

Good Practice Principles for Graduate Schools in the Netherlands



Hans Sonneveld - Hannerieke van der Boom - Paul van Dijk – Linda Martens –
Inge van der Weijden

Netherlands Centre of Expertise for Doctoral Education

October 2021. Version 1.0

Contents

1. Introduction	3
2. The PhD programme: key figures and key moments	5
3. The Graduate School supports (future) PhD candidates in developing a PhD research project	6
4. The Graduate School takes care of a diligent admission and selection procedure	7
5. The Graduate School clarifies the expectations towards PhD candidates	10
6. The Graduate School gives special attention to external PhD candidates and the preparation of their PhD programme	13
7. The Graduate School pays special attention to international PhD candidates	16
8. The Graduate School informs PhD candidates about different aspects of obtaining a PhD	18
9. The Graduate School offers a course programme that ties in with the PhD research topic but also broadens knowledge	19
10. The Graduate School contributes to proper planning of the PhD process	20
11. The Graduate School supports PhD candidates in getting a grip on the thesis criteria	21
12. Coordinators of the PhD programmes hold annual progress meetings with the PhD candidates	23
13. The Graduate School evaluates the progress of the candidates at the end of the 1st, 2nd, and 3rd year	24
14. The Graduate School supports the PhD candidates in their preparation of their post-PhD careers	26
15. The Graduate School supports supervisors in their working with the PhD candidates	27
16. The Graduate School formulates the core elements of the supervision	29
17. The Graduate School offers support in raising and solving PhD candidates' problems	30
18. The Graduate School's coordinator has an exit interview with each PhD candidate whose PhD project comes to an end	32
19. The Graduate School pays extra attention to chronic exceeding of the time available for the PhD project	33
20. The Graduate School provides adequate work facilities, including workspace and finances for following and providing education and conference attendance	34
21. The Graduate School periodically conducts research among PhD candidates and supervisors into the qualities of the PhD programme and points for improvement	35
22. Graduate School and PhD programme are evaluated periodically	38
About the Authors	40

1. Introduction

Numerous Dutch Graduate Schools have taken important steps in the professionalization of doctoral degrees. However, there is a lack of a regular exchange of ideas and their easy accessibility for colleagues. With this in mind, we will open a Good Practices Principles section on the website of our Netherlands Centre of Expertise for Doctoral Education (NECPO, phdcentre.eu). This report lays the foundation for this.

A new PhD system has existed in the Netherlands for about thirty years now and the research schools and Graduate Schools involved have taken many steps in the development of numerous principles and good practices. The good practices of the Dutch Graduate Schools cover all aspects of the PhD programme. They have also proven to be flexible and innovative. We are now ready for the next phase. In this, we are inspired by our colleagues from the Australian Council of Graduate Research, who took a similar initiative. The Australian Council not only reports good practices but also takes a normative step by speaking of 'principles'. Standing on their shoulders, we will go a step further.

We have reached the point where we can jointly formulate the requirements that a Graduate School must meet. This is a bold and unusual step for the Netherlands. The autonomy of the Graduate Schools and the universities to which they belong is virtually sacred. Everything that comes close to harmonisation makes us wince and is met with resistance. A good example is the development of a questionnaire for a national survey among PhD candidates. While many universities have already organized such a survey in-house in an admirable way, a paralysis arises when, in a collegial consultation, Graduate School specialists try to develop a survey based on all experiences to be carried out on a national scale. Nevertheless, the good news is that persistent colleagues succeeded in launching a first National PhD Survey in the first half of 2021!

The Netherlands Centre of Expertise for Doctoral Education is now taking a bold step. Based on inspiring Dutch practices, we have formulated 19 core principles that a Graduate School must comply with. Mind you, all these principles have been developed in the field and have proven their value locally.

We have another goal in mind. Reviewers who periodically scrutinize research units and the adjacent programs for their PhD candidates, Graduate Schools, or research schools will be offered a point of reference by means of these Good Practice Principles in connection with the formal Strategy Evaluation Protocol 2021-2027 developed by VSNU, KNAW and NWO. Through this practice-based document, they get a good picture of the situation in the Dutch PhD programmes and can use it to evaluate the Graduate School they are reviewing against a yardstick that is not unrelated to the Dutch situation.

Our contribution can also be read in conjunction with the cautious steps that the joint Dutch universities have taken towards "Healthy Working Conditions in the Dutch PhD System".¹ The reader will see that our principles overlap here and there with the topics from the VSNU (Associations of Universities in the Netherlands) document. We will add quite a few principles and work them out in detail.

This document is not the final version. Readers will determine that we have missed important good practices. They will be able to report other variants in certain areas. They will disagree on certain aspects or will know better. We have already taken this freedom ourselves. Sometimes we came across a good practice that, in our opinion, fell short on a specific part. We have introduced this good practice but have corrected it on a certain aspect. An example of this is the statement that external PhD candidates must at least have one day per week to work on their theses. Of course, that must be 2.5 days, evenings included.

We conclude this introduction with a premise. Every good practice presupposes action and initiative on the part of the PhD candidate and is of direct use to the PhD program. However, in no part is it assumed that the PhD candidate has the knowledge and skills from the start to successfully complete his or her PhD program. This can

¹ VSNU (2018) *Een gezonde praktijk in het Nederlandse promotiestelsel*. This document focuses on the following aspects of the doctoral situation: Tightening of the categorization of "types of PhD students" – Regulations as regards the registration and start date of a doctoral programme - Embedding of PhD students in a community of PhD students - Training and Supervision – Review procedures concerning the thesis.

differ per candidate. For example, those who followed a Research Master's programme in the same department they are currently doing their PhD research and already worked with their thesis supervisor will have a tighter grip on the implicit rules of the game. Those who come from outside or attended a local Master's programme without substantial research components must be supported by the Graduate School: Making the Implicit Explicit (Lovitts 2007)². Various good practice principles, therefore, also aim to check whether the issue in question is under control or whether there is work to be done. We already know that, in some areas, this is the case for all starting PhD candidates. It is a global phenomenon that PhD candidates are of the opinion that they are not well supported in the planning and management of their projects. A starting point for these good practices is that we do not assume that they will solve this by themselves.

We look forward to your own caveats. This is a living document in constant development. But if you want to evaluate your own Graduate School practices, start with these principles.

Netherlands Centre of Expertise for Doctoral Education, October 2021

Reader's guide:

Each good principle has three specification levels. First, you will find the good practice principle, formulated in its most comprehensive way. Second, in many cases you will find specifications of the leading principle. Third, we have taken the space for further elaboration, often based on available and concrete good practices.

² Lovitts, B.E. (2007) . *Making the Implicit Explicit. Creating performance expectations for the dissertation.* Sterling Virginia: Stylus Publishing.

2. The PhD programme: key figures and key moments

- **Intake minimum**

In view of a viable PhD programme – think of the critical mass needed for the courses - an intake of at least 10 PhD candidates per year per Graduate School is expedient.

- **Success rate**

A minimum success rate of 75% per entering cohort of full-time PhD candidates.

