the discipline, and to adjust the project design in the light of unforeseen problems;
> iv) a detailed understanding of applicable techniques for research and advanced academic enquiry.[9]

Doctoral students are also expected to be able 'to make informed judgements on complex issues in specialist fields, often in the absence of complete data' and 'to communicate their ideas and conclusions clearly and effectively to specialist and non-specialist audiences'.[10] These objectives articulate, at a general level, current good practice.

The Research Councils and the Arts and Humanities Research Board (AHRB, now Arts and Humanities Research Council, AHRC) have assumed a central role in shaping the content and delivery of education at doctoral level. A joint statement issued in 2001 identified seven sets of skills that students (funded by them) are expected to develop during their research training. The statement is not intended to provide assessment criteria for research training or PhDs, but examiners may find it useful to check the list of skills as by the time a PhD student has completed research training modules and conducted and written up their own research, many of the skills identified by the Research Councils and AHRB should be apparent in the candidate's thesis and viva performance.

Informal guidelines on assessment

Although there are some formal guidelines on assessing a doctoral thesis (see above) these tend to be rather general. In Box 1 Pam Denicolo sets out a detailed and systematic breakdown of attributes that examiners in the social sciences usually look for in assessing a PhD thesis. Denicolo's account of practice shows how basic assessment criteria are broken down into specific questions that examiners can ask themselves as they work through a thesis. Although based on the collective experience of social science examiners, Denicolo's model of how to unpack each component of the thesis may provide examiners in other disciplines with a useful framework.

[Insert Box 1]

'Originality' and 'a contribution to knowledge'

Two criteria are commonly employed to define a PhD submission, these are 'originality' and 'a contribution to knowledge'. Both criteria are vague and it is usually left to examiners to derive their own interpretations. We now consider both of these concepts.

[9] Quality Assurance Agency (2001) *National Qualifications Framework*, http://www.qaa.ac.uk/crntwork/nqf/ewni2001/contents.htm (accessed 1 August 2003)
[10] Ibid.

'Originality'

A spark of inspiration as well as perspiration.[11]

Originality is one of the most frequently stipulated criteria for the award of a PhD. But what constitutes originality and how much of a thesis should be 'original' to qualify for a PhD? We suggest three main ways in which a PhD thesis can be original.

1. Research topics.
- Research on new - areas of study, data sets, questions, hypotheses, problems, links between topics/data sets and so on. Research on significantly changed contexts as in the replication of a study.
2. Research processes.
- New applications of established research tools - for instance, methods, instruments, conceptual tools, modes of analysis, procedures, theories, 'practice' - to different or new research topics.
- Significant refinement of established research tools, or development of new research tools, applied to established or new research topics.
- The application of new perspectives to research topics.
3. Research outcomes (intentional and unintentional).
- New or substantially revised solutions, products, theories, knowledge, interpretations, approaches, ways of doing research (methods, instruments, conceptual tools, modes of analysis, procedures, application of theory, 'practice').
- New syntheses of theory or knowledge or ways of doing research.
- The opening up of new, and/or neglected, areas for fundamental and significant further research.

This list provides a guide for identifying originality, one that embraces the diverse ways in which examiners actually interpret the term when assessing doctoral theses; you can assume a submission qualifies as original if it meets one or more of the above criteria. However, as with most areas of academic life there can be lively debate about whether aspects of a thesis/submission can be classified as 'original' or 'new' in any of the above senses. Cryer argues that 'originality' may be particularly contentious and/or contested by examiners if a thesis is potentially 'highly original': 'Really original research is all too often slow to be accepted.'[12]

It is worth noting that originality is more important in some disciplines than in others. Expectations of originality may be quite modest in some branches of science.

'A contribution to knowledge'

The requirement that a thesis should represent a contribution to knowledge is usually coupled with the criterion that it should be original/new. This coupling prevents ill-conceived or trivial projects – that might be new/original – from qualifying as worthy of a PhD. As with originality, a 'contribution to knowledge' can be rather elusive for PhD students in some areas of science. A candidate who has worked on a large project may make a substantial contribution to the group's work, but their contribution to disciplinary knowledge may be

[11] Winter, R., Griffiths, M. and Green, K. (2000) The 'academic' qualities of practice: what are the criteria for a practice-based PhD? *Studies in Higher Education*, 25(1): 25-37 (p.35).
[12] Cryer, P. (2000) *The research student's guide to success*, 2nd edn. Buckingham: Open University Press (p. 197).

limited. In some branches of science projects are passed on from one doctoral student to another, and this compounds the difficulty of identifying a distinctive 'contribution to knowledge'. This is conveyed clearly in the following example.

> Tim …was also funded to do his PhD on this enzyme. There was a person working on the enzyme before him. That was Connor. Connor started off by trying to purify the enzyme and he came quite close. Then a year later Tim started and actually purified the enzyme and started working on it. Now I shall be taking that work a little bit further. Maybe if they get another award there'll be someone carrying on my work in the same way.[13]

Publishability is a way of measuring 'contribution to knowledge'. This measure is to the fore in the definition of a PhD espoused by the Research Councils and the AHRB (2001): 'PhD students are expected to make a substantial, original contribution to knowledge in their areas, normally leading to published work'[14]. This statement is rather vague about the quantity or quality of published work, presumably to embrace discipline differences. The BPS/UCoSDA[15] are more precise: a PhD submission should be 'equivalent in quantity and quality to at least two articles of a standard acceptable to a fully refereed journal', or 'substantial enough to be able to form the basis of a book or research monograph which could meet the standards of an established academic publisher operating a system of critical peer review for book proposals and drafts'.

Range of standards

> It was clear that this was a weak thesis, the question was how weak can it be and still pass?
> (Lecturer, Women's Studies)

What standard should a thesis meet in order to merit the award of a PhD? 'Excellence' may be the answer that rolls off the tongue, but in fact standards of British PhD theses are highly variable.

On the basis of interviews with external examiners, Phillips[16] noted two ways in which academics judged the range of PhD standards. The first strategy involved 'mental yardsticks of undergraduate degrees'.

> Using the idea of undergraduate degree grades (2/2, 2/1, etc.) as a guide that standards were not raised too high was a popular strategy to help decision making. By keeping these divisions as a yardstick in their mind, examiners were able to acknowledge that it was possible to gain a PhD for a piece of work that was less than 'excellent' although it was excellence that they were really looking for.

The second strategy involved working with the 'analogy of peer reviewing of journal articles'. As we have seen, the potential publishability of all, or parts, of a thesis is sometimes stipulated as a measure of PhD standards. Whilst this criterion can help to establish a bottom line, it does not prevent divergent standards nor does it preclude diverse

[13] Delamont, S., Atkinson, P. and Parry, O. (1997c) Critical Mass and Doctoral Research: reflections on the Harris Report, *Studies in Higher Education*, 22(3): 319-331 (p.326).
[14] Research Councils/AHRB (2001) Joint Statement of the Research Councils'/AHRB's Skills Training Requirements for Research Students, http://www.gradschools.ac.uk/aca/jointskills.html (accessed 18 January 2002).
[15] BPS/UCoSDA, Op Cit, p.29.
[16] Phillips, Op Cit, p.137.

academic judgements of quality; books and articles in refereed journals vary considerably in their rigour, originality and accomplishment.

So what does the bottom line look like? Drawing upon interviews with examiners of Australian PhD theses, Mullins and Kiley[17] list the characteristics of a 'poor' (referred or failed) thesis, these include:

- lack of coherence;
- lack of understanding of the theory;
- lack of confidence;
- researching the wrong problem;
- mixed or confused theoretical and methodological perspectives;
- work that is not original;
- not being able to explain at the end of the thesis what had actually been argued in the thesis.

Strategies for reading the thesis

There is no standard method of reading a thesis; the time that it takes, and the way it is done, varies between examiners. It may also vary by discipline because of variations in the length and format of theses. For example, a thesis in Mathematics or Physics may be 80-100 pages in length and dominated by equations which need to be worked through, whereas in the arts, humanities and social sciences a thesis is principally a prose document of approximately 80,000 words.

Mullins and Kiley[18] provide interesting examples of different 'reading styles' that PhD examiners employ.

> … sets aside time to read the thesis. He checks who is in the references to see that the writers are there who should be there. Then he reads slowly, from the beginning like a book, but taking copious notes. (Humanities)
>
> … reads the thesis from cover to cover first without doing anything else. For the first read he is just trying to gain a general impression of what the thesis is about and whether it is a good thesis – that is, are the results worthwhile. He can also tell how much work has actually been done. After the first read he then 'sits on it' for a while. During the second reading he starts making notes and reading more critically. If it is an area with which he is not very familiar, he might read some of the references. He marks typographical errors, mistakes in calculations, etc., and makes a list of them. He also checks several of the references just to be sure they have been used appropriately. (Science)
>
> …reads the abstract first and then the introduction and the conclusion, as well as the table of contents to see how the thesis is structured; and she familiarises herself with the appendices so that she knows where everything is. Then she starts reading through; generally the literature review, and methodology, in the first weekend, and the findings, analysis and conclusions in the second weekend. The intervening week allows time for ideas to mull over in her mind. In the third weekend she writes the report. (Social Science)

[17] Mullins and Kiley, Op Cit, pp.378-380.
[18] Mullins and Kiley, Op Cit, p.376-377.

In these examples, the examiner spends a couple of weeks reading and re-reading the thesis. For some academics the thesis has to be read as close to the viva as possible, as in this example from our interview with a Professor of Government.

> I leave it very late to read a PhD. I'm quite obsessive when I examine them …It sounds obvious, but I do read it [the thesis] all the way through, right to the very end, and make notes on it and everything. … I've got a very good short-term memory, I haven't got a very good long-term one, but if I've read it [the thesis] over 36 hours before, or 24, which I often do, and they [the candidate] say 'blah di blah di blah', I can say 'hang on a minute on page 47 you say this', 'cause it'll be in my notes and I'll remember it … A week later I've forgotten it.

If this is your first time examining a PhD, devise a strategy that is feasible for you and make sure you allow plenty of time to work through the thesis.

Pre-viva reports

Having read the thesis the next stage is to clarify your thoughts on it and prepare a report. Institutions vary as to whether an independent report must be submitted formally before the viva although this is recommended by the QAA.[19] Even where a formal report is not required it is useful to write an informal one that you are happy to pass to your co-examiner(s) prior to, or even during (subject to institutional guidelines), the pre-viva meeting. Often the report is a condensed version of a more detailed document that you have prepared to assist you in the viva. Being clear what you think about the thesis, and preparing a written account of your position, is *vital* to good preparation as a Professor of History explains.