- **Time to degree, duration**

On average, handing in the thesis does not exceed 6 months as compared to the duration of the programme agreed at the start. For example, in the case of a four-year process, it is acceptable if the thesis is submitted for assessment no later than the 54th month.

- **Number of supervisors**

Supervision by at least two supervisors, and preferably not more than 4.

- **Number of PhD candidates per primary supervisor (i.e., *promotor*)**

Depending on the research unit and distribution of PhD candidates over staff members (e.g. assistant and associate professors, senior researchers) in the department and depending on the qualities of the primary supervisor, the Graduate School adopts regulations regarding the number of PhD candidates per primary supervisor.

- **Progress assessments**

There are three progress assessments and an exit interview.

- **Go/no-go decision**

The first of the three progress assessments has the character of a go/no go decision.

- **Study load**

The training programme for full time PhD candidates has a study load of 20–30 credits (ECTS). The training programme entails the entire range of developmental activities like courses, workshops, training courses, seminars, journal clubs, retreats, conference papers or posters, attending courses in teaching, and career-oriented activities.

Contact and support

The Graduate School should have contact persons in place to support and inform PhD candidates, such as a graduate school / PhD coordinator, confidential advisor/person of trust, and/or ombudsperson. This facility can be shared with other Graduate Schools or the larger organisation.

3. The Graduate School supports (future) PhD candidates in developing a PhD research project

Graduate Schools may decide to offer future or current PhD candidates support in writing a PhD research proposal or in the appropriation of a project developed earlier by, for example, their supervisors.

In this respect, the Graduate School can offer a course as part of a Research Master's programme, or the first year of the PhD programme. We consider this part of the Good Practice Principles to be optional. PhD candidates can benefit from this kind of support, but there are more paths that lead to workable PhD project.

An advantage of such a course is that a lot of work can be taken off the hands of (future) supervisors. Searching for important literature, writing the literature review, planning a research project, and getting a grip on the requirements for a thesis can be efficiently transferred into the course context. This does not mean that the individual (prospective) supervisors do not play an important role in this. When it comes to the specific direction and content of the research, including choices regarding the data collection, methods used, and other necessary choices and constraints, the supervisors are of course the first discussion partners for the (prospective) PhD candidates. Agreement reached by mutual discussion and expression of expectations is essential for a good start of the PhD project.

The PhD candidates should acquire skills, through personal guidance or a course, with regards to:

- the formulation of a research proposal, including a hypothesis or research questions and sub questions;
- the development of a solid research design, including a realistic and feasible planning within the constraints of the contract period;
- the research skills for their development into an independent researcher, as well as into an academic professional;
- the formulation of a research proposal;
- an introduction to be able to choose between different research strategies and methodologies of data collection;
- how to manage themselves and their supervisor(s) (i.e., self-management, time-management, project-management, planning, and communication skills);
- their ability to critically reflect on their own writing and assess the scientific quality of scholarly publications;
- how to ask for and provide feedback on their performance and that of their supervisors and on the process of the PhD project in a respectful way; and
- how to manage themselves and their supervisor(s).

Topics of specific sessions (in case of a course format, mostly the case within a Research Master context) could be:

- in search of a research topic;
- interviewing experts and planning the project;
- the format of a PhD proposal;
- searching for important literature;
- theory, hypothesis, and claim;
- originality;
- from topic to question; and
- research design.

4. The Graduate School takes care of a diligent admission and selection procedure³

In this part, the core principles of a diligent admission procedure are mentioned, building on good practices and expertise that have already been developed in Graduate Schools. Principles of transparency, equal chances and treatment of candidates, and open procedures are key, as well as safeguarding and assessing the availability of expertise as regards topic content and methodology. Procedures should be aimed at providing optimal conditions for transparent selection criteria, slowing down in case of haste or doubt, aiming at a flying start for the candidate, consultation of colleagues who worked with the candidate, meeting the candidate in real life.

- **Inventory of best departmental practices**

Experienced supervisors have collected much knowledge about the best way to select candidates. The biggest mistake a Graduate School can make is to assume that a 'selection policy' must be built from scratch. Every Graduate School should realize that experienced colleagues have developed a successful selection style and have laid down their own selection principles. In some cases, also Human Resource Departments have proven to play an important role in this respect.

- **Equal treatment of candidates**

The Graduate School needs to guarantee that candidates for PhD positions can count on a comparable and careful treatment, in whatever unit of the organization. Decreeing selection principles and the exchange of best practices is essential.

- **Open procedure or finding other ways to avoid 'easy admission'**

As a rule, the selection procedure is based on the principle of an open procedure with equal chances. We advise against taking big risks by just accepting a candidate for a PhD project without comparison with other candidates. However, comparison is not always an option if a possible candidate brings his or her own scholarship. The golden rule remains that a candidate must be scrutinised and selected based on his or her merit, motivation, suitability for the project, and match with the supervisors. The Graduate School should always consider whether the candidate fits the above-mentioned golden rules and will not be accepted just 'because the money is available'.

- **Safeguarding the availability of topic and methodological expertise in the supervision team, consisting of members of one department or several ones**

Easy admission is a risk if external candidates are turning to us with their own financial means, for example a governmental scholarship. We could be tempted to accept the candidate, even if we are not completely sure whether the necessary substantial expertise is available in our research group. The primary supervisor must be an expert in the field and the supervision team must be composed as such that content as well as methodological expertise is safeguarded. The Doctorate Board (or the Dean, scientific director, admission

³ Source: *Selection & admission of doctoral candidates. Manual for doctoral programs, Graduate and research schools* (Sonneveld 2016). <http://www.phdcentre.eu/inhoud/uploads/2018/02/Selectie26416.pdf>

committee, etc.) must verify that the topic matches the expertise of the supervisor(s) and that the topic (and therefore the candidate) is not too isolated from the other research activities within the department.

- **Creating transparency with respect to criteria**

We list criteria that need to be included in the standard repertoire of every selection committee. These are not the same as those used in assessing the progress of an accepted candidate!

- **Slowing down in case of haste and doubt**

Sometimes, selection committees function under time pressure. An external party has put financial means at our disposal. The research group works with international partners and must observe deadlines. These can be circumstances giving the selection committee a sense of urgency. A sense of urgency together with a lack of adequate candidates is a recipe for stopgap appointments. However, unfortunately, it is not always possible to take time in projects with strict deadlines. Together with its partners, a Graduate School should make EU projects more flexible to find the right persons. In the dynamics of EU consortia, deadlines are often exceeded in the preparatory phase, and that often leaves less time for PhD recruitment. Project partners should be aware of that and can at least be part of the solution.

- **Aiming at a flying start**

During the selection process, a candidate should be able to present a thoughtful set of research ideas, preferably in the format of a research proposal. Or, in the case of a project developed by staff members, to comment in detail on the strengths and weaknesses of that plan. The process of the internalization of the project should have started before the start of the doctoral trajectory.

- **Considering prior experiences with the candidate**

A good way to get to know a candidate is to consult colleagues or other referees who had gained experience with him or her in earlier situations.