> I've learned over the years to be very clear about my judgement before the viva, even when this is necessarily provisional, depending in part on how the student responds to questions in the viva. Early experiences of being steam-rollered into agreeing to pass a thesis that I would have preferred to refer, by the combined mass of the other examiner and the supervisor, convinced me always to go prepared in this way, and to make clear where I stood from the start. The rule that many universities have, that examiners have to write their reports in advance of the viva, and even submit them a few days beforehand, in some ways makes this easier. By the same token, if a thesis needs some repair work before it is passed, I think it is only fair to have worked out just what this should be in advance, so that clear guidance can be given to the student (even if the requirements are modified by the viva performance and the views of the other examiner).

Purposes of the pre-viva report

Depending on institutional arrangements, the pre-viva report can serve several purposes for different audiences.

- For the examiners, it serves to present and justify their preliminary judgement of the thesis. It also identifies points for discussion in the viva – these form the basis of the agenda.
- For administrators, a formal pre-viva report can be part of quality procedures. In this case, the pre-viva reports can be used to check that the examiners' concerns have been addressed in the viva and taken into account in forming the recommendation of award.

[19] Quality Assurance Agency (2004) *Code of Practice for the assurance of academic quality and standards in higher education*, p.24.

- In at least one institution, the pre-viva report also serves an important purpose for the candidate in that s/he is informed in advance, via the supervisor, of the topics that will be discussed in the viva.

What to include in the report

- You should provide a clear account of your evaluation of the thesis. This account should explicitly address institutional criteria and/or guidelines but, as previously mentioned, these may need to be interpreted through a discipline-specific lens and/or broken down to cover the different components of the thesis.
- A recommendation of the award, either definite or provisional (depending on the regulations at the appointing institution), needs to be recorded and justified by your evaluative comments.
- The report should also state clearly what purposes you think that the candidate's viva should serve.

PART III: THE VIVA

This section explores examiners' perspectives on the viva and provides guidance for new examiners as well as tips and suggestions for experienced ones. Building upon the discussion above about assessing the thesis, we consider how examiners prepare for the viva, conduct the oral examination and make a recommendation of award.

Before the day of the viva

Forward planning is key to making the viva as stress free as possible for you and your co-examiner. It is important to be clear about what you need to *do* and *think about* before the day of the viva. Clearly, reading and assessing the thesis is the main pre-viva-day job, but there may be others. For example, internal examiners are sometimes responsible for scheduling the viva and finding a venue for it. Frequently, both examiners are required to submit a pre-viva report; this depends on the institution, but in some universities the viva cannot go ahead until this is received. As such, it is important to be clear about what you need to do and when you need to do it.

The things that you need to *think* about before the day of the viva are as important as the things that you need to *do*. We suggest that there are three key matters for most examiners to consider: a) the purposes of the particular viva; b) working with your co-examiner and c) should the supervisor be allowed to attend the viva?

What are the purposes of this particular viva?

Prior to meeting with your co-examiner it is imperative that you reflect upon the purposes of the viva as these have important implications for the organisation of the oral examination and what each of you do in it. The viva can serve a number of different purposes, we divide these into 3 main categories: examination, development and ritual. There is not space to discuss these in detail here,[20] but the key purposes within each category are listed below.

Examination purposes:

[20] For more detail see: Tinkler, P. and Jackson, C. (2004*) The Doctoral Examination Handbook: A Guide for Students, Examiners and Supervisors*. Maidenhead: Open University Press.

- authentication of the thesis (particularly important where the candidate works as part of a team);
- assess candidate's ability to locate research in broader context;
- check candidate's understanding;
- clarification of obscurities and/or areas of weakness in the thesis;
- defence of the approach, methodology and conclusions presented in thesis;
- decision making about the outcome in borderline cases;
- gatekeeping – check on supervision and on PhD standards across institutions;
- test candidate's oral skills.

Developmental purposes:
- basic development - explore ways that a thesis may be raised to doctoral standard;
- advanced development – where the thesis is judged to be of PhD standard, to explore ideas and discuss the development of the candidate's research beyond the requirements of a doctoral thesis; discuss future work and publishing opportunities.

Ritual purposes:
- rite of passage;
- reward.

Your agenda will be shaped by several factors (including the agenda of the appointing institution), but your assessment of the thesis should be most important in determining the purposes of a particular viva. We have identified three basic types of viva depending on the assessment of the thesis; these are discussed briefly below.

Good thesis
If the thesis is judged to be good, the viva is frequently used to authenticate the thesis, clarify and develop points and provide the candidate with advice and guidance. In general, it is used for 'advanced developmental' purposes.

Borderline/referred thesis
For a candidate whose thesis is judged to be borderline or in need of further development, the viva is a forum within which you can provide constructive feedback and guidance. The viva allows borderline candidates the opportunity to 'defend' their work.

Failed thesis/award of lower degree
In rare cases where the thesis is failed, the viva acts to confirm this and to explore why this has occurred. You also need to decide whether a lower award is appropriate, for example, an MPhil.