- **Meeting the candidate prior to the final decision**

In the first round of an admission procedure, candidates may be interviewed online. When we have almost arrived at a final decision, a meeting with the potential candidate is essential. If a candidate is not prepared to travel for an in-depth discussion of his or her candidature, the candidate's motivation may be doubtful. If possible, provide the candidate with financial support to make this meeting possible. Of course, we must adapt to specific COVID measures, but only in such extreme circumstances.

- **Seeking different perspectives on the candidate**

Instead of meeting the candidate with the plenary committee, it is valuable to organize meetings with the candidate in consecutive, one-on-one meetings. The committee will get a richer picture of the candidate.

- **Golden rule: Seeing the candidate work**

If it is at all possible, the committee should see the candidate in action in relation to the project or the project proposed by the candidate. In the first instance, consider asking the candidate to write a research proposal or comment on a research idea by the research community the future candidate will be part of.

5. The Graduate School clarifies the expectations towards PhD candidates

5.1. The Graduate School makes expectations explicit at a general level, for example on the website or in Graduate School brochures.

An example⁴:

- **Be professional.** Be aware that all supervisors are unique human beings with their strengths and weaknesses. You will need to adjust to certain ways of behaving and, if something bothers you, address it.
- **Be committed.** Be aware that the PhD journey will be lengthy and not always easy and that your initial motivation can be hard to maintain. If things are tough, do not despair. Carry on and talk to your colleagues or supervisors. It is a stage most PhD candidates go through.
- **Be available.** Be aware that the success of your project is a joint responsibility. Be aware that it is your PhD project, and it is also your responsibility to arrange meetings with your supervisor. Be well prepared when meeting with your supervisor and ensure that your supervisor can also be prepared by sending him or her your material well in time to be read. Make sure that you get the time you need from your supervisor while being aware of his/her time constraints.
- **Be consistent and clear.** Be aware that being honest about your progress and your expectations is key to the success of your project. Use wisdom and tact to address possible issues. Be clear and honest about your research progress and struggles. For instance, prepare the meeting with your supervisor by sending him/her a list of discussion points beforehand. Use the meeting with your supervisor to clarify your research problems. Make notes of the discussion and what steps to take next.
- **Be time aware.** Be aware that planning is one of the harder things to do in research and that the original plan is almost certainly going to change. Keep track of the time you spend on a particular issue. On a regular basis, discuss this with your supervisor and what steps to take next. Discuss short-term goals with your supervisor and celebrate your successes together.
- **Be willing to receive feedback.** Be aware that receiving feedback is extremely helpful for your progress. Keep in mind that feedback is meant to help you and is not targeted against you as a person. Feedback is needed to advance your project. If it is not forthcoming, ask for it and use the feedback to your best advantage. Do not be afraid to ask for feedback at an early stage, this prevents you and your supervisor from going in separate directions. If you experience the feedback as unhelpful, reflect on it for a while (with others) and discuss it with your supervisor in a professional and inoffensive way. When your supervisor has helped you or has been complimentary, show your appreciation.

⁴ Source: *Golden Rules for PhD Supervision* (Leiden University 2019).
<http://www.phdcentre.eu/inhoud/uploads/2021/08/golden-rules-phd-supervision-1.pdf>

- **Be willing to give feedback.** Be aware that feedback on supervision can always be helpful. Supervising a PhD candidate is a hard job. You can help your supervisors by giving open feedback about their supervision, always with respect and consideration.
- **Be aware of stressors.** Be aware that your life involves more than your work. Manage your stress level and respect your boundaries. Also talk to your colleagues and peers about their struggles with doing research; sharing the same experience helps to manage the difficulties of life as a PhD candidate. Maintain the communication with your supervisor and remember that your supervisor has followed the same path before you and can also help you to put things in perspective.
- **Be future-oriented.** Be aware that you need to think about your career after graduation. There are very few jobs in academia. Take this into account. Most PhD candidates start thinking about their next career step during their 3rd or 4th year, which is (too) late. Spend some dedicated time on this issue already in your 2nd year. Your supervisor, the person who knows you the best professionally, can advise you. The university regularly organises events and courses that can provide you with more information and may even have career counselling options. Work on your network. Let the outside world know who you are. Do not underestimate the time this takes.

5.2. The Graduate School clarifies the expectations at an individual level.

- **Leading principle**

A Training and Supervision Plan is drawn up by every PhD candidate and his or her supervisors at the Graduate School, at the start of the project (usually within 3 months).

- **Brief Description**

The PhD candidate and supervisors must fill in progress forms in the first three years of the PhD programme. Every form fits into the specific stage of the PhD trajectory. By way of the form, the School management also collects information for the PhD Database. The forms illustrate the evaluation practices in three consecutive years.

- **Other options for clarifying expectations**

The Training and Supervision Plan is not the only document in which expectations can be recorded. Other forms and documents are conceivable if the following objectives are met, applicable to all categories of PhD candidates:

- clarifying the rights and duties of PhD candidates;
- clarifying the evaluation criteria with respect to definite research plan;
- planning the evaluation of the supervision;
- agenda setting for meetings between supervisor and PhD candidate with respect to:
 - research planning;
 - educational activities (attending PhD courses, etc.);
 - lecturing duties;
 - discussion of definite research plan (e.g. 8th month paper);
 - publication strategy;

- labour market preparation; and
 - supervision practice.
- checking important managerial and context issues (exemption from Dutch MA exam, utilizing external grant possibilities);
- collecting information for input in PhD Database.

- **Institutional context**

Filling in the forms and the approval procedures belong to the standing practices of the Graduate School. They accompany the continuous care for a well-planned PhD programme.

- **Implementation**

The authorized person regarding the PhD programme/Graduate School (the Dean, academic director, manager, coordinator) informs the PhD candidates about filling in the Training and Supervision Plan (digitally or in hard copy format). Upon providing the requested information, the information is checked on behalf of the Graduate School.

6. The Graduate School gives special attention to external PhD candidates and the preparation of their PhD programme

6.1. The Graduate School supports prospective external PhD candidates in the preparation and implementation of a PhD programme.⁵

- The external PhD candidate may attend a preparatory programme.
- Qualities of this programme:
 - ✓ The prospective PhD candidate is well informed about the conditions for doing a PhD at the Graduate School.
 - ✓ The programme is offered by PhD holders and takes about 6 months.
 - ✓ The programme is completed before a final decision is taken on starting a PhD trajectory.
 - ✓ The programme also includes the introduction to possible supervisors.
 - ✓ The programme includes professional searching for and commenting on relevant literature and writing a literature review (first draft).
 - ✓ The programme provides for writing a PhD proposal.
- The goal of the programme is to gain insight into:
 - ✓ the feasibility and workability of the conditions (in terms of time, work, and private circumstances);
 - ✓ what kind of a candidate we have in front of us: the sure winners, the 'subject grasshoppers' (cannot make a choice), the insecure candidates with potential, the ones who should not start;
 - ✓ how to arrive to a "go" or "no-go" decision for the prospective PhD candidate.
- In case of the absence of a preparatory programme, the prospective supervisors ask the potential candidate to write a PhD proposal.