Thinking about your relationship with the co-examiner(s)

> The viva can be especially stressful when there are differences in hierarchy and gender that are acting contrary to convention. For example, a candidate older than the examiner, the external examiner less senior than the internal examiner. It is important to be clear about the seniority of roles within the viva. (Senior Lecturer, Education)

It helps if you are clear about your status as an examiner in advance of the pre-viva meeting, and have time to think through the implications of this for how you will work with your co-examiner(s). This may be particularly important if your relative status as examiners is inconsistent with your relative status as academics. For example, the appointing institution

may expect you, a senior lecturer, to act as the 'senior' examiner and yet your co-examiner – perhaps a professor - is actually the senior academic. Careful advance preparation and, in particular, being clear about your assessment of the thesis, are ways of boosting your confidence and your ability to negotiate with your co-examiner(s).

Should the supervisor be allowed to attend?
In some institutions the supervisor is permitted to attend the viva only with the consent of the examiners. In such cases, you need to consider carefully the pros and cons of the supervisor's presence – key issues for consideration are mapped out below.

Reasons why you might welcome the presence of the candidate's supervisor
- You may be able to invite comments from the supervisor that may be beneficial to discussions in the viva (depending on institutional regulations).
- The supervisor may comment (depending on institutional regulations) on 'any practical or administrative difficulties in pursuit of the research which the candidate may raise'[21].
- You may be able to determine whether the candidate has been poorly or badly advised by the supervisor.
- The presence of the supervisor may make the candidate more comfortable and relaxed.
- Where the thesis requires corrections, the supervisor can make notes that can subsequently be used to assist the candidate in making the revisions.

Reasons why you might not welcome the presence of the supervisor
- The supervisor may inhibit the examiners asking questions about, or discussing, the quality and amount of supervision.
- You may be concerned that the candidate will be inhibited by the presence of their supervisor.
- You may feel intimidated if the supervisor is senior to you.
- The supervisor may be disruptive and/or may challenge the examiners – the extent to which this is likely will depend upon the institutional regulations and whether there are mechanisms in place to enforce the regulations. For example, an independent chair should stop a supervisor speaking if the regulations prohibit the supervisor contributing to the viva.

Pre-viva meeting
At this meeting the examiners should address four main matters - the content of the viva, the conduct of the viva, the investigation of extenuating circumstances and the management of post-viva business. It is usual for this meeting to take place in private, although we are aware of at least one university where an administrator minutes the discussion.

Content of the viva - producing an agenda
Constructing a clear, well-ordered agenda for the viva is the primary task in the pre-viva meeting. The agenda is structured by the different purposes that the viva has to serve. Within this framework decide how to address specific points about the candidate's work and decide who will broach which main questions and in which order. At this stage it is useful to reflect on whether there are any questions that are pivotal to your final decision; if there are it is best to raise them relatively early in the viva.

[21] BPS/UCoSDA, Op Cit, p.14.

Academics adopt different strategies for asking the candidate questions about the thesis. Differences in approach can be a matter of personal preference, although there are discipline differences. Three common approaches to asking questions about the thesis are the thematic approach, the process approach and the page-by-page approach.

- Thematic approach - the examiner focuses on the broad themes of the thesis; this can be supplemented with detailed discussion about specific sections of the thesis. As a Professor in Urban Planning explains: 'Not a page by page criticism. I prefer to develop themes from the text – and follow them up, or take a particular line of reasoning and follow it throughout the thesis.'
- Process approach - 'they sort of worked their way through my thesis by going through the literature review and then asking about the methodology' (Kate, Psychiatry). The examiner focuses on the research process – formulation of research problem, theory/approaches, methods, data analysis, conclusions - this process often mirrors the organisation of the thesis. This approach can be supplemented with discussion of specific sections of the thesis and/or the broader themes.
- Page-by-page approach. The examiner works systematically through the thesis – page by page, or line by line. In some subjects, such as Mathematics, this approach can enable the examiner to follow in detail the research process, perhaps the explication of a solution to a problem. However, in the arts, humanities and social sciences this approach is often equated with 'nit picking' and is associated with a preoccupation with spelling and punctuation. Candidates in the latter disciplines often report being unhappy with this approach to their work: 'The external examiner came with a list of hundreds of comments, some minor typos, others deeply-profound criticisms, and proceeded to fire them at me in the order which they arose in the text'.[22]

It is important to consider whether your approach gives priority to your main concerns and questions. For example, if you use a page-by-page approach and your most important questions relate to the conclusions, the candidate may be tired by the time they address them and so perform less well than if they had answered these questions earlier. It is also useful to think about whether your approach will encourage the candidate to respond well to your questions. For example, candidates in the arts, humanities and social sciences may experience a page-by-page approach as inhibiting and undermining and, therefore, it may encourage stilted answers.

Checklist - questions about content that you should address in the pre-viva meeting

1. What is the (agreed?) provisional decision - good thesis, borderline thesis, failed thesis?
2. What are the agreed purposes? Be very clear about these and ready to communicate them to the candidate. Check that these purposes are consistent with your provisional decision about the thesis.
3. What specific questions do you want to ask? Highlight any pivotal questions and ensure that these are raised relatively early in the viva. Check that your list of questions is consistent with your agreed purposes for the viva.
4. What question(s) will be used to begin the viva discussion?

[22] Wakeford, J. (2002) Raging against the machine, *Education Guardian*, 7th November.

Conduct of the viva: the behaviour, roles and responsibilities of viva participants
The roles of each examiner need to be clarified in the pre-viva meeting; there is considerable variation between institutions regarding examiners' responsibilities during the viva. You need to be aware of the institution's regulations and the implications of these for how you conduct the oral examination.