6.2. The Graduate School ensures a careful consideration regarding the acceptance of external PhD candidates and keeps track of excessive numbers of external PhD candidates. This means that:

- potential supervisors never make acceptance and rejection decisions alone but consult peers or future co-supervisors;
- the Graduate School warns potential supervisors of the temptation that reads 'It costs us nothing, why not take the gamble ...?';
- the Graduate School emphasizes never to accept a prospective PhD candidate if the PhD project is the first independent research experience of the candidate;
- the Graduate School ensures that a PhD programme is never started without a scientifically sound and feasible PhD proposal.

6.3. The Graduate School and supervisors ensure that the candidates meet the following requirements:

- stamina;
- the ability to postpone the experience of a reward;
- the ability to work in isolation;
- the ability to manage⁶ and work with the supervisor;

⁵ These recommendations are inspired by: a) *Guidelines and Expectations External PhD candidates*, Tilburg Law School (update 2020) and b) Hello, E. & Sonneveld, H., *Promotietrajecten van duale en buiten-promovendi*, (Utrecht: Nederlands Centrum voor de Promotieopleiding / IVLOS 2010).

⁶ Cf Phillips, Estelle M. and Derek S. Pugh (2007), *How to get a PhD. A handbook for students and their supervisors*

- the ability to detach themselves from the professional practice that they perhaps make the topic of the PhD project, to avoid an over-practical research design.⁷

6.4. The Graduate School and supervisors clarify the expectations vis à vis the PhD candidates.

External PhD candidates:

- spend at least 16–20 hours a week on their theses⁸;
- draw up a Training and Supervision Plan in consultation with their supervisors. They deliver this to the Graduate School within three months. In this plan agreements are made, among other things, about the frequency, kind and content of the supervision and the requirements regarding the (development of) competences of the PhD candidate. The Training and Supervision Plan is used as the basis for the first-year assessment;
- are integrated in the PhD progress monitoring system, including the go/no-go decision and subsequent 2nd and 3rd annual evaluations; and
- take the initiative for a feedback/contact moment with the supervisor at least six times a year.

6.5. The Graduate School clarifies the expectations vis à vis the PhD supervisors.

PhD supervisors:

- are first or second supervisor of a maximum of PhD candidates, to be specified by the Graduate School. In general, a supervisor can act as daily supervisor ('dagelijks begeleider') of 5 PhD candidates;
- are responsible for a rigorous pre-entry selection. They do this by having a potential external PhD candidate screened by two other senior researchers (not being the intended (co-)supervisors). For more information see principle 4;
- are responsible for checking and complying with the agreements on supervision, as agreed upon in the Training and Supervision Plan;
- have a feedback/contact moment with the external PhD candidate at least six times a year, including the moment for a go/no-go decision;
- must register an external PhD candidate at the Graduate School as soon as the PhD proposal is approved;
- ask management assistants to arrange a Hospitality Agreement for the external PhD candidate so that he or she has access to all facilities as soon as possible;
- guide their external PhD candidates regarding data management and scientific integrity;
- resist the temptation of 'soft' or passive supervision (being complacent, 'just start reading and then we will meet again', or fear of intervening in case of stagnation);
- ensure proper planning of the process and segmentation of the project, e.g. by writing articles and conference papers.

6.6. The Graduate School registers PhD candidates upon their acceptance and the actual start of the PhD project.

In general, Graduate Schools do not have a complete overview of the total PhD population, because external PhD candidates are often not enrolled or registered at the Graduate School until right before they are going to

⁷ For example, one can think of managers, lawyers or educationalists who are eager to solve concrete practical problems while neglecting deeper causes of the problem or other formulations of the problem.

⁸ On average, external PhD candidates will take about 6–7 years to complete their PhD process. If starting external candidates are at the very beginning of their PhD research, one day a week for working on the thesis does not create workable conditions. Assume 2½ days a week for these starters. Always pay attention to their ability to combine PhD research and, for example, private circumstances, professional activities, and support from close by. Of course, the amount of time required depends on the stage of the PhD candidate. Those who have worked independently on the research for a long time, or who are able to combine professional work and research for example, are probably able to deal with a different time perspective.

defend their theses. This is detrimental to the Graduate School as there is a lack of information for business operations and prognoses. This is also detrimental to the external PhD candidates themselves since the already highly dependent relationship that this target group has with their supervisors is strengthened when they are excluded from support from the Graduate School. Ideally, all PhD candidates are registered from the start or at least two years before their thesis defense date.

6.7. The Graduate School and supervisors provide a tailor-made training programme.

- Updating knowledge is central, especially required regarding study techniques (think of search methods for literature study), research methodologies and techniques, and the relationship between the subject and the scientific literature on it.
- Offer the external PhD candidate a tailor-made individual training programme to be laid down in the Training & Supervision Plan. Allow for exemptions vis à vis the full regular course programme (20-30 EC in the Netherlands) based on previously acquired competences. This is certainly relevant if the external PhD candidate can rely on previous research experience and scientific publications.
- Research integrity and data management courses are mandatory for all, also for external, PhD candidates.

6.8. The Graduate School clarifies what external PhD candidates and their supervisors may expect from the Graduate School

- ensures that every external PhD candidate has at least two supervisors;
- checks that every external PhD candidate has a hospitality declaration and, thus, has access to the necessary university and/or faculty facilities;
- offers external PhD candidates a contact person besides the supervision team;
- gives external PhD candidates access to its available courses;
- provides useful information to external PhD candidates. This will consist of an informative welcome e-mail, newsletters, participation in an introductory workshop, and intake interview at the Graduate School (online option).

7. The Graduate School pays special attention to international PhD candidates

Graduate Schools make the ‘landing’ of international PhD candidates much easier by offering an introduction that facilitates the PhD candidates’ grip on the PhD process and introduces them to a new academic world.

International PhD candidates are going through a sweeping transition from their local educational and research cultures to a Dutch PhD programme. We may not presume that they know the implicit and explicit of the local rules of the game.

There are various organizational variants for this introduction. A Graduate School can offer a special programme for international PhD candidates or integrate this introduction into a programme for all starting PhD candidates. Of course, the written information is also important, but that will not be sufficient.

An overview must be available of possible introduction objectives that ease the adjustment process for the benefit of arriving candidates.

The landing programme will entail:

- explaining the ins and outs of the Dutch PhD system⁹;
- the preparation of PhD progress evaluations;
- complying with the requirement of writing an elaborated version of the PhD research proposal (if applicable);
- finishing a thesis in time: the importance of a sound planning;
- becoming an independent scientist;
- making the implicit explicit: getting a grip on the thesis standards in the discipline;
- clarifying expectations between PhD candidates and supervisors;
- creating proper sound research facilities;
- the integration of a PhD candidate in a research community;
- instructions on how to manage PhD supervisors and supervision teams;
- recognizing warning signs and risks: how to avoid not getting a PhD; and
- labour market prospects after the thesis defence.

The landing programme is not intended as a substitute for the advice and supervision that the participants may expect from their own supervisors. A landing program could have multiple objectives:

Objectives in detail

Objective 1. Knowledge of:

- Dutch PhD culture;
- strengths and weaknesses of the university as a PhD research environment;
- ways to plan a PhD process;
- possibilities to develop and prove your independence and creativity as a PhD candidate;
- possibilities for managing your supervisor;
- possibilities to create clarity of expectations between PhD candidates and supervisors;
- best ways to communicate with your supervisor;
- criteria that are used in the evaluation of theses and intermediate products like research proposals; and

⁹ By the way, such an introduction might be also of great value for international supervisors entering our local research community. See for example: <https://www.knaw.nl/en/news/publications/a-beginners-guide-to-dutch-academia>

- problems that may arise, how to recognize them and how to deal with them, and how (and where) to ask for help.

Objective 2. Skills, the ability to:

- make a SWOT analysis of your position as a PhD candidate;
- make a planning as regards the PhD project and additional activities;
- comply with deadlines;
- recognise strengths and weaknesses of defended theses;
- clarify expectations between you and your supervisor;
- recognise warning signs in view of timely completion of your thesis;
- prepare your next progress evaluation;
- avoid research isolation – working on a community of peers; and
- receive and handle feedback from your supervisors and peers.

Objective 3. Application and synthesis.

- Making a personal SWOT analysis of your personal position as a PhD candidate and discussing this with peers.
- Making a planning for the PhD project, discussing this with the supervisor and discussing his/her reaction in a course session.
- Studying some PhD theses and analysing their strengths and weaknesses. Translating your findings to your own work in progress.
- Preparing a form that clarifies mutual expectations of you as a PhD candidate and your supervisor, discussing this in a course session, discussing this with the supervisor.
- Analysing your situation and making an inventory of possible risk factors.
- Analysis of what is expected from you at the moment of the next progress evaluation.¹⁰

¹⁰ Source: Course syllabus Asian PhD candidates at the University of Utrecht, Sonneveld, 2012

8. The Graduate School informs PhD candidates about different aspects of obtaining a PhD

8.1. The Graduate School offers general information on the PhD candidates' process, rights, and duties.

Sometimes, PhD candidates can call on website information provided by the university. Subjects that may be discussed are, for example:¹¹

- information about post-PhD professional careers and advice in that respect from executives, young Graduates and PhD career counsellors;
- interviews with supervisors about what candidates may expect from their supervisors;
- tips from other PhD candidates and alumni;
- a timeline 'What can your Doctoral Education Programme look like?';
- information about available research courses like 'Problem-solving & Decision-making in Research', 'Basics of Teaching, Learning and Assessment', 'Developing Your Academic Skills: critical/analytical thinking and scientific reflection', and 'Research Design'.

8.2. The Graduate School introduces the issue of Research Integrity.

The Netherlands Code of Conduct for Research Integrity (2018)¹² defines five principles of research integrity, which guide researchers towards the right choices in all kinds of circumstances. The principles are:

- Honesty
- Scrupulousness
- Transparency
- Independence
- Responsibility

The code of conduct gives definite form to these principles by drawing them out into 61 norms for good research practice. Besides the responsibilities for researchers, the code of conduct also defines five institutional duties. The Graduate School or university concerned inform their PhD candidates about these principles and complaint procedures.¹³

8.3. The Graduate School explains complaint procedures in case of undesirable behaviour.

For example, on the School's website, the Graduate School also informs the candidates about the complaint procedures and support options in case of undesirable behaviour.

¹¹ <http://tu-delft.instantmagazine.com/tu-delft/doctoral-education-magazine#!/welcome-de-magazine>

¹² <https://doi.org/10.17026/dans-2cj-nvwu>

¹³ <https://www.eur.nl/en/about-eur/policy-and-regulations/integrity/research-integrity>

9. The Graduate School offers a course programme that ties in with the PhD research topic but also broadens knowledge

9.1. Supervisors and PhD candidates check whether essential research skills and knowledge are present and what needs to be done to remedy deficiencies.

9.2. The Graduate School offers a range of courses and activities

- *Research skills* that help the candidate to reach full proficiency in conducting research.
- *Discipline-related skills* that improve the candidate's depth of knowledge and, therefore, add to the quality of the candidate's PhD research.
- *Transferable skills* that help the candidate to develop on a personal level. These skills will also help the candidate to become a better professional, regardless of the career path chosen.
- *Minimum requirements for a transferable skills programme.* In any case, the following subjects are included in the programme:
 - ✓ *Academic writing*
 - ✓ *Project time management*
 - ✓ *Publishing (including publishing in English)*
 - ✓ *Career development*
 - ✓ *Peer to peer support/peer feedback*
 - ✓ *Didactical skills*
 - ✓ *Communication (with supervisor/cross-cultural/with patients)*
 - ✓ *Scientific integrity*
 - ✓ *Managing the supervision process*
 - ✓ *Data management*

9.3. Registration of course obligations

The course obligations are recorded in the Training and Supervision Plan.

9.4. Support for thesis defence

Towards the end of the PhD process, the Graduate School supports the candidates in their preparation of the thesis defence.

9.5. Study load

The educational programme to be followed by the full-time PhD candidate has a study load of between 20 and 30 credits. As stated before, customization is needed for external candidates.

9.5. External PhD candidates

If external PhD candidates have already gained ample experience during their careers and, especially, if they already have a broader education, they should take courses with direct relevance for them and/or their project. Full exemptions are possible as regards their study load, but courses on Integrity and Data Management are obligatory. It must be prevented that a recent Master's graduate does not take or get the opportunity to broaden his or her intellectual development at PhD level by becoming an external PhD candidate.

10. The Graduate School contributes to proper planning of the PhD process

10.1. The Graduate School keeps a digital tracking system.

The digital tracking system contains data on each individual PhD process, including the moments of progress evaluation and planning of the next stage.

10.2. The Graduate School includes the topic of planning in one of its workshops or courses for both PhD candidates and supervisors.

The following topics are covered in this program:

- the role of planning in successful and less successful PhD programs. The do's and don'ts that the PhD candidates and supervisors can deduct from this;
- the 'red flags' in the planning of a PhD process;
- the tools that can be helpful in planning;
- the active role of the PhD candidates in managing their supervisors, e.g. including an evaluation of the supervisor's attention to the planning of the PhD process¹⁴
- the importance of an early, first version of the thesis introduction;
- signalling the postponement of key decisions regarding the thesis;
- planning in practice: planning for a coming period and evaluating it at the end of this period; and
- making an inventory of 'good planning practices'.

10.3. The Graduate School makes planning tools available to its PhD candidates and supervisors.

For example:

- Form for PhD candidates to evaluate their supervisors' planning consciousness
- Matrices for planning a PhD programme
- Expectations per year as regards the PhD programme (three-month planning form, one-year planning form, etc.)

10.4. The planning of the PhD programme is part of the annual progress assessment.

- A central role is played by the Training and Supervision Plan or other documents that lay down the evaluation procedures (see the Principle 'Progress Evaluation'), setting the goals for the coming period.
- Special attention is given to the progress at the end of the second year. If there is a risk of seriously exceeding the available time for the PhD program, this will be visible at the end of the second year.