The extent to which examiners should take account of a candidate's 'needs' in a viva is a complicated and contentious matter. For example, should examiners make allowances for a candidate who is not fluent in English? Although many examiners might adjust their conduct (for instance, to speak more slowly, to allow more time for the candidate to respond to questions) few would see any justification for modifying the content of a viva. Where a candidate is registered as having a disability that may affect their viva performance, the institution should consider if, and what, special arrangements are required, and communicate these to the examiners well in advance of the viva.

Some institutions now monitor viva proceedings, often by employing an independent chair or (less commonly) by audio recording them. In general, we endorse such monitoring mechanisms as they can act to protect candidates and examiners from bad practice; so don't be alarmed if they operate at the institutions where you examine. Our research on the use of independent chairs and audio recording at Lancaster University revealed that these monitoring mechanisms are usually regarded as useful by examiners.[23]

Checklist - questions about conduct that you should address in the pre-viva meeting
1. Is there a lead, or 'senior', examiner?
2. Will one of you serve as chair and what will this entail?
3. Who will introduce the participants, and the structure of the viva to the candidate?
4. Who will introduce the purposes of the viva to the candidate and what will they say?
5. Is it appropriate to release the examiners' provisional decision at the start of the viva? Who will do this? What will they say? (See later)
6. Is one of you responsible for student support and, if so, what will this entail?
7. What positive feedback will you provide at the beginning?
8. If there is going to be advanced developmental discussion, will the shift from examination purposes be signalled clearly to the candidate so that they know they are not being assessed on this aspect of the viva discussion?
9. Who can attend the viva and in what capacities? You need to be clear about the institution's rules concerning viva attendance so that you know what to expect from other attendees and what you are entitled to request of them. For example, if supervisors can participate in viva discussions it is helpful to know this before it begins.
10. How long should this viva last? If the viva is likely to exceed two hours, you may want to include a break in the proceedings.
11. How will you behave towards the candidate in the viva and what type of examining style will you employ? The answer to this question may be linked to the purposes that you think are important such as ritual purposes (celebratory or challenging), the assessment of the candidate's oral skills, and/or a test of the candidate's ability to manage certain types of academic exchange. Not all types of academic conduct and examining style are appropriate in a viva and some institutions prohibit certain behaviour, for instance, 'aggressive' questioning styles.

[23] Carolyn Jackson and Penny Tinkler, 'Examining Doctorates'. Paper presented at the SRHE Postgraduate Studies Issues Network, October 2005.

12. If the viva is audio recorded, decide who will operate the equipment and check that it works.

Investigating extenuating circumstances

When examining a PhD thesis that is borderline or very weak it may be appropriate to investigate why the thesis is of a low standard. Extenuating circumstances are not, in themselves, justification for awarding a PhD. However, you can take account of some extenuating circumstances when you make recommendations for further work. BPS/UCoSDA[24] identify four factors that examiners may need to consider before preparing their final report and recommendation: a) the personal circumstances of the candidate; b) the candidate's access to research facilities; c) supervision; d) factors related to research procedures. In order to address these factors you may need to talk to the candidate in private during the viva; some institutions expect examiners to do this as a matter of course. A number of institutions require the supervisor to notify the examiners before the viva of any extenuating circumstances, and/or they expect the supervisor to be available on the day of the viva to answer examiners' questions. If you are concerned about a candidate's work you should check on investigation procedures at the appointing institution and, if necessary, ensure that you speak to appropriate people (for example, the supervisor) before preparing your post-viva report.

Post-viva business to consider in the pre-viva meeting

Two main post-viva matters must be addressed at the pre-viva meeting. First, you need to agree how you will tackle the post-viva paperwork, usually a joint report and recommendation of award. Second, consider whether you will attend, or initiate, a post-viva celebration (if appropriate).

In the viva: first impressions

Room and layout

Ideally, the viva venue should be an office or small meeting or teaching room. Ensure that the seating is arranged to promote communication. There should also be enough table space for at least three copies of the thesis, notes, water and so on. In cases where the supervisor can attend, even other observers, it is important to ensure that they will not distract the candidate or examiners. Although supervisors are often present to provide silent support for their student, their views can be proclaimed loudly through body language: 'If the supervisor is present it can be difficult to cope with their body language even if they are not permitted to speak. Position the seating so that neither the examiners nor the candidate are facing the supervisor.' (Senior Lecturer, Education)

Check list – room and layout

- Sufficient seating and table space
- Clock/watch
- Fresh water and glasses
- Adequate ventilation/heating
- Minimise outside noise
- Tissues
- Your notes and other examination paperwork
- Paper and pen/pencil
- 'Do Not Disturb' sign on the door

[24] BPS/UCoSDA, OP Cit, p.17.

- Phone unplugged
- Mobile phones switched off
- If required, turn on the audio recorder

Introductions

His opening gambit was 'It's OK. We need to ask you a few questions. Oh, and by the way, I find your writing style really irritating'. (Douglas, Sociology)

The first stage of the viva involves introducing the candidate and yourselves. Often, the candidate will already know the internal examiner. Whilst this can be reassuring, the candidate is not used to meeting this person in the role of examiner: 'Make sure that the candidate knows how you will expect them to address the examiners, including yourself, in the viva. If you are the internal examiner they may be used to using your first name to address you but be unsure in this special context.' (Reader, Psychology) If you do not already know the candidate it is also good practice to check how they want to be addressed.

The second stage of introductions involves explaining the format and purposes of the viva to the candidate. It is of utmost importance that the purposes of the viva are made clear to the candidate. For example, if you think that the thesis is a pass but that there are some confused sections that need rewriting, you might tell the candidate that principally you want to establish that the thesis is their own work, but that there are a few sections of the thesis that need clarification and you would like to discuss these in detail. You might then say that once you have discussed these aspects of the thesis you will move on to consider the thesis in its broader context and discuss future possibilities.

Checklist: points to cover in the introduction

- Introduce the candidate, examiners and anyone else involved in the examination.
- Purposes of the viva – introduce and explain.
- Format and organisation – clarify who will chair the viva, how you will approach the examination, the organisation of the questions.
- Duration of the viva (approximate).
- Notify candidate that they can request a break if appropriate.

Should you release a provisional decision?

Many academics believe that informing the candidate of their decision at the start of the viva enables the candidate to relax and make the most of the viva.

> If both examiners are agreed before the viva that the thesis should pass, it seems absolutely right to tell the candidate at the start of the viva, in the hope that they will then be able to enjoy and benefit from the occasion more than they otherwise would. If a thesis is almost certainly going to be referred but the candidate could redeem the situation in the viva, it seems fair to indicate this too, but it needs to be done in a sensitive way. (Professor, History)

A key problem with informing the candidate about your provisional decision at the outset is that, whatever the standard of the thesis, the viva should serve as a site for checking that the candidate is the author of the work. If you commence by telling the candidate that s/he has passed, but then become doubtful as the viva progresses that the work for the thesis was actually conducted by the candidate, you would be placed in a very difficult position. For this

reason, it is risky for an examiner to declare unreservedly at the start of a viva that a candidate has passed.

Examiners have devised ways round this problem, particularly for strong candidates.

> An examiner of one of my own recent candidates said at the beginning of the viva: 'Unless you give me reason to believe that you did not write this thesis or conduct this research on your own, there is NOTHING you can say in this viva that will cause you to FAIL your PhD. My student relaxed immediately and I thought it was a great way to start!' (Reader, Psychology)

If you do not release your provisional decision at the start of the viva remember that candidates are often uncertain about how to interpret this and may read it as a bad sign. To avoid unnecessary anxiety, BPS/UCoSDA[25] advise that '[a]t the outset of the examination the candidate should be explicitly told by the chair that no information about outcomes will be provided until the end of the examination, and that no conclusions should be drawn from this.'

Differences in practice, particularly *within* institutions, can be confusing for candidates and may lead to unnecessary anxiety. This seems to be an area that requires clearer institutional management. In our opinions, there are 2 main ways of doing this. First, universities can adopt explicit policies prohibiting examiners from releasing a provisional recommendation until after the viva (as some already do). In such cases, mechanisms need to be in place to ensure that this policy is translated into practice. The candidate would also need to be informed of this policy at the start of the viva. The second model requires that the examiners outline to the candidate their views on the thesis at the start of the viva, as the assessment of the thesis per se has been completed. It is made clear, however, that the assessment of the thesis is *only the first stage of a two-stage examination process*, and so the outcome/recommendation is by no means decided at this point. In all cases the viva must still serve to authenticate the thesis and meet other criteria specified by the institution and the examiners. The principle at the heart of this second model that differentiates it from much current practice is the clear statement that the examiners' evaluations of the thesis are *not* synonymous with the outcome of the examination because the viva also plays a role in the assessment. In our view, both models represent good practice.

In the viva: a productive exchange

Opening Questions

Making the candidate feel at ease is one of the first challenges for examiners in the viva. Some institutions specify that examiners should do this, although there is usually no guidance as to how. Examiners usually approach this task in a manner similar to interviewers, they try to find a gentle question.

> … very important to get the candidate to relax; some questions only loosely related to the thesis are helpful and then some questions about the reasons for the choice of topic. If appropriate, stress that the thesis was interesting or enjoyable to read.'(Professor, Education)

[25] BPS/UCoSDA, OP Cit, p.13.

Content questions - examination and developmental purposes
The main point of asking questions in a viva is to elicit information from the candidate. The type of question you use will depend on:

- your purpose or objective – clarification, to check understanding, to prompt a justification or defence, to explore capacity for making links, to elicit evaluation;
- how tightly you want to control what is talked about - this can range from the very specific to the very broad;
- how much information you want or how deeply you want to pursue a point.

The purposes you have identified for the viva should determine the viva content. For instance, if the thesis is fairly good but has some areas of weakness, likely purposes would be to authenticate, to check understanding, clarify obscurities/areas of weakness, assess ability to locate research in broader context and allow the candidate to defend the thesis. Aside from these examination purposes you will probably want to pursue at least one developmental purpose, in this case, ways in which the thesis can be raised to PhD standard.

Different types of questions are suitable for these various purposes – an inappropriate type of question will close down, rather than open up, the scope for the candidate to respond in relevant and constructive ways. Therefore, it is useful in advance of the viva to think about the purposes of your particular questions and ensure that the questions you have in mind are fit for these purposes.