10.5. In the planning, the Graduate School, supervisor, and PhD candidate prioritize the PhD research over other activities like teaching.

¹⁴ Source: Tilburg Law School. *PhD Evaluatie Tijdmaatregelen begeleiders*. PhD training programme

11. The Graduate School supports PhD candidates in getting a grip on the thesis criteria

1. No doubts about the thesis assessment

The Graduate School and university must be able to substantiate that the thesis passes the doctoral committees without any problems or that adequate action has been taken in case of doubt. This is possible through the periodic analysis of the written assessments.

2. Assessments in detail

The members of the doctoral committees cannot suffice with a "yes" or "no" in answer to the question whether the candidate can be admitted to the defence. Their judgment must be substantiated. On which parts did they rate the submitted work positively; where did they note weaknesses?

3. PhD educational consequences based on assessments

Analyses of thesis assessments make it possible to investigate whether certain types of PhD candidates have specific quality problems. This would enable specific additions to the existing PhD training.

4. Transparency of thesis criteria

The transparency of the criteria used in the assessment of a thesis deserves extra attention. This topic should be put on the agenda of first-year PhD candidates, for example via their course program. They must be informed of the criteria. They must learn to apply them to their own work and already defended theses.

It is strongly recommended to focus on the work of Barbara Lovitts (2007). In her grand study "Making the Implicit Explicit. Creating performance expectations for the dissertation" she investigated the criteria that doctoral committees in 10 different disciplines use when assessing theses. Studying these discipline chapters will facilitate the supervisors' work and will allay concerns among many PhD candidates.

5. Levels of quality

It is wise to consider the assessment forms again and to distinguish the levels for each criterion. Many universities formulate the assessment criteria in their PhD regulations. It is essential that the Graduate Schools and chair groups 'translate' these criteria into their own field and explain for each criterion what distinguishes, for example, a 'cum laude' from a 'very good', and a pass from a failure.

6. Article based thesis

The Graduate School must make it clear what the supervisors expect from the thesis, the role of the article in the thesis and the number of articles in a thesis. Furthermore, everyone's contribution must be made explicit regarding the articles published by PhD candidates together with others. This contribution by others than the candidate must be substantial and not be quoted automatically.

7. Reviews of articles

Theses may be based on previously "peer reviewed" articles. It is worth considering adding the reviews to the material submitted to the doctoral committee members for assessment. They can then determine whether there is enough reason to rely on that earlier judgment. Peer reviewed and accepted for publication in a journal does not automatically mean that the publication meets the standards for a PhD thesis.

8. Distinction between thesis and book

The distinction between thesis and book deserves more attention. A two-step plan is much more workable for most PhD candidates. First, the thesis is written that must meet the criteria that a doctoral committee applies. After the defence, the thesis is processed into a book that will have to meet the criteria of a professional publisher.

Invite the PhD candidates to read Beth Luey's 'Handbook for Academic Authors' (2009). In this great publication, she explains the differences between a thesis and a book and what must be done by revising a thesis to turn it into a good book.

9. Independence of doctoral committees

The Dean of the Faculty guarantees the independence and expertise of the members of the doctoral committees. They do not maintain close ties with the supervisor and PhD candidate. At least two members of the committee belong to another university.

12. Coordinators of the PhD programmes hold annual progress meetings with the PhD candidates¹⁵

The coordinator of the PhD programme of the Graduate School or one of its subunits has an annual meeting with each PhD candidate.

Purpose of the meeting:

- Demonstrating the involvement in the PhD project by the School's / subunit's management.
- Highlighting the importance the Graduate School / subunit attaches to the well-being of its PhD candidates and, of course, to the completion of their programmes.
- Investigating whether the Graduate School / subunit, in addition to the supervisor, can do something extra to promote the completion of the thesis.
- Mapping the situation. Are there specific bottlenecks? Does the yearly evaluation cause concern? Is timely completion threatened? By what causes?
- Gaining insight into the details of the various individual PhD processes to gather information that can provide insight into success and risk factors for a positive outcome in order to subsequently be able to take preventive measures for PhD candidates who are still in the PhD process.

Topics to be discussed:

- the situation regarding the project
- the cooperation with the supervisors

The candidate is asked to indicate whether he or she is satisfied with the situation and whether some aspects deserve attention or adjustment. The PhD candidate and the coordinator will discuss this overview and decide whether further steps are necessary. In this respect, the opinion of the PhD candidate is decisive.

- issues the PhD candidate is concerned about;
- general well-being of the PhD candidate;
- general points regarding PhD programme
 - ✓ the monitoring of the progress
 - ✓ other work / projects / tasks they must perform
 - ✓ training offered, courses, conferences
- frequency and quality of contacts with peers;
- career prospects and actions undertaken by the candidate in this respect;
- actions to be taken after the interview.

If the number of PhD candidates exceeds the practical possibilities of the coordinator, the coordinator will check whether the progress reports drawn up by the responsible assessors are complete and whether they deserve follow-up action from his or her side.

¹⁵ Source: Monitor interview Tilburg Law School

13. The Graduate School evaluates the progress of the candidates at the end of the 1st, 2nd, and 3rd year

1. **Each PhD candidate is assessed** at the end of the 1st, 2nd, and 3rd year of his or her PhD research.
2. The first assessment will determine whether the PhD trajectory will be continued, **go/no-go decision**, and what must be done in the second and third year in view of a timely completion of the thesis.
3. The second and third assessments mainly have a **formative character**, which means that the emphasis is on contributions necessary for a timely and satisfying completion of the thesis.
4. The assessment procedures apply to **all types of PhD candidates**, either having an employee or grant/scholarship status.
5. It is commendable to introduce periodic assessment procedures also in case of externally financed (grant & scholarship) and external PhD candidates.
6. Frontrunners among Graduate Schools and universities already work with a completely integrated progress monitoring system for all types of PhD candidates.
7. The moments and components of the assessment, as well as the names of the assessors are laid down in the PhD monitoring system.
8. The assessments follow local regulations, whereby it is strongly recommended to involve scientists who are at a distance from the PhD candidate, the supervisory team, and the project.
9. In view of the assessment, the **PhD candidate will write a report regarding the progress** of his/her PhD research.
 - This report will address matters such as (a) the research findings, experiences, achievements, (b) courses taken and (c) products like (drafts of) journal articles and conference presentations. A planning for the coming period will be added, making it plausible that the project will be finished in time.
 - A PhD candidate must also perform several core activities and achieve competences as described in the VSNU's UFO profile, such as, presenting research results, planning and organising of the project, and progress monitoring.
 - All the core activities and courses are part of the PhD candidate's 20-30 EC training programme, contributing to his or her career opportunities.
10. The assessors' judgments and advice are communicated to the PhD candidate in writing and discussed in an assessment interview.
11. During the interview the PhD candidate's results, assessments, and conclusions in view of the further course of the PhD project will be discussed and recorded on the **assessment form**.