You will probably need, or want, to ask some searching, 'deep' questions in the viva. Our research suggests that most candidates (even those who are subsequently referred) want to discuss their work in detail with the examiners and to learn from the exchange. They often relish probing, challenging questions and, if successful, they want to feel that they have proved themselves in the viva. Searching questions, used in the right way, are perceived as: an indication of the examiners' interest in, and engagement with, the candidate's work; an opportunity for the candidate to demonstrate intellectual competencies; a test befitting the award of a PhD; a means to develop and/or expand thinking and knowledge. Vivas that lack opportunities to explore the thesis in depth are frequently viewed by candidates as 'superficial' and 'disappointing'. Having said this, unrelenting probing can be very stressful for the candidate and interpreted as an indication of serious problems unless the conduct of the exchange is managed in ways that are affirming and which allow a shift in intensity. It is to the conduct of the viva that we now turn our attentions.

Conduct – promoting a productive exchange
Examiners are often preoccupied with asking questions about the thesis and exploring the candidate's knowledge, this can be at the expense of attending to the conduct of the viva. Viva conduct is, however, of considerable importance for how candidates feel during the viva and has implications for how well they respond to your questions. The conduct of the viva exchange also shapes the candidate's post-viva perceptions of their viva performance, their PhD and themselves. It is good practice to promote a productive exchange in the viva, one that encourages the candidate to perform at their best and to get the most out of the viva, irrespective of the standard of the thesis.

There are five main ways in which you can promote a productive exchange:

1. provide positive feedback on the thesis and the candidate's comments
   Comments about the strengths of the work are particularly important at the beginning of the viva exchange, even if followed by an indication that further work is required.

Positive comments are also a useful way of signalling that a series of very demanding and probing questions are not a sign of a fail, or an attempt by the examiners to demolish the thesis.

2. show interest in, and engagement with, the candidate's thesis;
3. actively listen to what the candidate has to say in the viva;
4. ask questions that can be answered;

   It is vital that questions make sense and are answerable. The use of multiple-part questions, or a series of questions strung together as one, is not good practice. These questions are confusing and difficult to answer. Leading questions can also close down communication because it is unclear to the candidate how they should respond.
5. avoid an aggressive or hostile tone when asking questions.

   Achieving the right tone is important because candidates use it as an indicator of your assessment of them and their thesis. Although some academics subscribe to the view that the viva should test the candidate's ability to survive an onslaught of aggressive questions and put-downs, this is not good practice. Although candidates in our research were often in favour of probing and demanding questions and discussion, no one wanted the tone of the viva to be aggressive and hostile. Successful candidates who had been exposed to this type of exchange reported negative feelings about themselves, their work and academia as a result of this experience.

At the end of the viva

Once the viva is over, you and your co-examiner(s) should be left in private to discuss your recommendation. However, before asking the candidate, and any other observers, to leave the room it is advisable to explain what you are doing. Candidates can, if uninformed, be very worried by a request to leave the room. In general, the recommendations open to you include: a) award forthwith with no corrections; b) award subject to minor corrections; c) refer (revise and resubmit, with or without a second viva); d) no award, or award of a lower degree. However, these categories do vary between institutions, as do the guidelines about what can be included in each category. As such, it is very important to read each institution's policy carefully.

Difficult decisions

There are always going to be 'marginal' cases and in these circumstances a decision about an award can easily go either way.

> There's always these marginal calls … Sometimes you think, well it's a fairly slender research base and ideally they could have done a lot more, but you can see why they didn't and you can't really say 'well go and do another year's work'. So you make a kind of judgement call. Those things in my experience get discussed very… seriously, and they [the examiners] reach credible judgements and outcomes, but the decision could often go the other way. (Professor, Government)

Pressure to make a particular recommendation is not usually brought to bear by the candidate but by their supervisor and/or other advocate, sometimes the internal examiner. Whilst acknowledging that there is a 'spectrum of quality' in PhDs, and that candidate's circumstances vary, examiners need to feel that their final decision has been fair. This is a point that was repeatedly referred to by experienced examiners from across the disciplines. As one examiner told us, 'don't allow pressure from the internal institution to force you to pass an inadequate thesis – it will stay on the shelves to haunt you'.

If you feel that the candidate has extenuating circumstances, for example they have been poorly supervised, this should not influence your recommendation of award. You can, however, investigate these circumstances and suggest in your report that they be taken in to account if further work on the thesis is required.

Feedback to candidate

If you and your co-examiner are able to agree on a recommendation it is then necessary to decide what you will say to the candidate; note that at some institutions examiners are not required to release their recommendation to the candidate, this can be handled solely through formal channels. If you tell the candidate your decision, remember to point out to them that technically it is only a recommendation until formally ratified by an appropriate university committee. We are aware of one instance where a university committee did not accept the examiners' recommendation of 'pass subject to minor corrections', because the examiners' pre- and post-viva reports listed corrections that were deemed to constitute 'major' corrections.

In cases where further work of any kind is required it is usual to outline this to the candidate; specific details can be provided later in a written report. It is essential that you agree with your co-examiner the corrections that are required to raise the thesis to the appropriate standard and to detail these in the post-viva report. It is important to be very clear about the corrections you require because the candidate's revised or resubmitted thesis will be judged against these.