12. A copy of the assessment form will be submitted to the administration of the Graduate School and, if applicable, the HR department. This will be stored in the PhD monitoring system.

13. During the assessment interviews, **an updated version** of the Training and Supervision Plan, Research Plan, and time schedule, including agreements made between the supervisor(s) and the PhD candidate, will be discussed.

It is possible to determine parts of the progress assessment in more detail in the Training and Supervision Plan. For example, think of:

- ✓ *A record of sessions between the supervisor and co-supervisors in the previous period (containing issues that have been discussed), including indications whether the candidate and supervisors are satisfied with the situation and whether some aspects deserve attention or adjustment.*
- ✓ *A well-founded provisional outline of the contents of the thesis, with one absolute requirement being that it contains—in extremely precise wording—the issues and research questions the thesis focuses on.*
- ✓ *An example (approximately 5 pages) of the PhD candidate's writing, e.g., an article, a conference paper, part of a future chapter, or whatever the author selects.*
- ✓ *In case it is becoming clear that the project is seriously delayed, candidate and primary supervisor are asked to clarify what steps are being taken to enable timely completion of the thesis.*
- ✓ *Work schedule and time planning for research work in the remaining part of the PhD trajectory .*

14. The Graduate School supports the PhD candidates in their preparation of their post-PhD careers

1. The Graduate School **collects information about the career steps** that the PhD graduates have taken after completion of their theses and shares this information with current PhD candidates.
2. The graduate school supports supervisors to **discuss possible post-PhD career options** with their PhD candidates.
3. The Graduate School draws the PhD candidates' attention to the information sessions organized by Promovendi Network Netherlands (PNN) about the **possibilities of doing an internship outside academia** during their PhD programmes. Academic Transfer
4. The Graduate School organises PhD **career events** and/or **career workshops** for their PhD candidates.

Career workshops may reflect on the candidate's future career and the steps that need to be taken to get the preferred job¹⁶. Possible topics for a workshop are:

- *the possibilities to plan a career;*
- *information about what future employers seek in a future employee;*
- *balancing professional and personal demands;*
- *analysing a CV in view of possible future job vacancies;*
- *how to turn personal interests into a full-time job;*
- *supervisor's role in helping candidates to prepare for their future careers;*
- *Introduction to the world of research funding;*
- *identifying specific actions which will help to build a CV*

Another good practice takes place at the VU University where 'Career Thursdays' are organised as well as 'Meet your Employer' events¹⁷. Topics during these meetings are:

- *discovering where one would like to work;*
- *defining what type of career the PhD candidate envisions;*
- *strategizing one's next career move;*
- *understanding 'company life' and talking about personal strengths and talents, and how these fit into a workplace culture;*
- *understanding how the PhD candidate fits into a prospective employer's portfolio;*
- *converting academic thoughts and ideas into a personal approach that is specifically appropriate for industry;*
- *figuring out what the PhD candidate wants to do and what he or she is especially good at;*
- *how to present oneself to a possible employer, practicing answering some questions one might expect at an interview.*

¹⁶ <https://www.wur.nl/en/wageningen-university/Student-Career-Services-Explore-your-future.htm>

¹⁷ <https://www.vu.nl/en/research/taking-phd/doctoral-education-and-training/career-support/index.aspx>

15. The Graduate School supports supervisors in their working with the PhD candidates

The Graduate School offers a workshop or course for supervisors. In any case, the following topics are discussed¹⁸:

1. selection and admission of PhD candidates;
2. distinguishing different styles of supervision and the ability to switch between them;
3. attention to possibilities for networking and for career prospects after graduation with ample attention to a non-university continuation of the research career;
4. planning and progress control;
5. supervision in a team.

In addition:

6. possibilities to intervene if things are not going well;
7. communication styles;
8. requirements for the thesis
9. mutual expectations
10. intercultural communication

Important **extra topics** are:

- giving and receiving feedback;
- conflict and negotiation;
- emotions & well-being;
- starting up: clarifying PhD project conditions. e.g. expressing expectations, making agreements with PhD candidates and co-supervisors;
- setting project goals, milestones, go/no-go decisions, ensuring project management skills;
- organising the support and career network of the PhD candidate';
- performance management: progress monitoring parameters, supervising the writing process, risk management, dealing with setbacks;
- crisis management;
- dealing with emotions & well-being: work pressure, monitoring stress signals, motivation, empowering, cooperation;
- situational leadership and communication styles; and
- cultural differences.

The following principles are recommended for the organization of a supervisors' programme:

1. Composition of the group of participants. Here you can choose between a programme for supervisors from the same organizational unit or participants from a mix of units.
2. The programmes must in any case meet the needs of starting supervisors. The participation of experienced supervisors can be a great asset. Alignment with a specific group of participants and a specific situation is essential. Trainers should be expected to study this before offering a programme proposal.

¹⁸ Based on the report of the meeting organized by the Netherlands Centre of Expertise for Doctoral Education on the professionalization of PhD candidates' supervision, 20 September 2019. See also: <http://www.phdcentre.eu/category/news/>

3. Be careful with making it compulsory for supervisors. The programme must be so good that new supervisors are keen to participate.
4. Ideally, the programme providers/trainers have completed a PhD project themselves.
5. Preferably, the programme has 3 to 4 meetings (of a day or half a day). Fewer is not recommended given the number of core topics that must be dealt with in each programme. The number of participants per programme is between 10 and 12. Programmes with less than six participants should be discouraged.
6. Peer feedback and peer coaching. In this, supervisors discuss practical situations. They are an important and much appreciated part of any training programme. Role-playing turns out to be an attractive part of the programmes.
7. The programme stimulates interaction between supervisors and PhD candidates in between the sessions of the programme. This is aimed at supporting important elements in the relationship between the supervisor and the PhD candidate. Consider, for example, making a schedule, making mutual expectations explicit, clarifying the requirements for the thesis, etc.
8. The PhD candidates themselves are an active party in the supervisory relationships. Good supervision does not only depend on what the supervisor does but also on an active and guiding role of the PhD candidate. Therefore, the supervisors must have an eye for the signals and initiatives of the PhD candidate, the mutual nature of the communication, and a respectful treatment.

16. The Graduate School formulates the core elements of the supervision

The Graduate School lies down the core elements for PhD supervision and the common responsibilities of supervisors and PhD candidates.

These core elements include:

1. formulating the essential characteristics of **good selection procedures**;
2. distinguishing between **different types of PhD candidates** and their specific supervision needs;
3. distinguishing the **different phases in the PhD trajectory** and the accompanying changes in supervision;
4. the importance of **good cooperation** between supervisor and co-supervisor;
5. **availability and initiative** regarding meetings with the candidate;
6. clarification of **mutual expectations**;
7. the importance of a **realistic planning**, based on a project plan;
8. regular **evaluation of progress**;
9. providing **mutual feedback** between supervisors and candidate;
10. **exchanging experiences** with other supervisors;
11. awareness of the **stressful aspects** of a PhD process;
12. brainstorming with the candidate about **post-PhD life**;
13. opening the **supervisor's network** for the candidate, and encouraging participation in national and international networks that are important for the PhD project;
14. making a **distinction between supervision and taking over a project**;
15. how to contribute to the independent development of the PhD candidate, without falling into a laissez-faire attitude;
16. making **expectations explicit** regarding the thesis.