Ideally, you should finalise post-viva paperwork on the day of the viva, although this is not always possible. If the candidate needs to do further work to the thesis it is usually left to the internal examiner or an administrator to liaise with the candidate, often via the candidate's supervisor. External examiners should not usually engage in dialogue or correspondence directly with the candidate or offer this. In cases where the internal examiner takes responsibility for liaising with the candidate over corrections, it is vital that this remains relatively formal.

Long-term responsibilities

Don't forget that your relationship with the candidate does not necessarily end once the examination business is completed. Writing references is frequently one of the 'unacknowledged consequences' of agreeing to examine a PhD,[26] or as Delamont et al explain: 'An external isn't just for the examination – he or she can be a patron, referee and gatekeeper for life.'[27]

[26] Lynne Pearce (2005) *How to Examine a Thesis.* Maidenhead: SRHE/OUP, p.108.
[27] Delamont et al (1997) *Supervising the PhD: a guide to success.* Buckingham: SRHE/OUP, p.144.

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British Psychological Society and The Universities and Colleges' Staff Development Unit (BPS/UCoSDA) (1995) *Guidelines for Assessment of the PhD in Psychology and Related Disciplines*. Sheffield: UCoSDA.

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Quality Assurance Agency (2004) Code of practice for the assurance of academic quality and standards in higher education. http://www.qaa.ac.uk/academicinfrastructure/codeOfPractice/default.asp

Research Councils' Training Requirements http://www.grad.ac.uk/cms/ShowPage/Home_page/Policy/National_policy/Research_Councils_training_requirements/p!eaLXeFl

Royal Society of Chemists *The Chemistry PhD – the Enhancement of its Quality*, http://www.chemsoc.org/networks/learnnet/Chem_PhD.htm

Useful websites (general)

Higher Education Funding Council for England (HEFCE) www.hefce.ac.uk

Society for Research into Higher Education (SRHE), especially the Postgraduate Issues Network – www.srhe.ac.uk

QAA – www.qaa.ac.uk

UK GRAD – www.grad.ac.uk
UK Council for Graduate Education (UKCGE) – www.ukcge.ac.uk

Box 1

Criteria for assessing the written thesis in the social sciences
Dr Pam Denicolo, Director of the Social Sciences Graduate School, University of Reading[28].

After many years of supervising and examining PhD theses using few, and rather generalised, guidelines, I responded to requests from students and colleagues training to be supervisors to put my implicit knowledge down on paper. The first draft was distributed to a range of experienced colleagues who added to and amended it, the results can be found below. They are summarised as attributes examiners look for in a thesis.

OVERALL

- careful, clear presentation that has the reader's needs in mind;
- if necessary, or helpful, a glossary of terms and/or acronyms preceding the main text and succeeding the Contents list;
- the contribution to knowledge expected and achieved should be made explicit;
- each chapter should be coherent in itself and contribute to an integrated whole; all parts of the thesis should contribute explicitly to the 'story line'.

SECTIONAL ATTRIBUTES

Introduction

- rationale for study clearly explicated;
- the appropriateness of this researcher conducting this study made clear;
- brief overview of thesis provided, clear outline of the 'story line'.

Review of relevant literature

- succinct, penetrating, challenging, critical, analytical approach;
- demonstrates thorough knowledge of field;
- primary rather than secondary sources used;
- quotations used to illustrate and exemplify rather than substitute for own words in argument (page numbers required).

Statement of research problems

- clear and succinct hypotheses or questions derived from/revealed by the literature review;
- should have a novel theoretical or methodological slant and/or bring together previously unrelated fields and/or a new area of application;
- well articulated rationale for 'worthwhileness' of research.

Approach and methods of enquiry adopted (theoretical argument)

- rationale of general approach closely argued giving reasoned case for rejecting other possible approaches;
- justification of research design presented, taking account of potential advantages and limitations;
- research techniques argued as theoretically and practically relevant to research problem; reasons given for rejection of possible alternatives; rationale provided for amendments to standard tests and procedures or for detailed design of innovative techniques.

[28] Reproduced with permission, from Tinkler and Jackson (2004) Op Cit, pp.114-116. We are grateful to Open University Press for permission to reproduce this Box.

Fieldwork/labwork (description of actual process)

- clearly set out and easy to follow;
- relevant details included (number of subjects/respondents, relevant profiles, timing of interventions, duration of interventions, etc);
- information about the difficulties encountered and how they were dealt with so that the research was not compromised.

Analysis of data

- mode of analysis theoretically justified;
- any assumptions stated and justified;
- congruent with research questions/hypotheses and approach adopted;
- details of procedure clearly presented.

Presentation of data

- clearly structured;
- data 'trail' evident;
- details of why, who, what, when and where provided;
- tables, figures, diagrams to summarise all data clearly numbered and titled and referred to in the text.

Discussion of outcomes

- main points summarised and evaluated, interpretations made of raw data;
- links made to literature previously presented, eg what previous research/theory has been supported, substantiated, challenged, amended, rejected, etc;
- reflections on the research process – limitations addressed and consequent implications for results;
- suggestions for repeat or further research based on this research;
- implications of results for theory and practice.

Clear articulation of contribution to knowledge

- Some examiners like to see a final section or post-script that discusses what the researcher has learnt from the process of the research.

Reference list or bibliography

- all references in text included with no additions;
- any seminal or influential texts not referred to in text listed separately.

Appendices

- referred to in text and clearly numbered in order of presentation in text.