17. The Graduate School offers support in raising and solving PhD candidates' problems

The Graduate School clarifies the different ways of providing support for PhD candidates in case of problems, inside and outside the Graduate School

The Graduate School¹⁹ clarifies the different ways of providing support for PhD candidates. This may help them in finding the right person for issues. There are different levels of support. Every level includes example questions to clarify the kind of issues that are applicable at that level.

Level 1 represents support from peers and other easily accessible persons at the candidate's department or Graduate School. They can advise how to tackle problems and, if applicable, they can bring issues to the attention of policy makers and decision makers.

- Peers/buddies at the Graduate School
- (Co-)supervisor
- PhD coordinator of the Graduate School
- PhD council of the Graduate School

Examples of issues: My roommate and I do not have a click - Recently my supervisor has been too busy to supervise me - I am not familiar with the assessment criteria of my thesis - I cannot connect with colleagues - I do not feel motivated (anymore).

Level 2 represents advisors who are more distant and have a professional role. They can also refer PhD candidates to advisors at the third level.

- Confidential advisor at PhD candidates' own department (if applicable)
- Confidential advisors for PhD candidates of the specific department
- Occupational Health Physician
- PhD psychologist of the specific university
- HR advisor of department & info on special leave
- Head of section/department

Examples of issues: "I have doubts about continuing my PhD - I have stress related problems - I think I am working too much - Other tasks and my PhD research are not in balance - My topic does not fit within my department - My topic does not match with my supervisor's expertise - My contract is unclear/causing me uncertainty - I do not have any yearly appraisal interviews with my supervisor - My supervisor is away for more than 3 months - My supervisor is continuously too busy to supervise me - Illness retains me from work - Bullying, (sexual) harassment, discrimination, aggression, violence - I feel captured by my PhD project - I am pregnant - My supervisors do not cooperate well - I do not work well with my supervisors".

Level 3 refers to official contact points for issues of the second level that for PhD candidates involved threaten to escalate and turn into a conflict for which a solution has not been found yet. Also, for situations with a more collective interest.

- Confidential advisor on Scientific Integrity (university level)
- Confidential advisor for unacceptable behaviour (university level)

¹⁹ Source: Tilburg Graduate Law School, *Roadmap for PhD support* (2020)

- *Ombudsperson (to be appointed in every university according to the CLA).*
- *Director of Graduate School*
- *Dean of Graduate School*

Examples of issues: "I am wrongly being accused of something - I am involved in a work-related conflict - I witnessed or suspect (scientific) fraud - I feel tense or unsafe as a result of organizational developments – Whistle blowers' situations".

18. The Graduate School's coordinator has an exit interview with each PhD candidate whose PhD project comes to an end

1. The coordinator of the Graduate programme has an exit interview with each PhD candidate who leaves the PhD program.

2. Special attention is given to those PhD candidates who leave without a completed thesis.

Purpose of the interview is to:

- demonstrate the Graduate School's involvement in the completion of the PhD thesis;
- underline the importance the Graduate School places on completion;
- investigate whether the Graduate School, in addition to the supervisor, can do something extra to promote the completion of the thesis;
- map the situation. Is timely completion threatened? Caused by what? Or is everything going smoothly? Then we would like to hear more about it so that we can get a better grip on success factors.
- gain insight into the lines and patterns of PhD programmes that are not yet on the point of completion when the PhD candidate leaves the PhD programme (to take preventive measures for PhD candidates who are still working in the PhD programme).

Structure of the interview²⁰:

- **Opening.** Explanation of the purpose of the interview. Explaining that the coordinator wants to discuss several issues, but of course will offer plenty of room to discuss points that the PhD candidate wants to raise. We are not only concerned with problems. The PhD candidate can also be someone who quickly completes the thesis. We also want to hear more about that.
- **Situation** regarding the thesis
- **Issues that could hinder completion**, or already have led to stagnation. For example: research intrinsic complications, lack of material or research data, relationship with the supervisor, labour conditions and private circumstances, personal skills issues, lack of knowledge, motivation, exaggerated ambitions, or expectations.
- **Core questions.** Does the candidate want to complete the thesis? How important is completion to the candidate?
- **After the interview:** coordinator and PhD candidate exchange major conclusions in writing.

²⁰ Format exit interview used at Tilburg University

19. The Graduate School pays extra attention to chronic exceeding of the time available for the PhD project²¹

1. If exceeding the time available for finishing the PhD thesis is a structural problem, the Graduate School will periodically investigate the causes of this problem.

Special attention goes to:

- too a heavy burden caused by teaching tasks and/or supervising BA and MA students;
- the connection between delay and substantive research problems;
- the role of postponing decisions regarding core elements of the PhD project;
- the lack of a leading research question and a deferred theoretical perspective;
- the strategy vis à vis the introduction of the thesis: postponing instead of writing an early first version, serving as a compass and reference point;
- writing in line with the developments of the subject (at the risk that the writing never stops) ;
- missing skills or insights;
- problems with structuring the research; and
- problems with the supervision.

2. The Graduate School supports PhD candidates who are dealing with an extended PhD process.

Think of:

- mapping the motivation of the PhD candidate and the situation of the dissertation - does the PhD candidate still want to obtain a PhD?;
- planning support for the remaining work;
- clarifying requirements and possible downsizing options in connection with the thesis;
- investigating whether required research and study skills are available; and
- brainstorming about the supervision.

3. The Graduate School pursues an active policy to prevent PhD projects from being delayed.

For example, by:

- preventing postponement of core decisions;
- checking research skills at an early stage;
- attention to planning from day one;
- pointing out a joint responsibility of PhD candidates and supervisors for timely completion;
- organizing a progress assessment at the end of the second year: delay and exceedance are then already visible; and
- holding an exit interviews and ensuring continuation of Graduate School support.

²¹ Source: <http://www.phdcentre.eu/inhoud/uploads/2018/02/VerslagprojectLangpromoveerders.pdf>

20. The Graduate School provides adequate work facilities, including workspace and finances for following and providing education and conference attendance

PhD candidates who are employed or on a grant/scholarship have access to:

- a workplace within the university;
- equipment;
- a budget for travel and conference visits;
- a training budget for personal development;
- a research budget; and
- library facilities.

In case of these categories of PhD candidates, the Graduate School or the financing organization provides extended funding for the PhD trajectory in the case of pregnancy and parental leave, illness, and research stagnation due to causes beyond the control of the PhD candidate.

External PhD candidates:

- have access to library facilities;
- can participate free of charge in the PhD course programme; and
- are supported in raising funds for:
 - travel and conference visits;
 - equipment (if applicable);
 - the research (if applicable).

21. The Graduate School periodically conducts research among PhD candidates and supervisors into the qualities of the PhD programme and points for improvement

1. Periodic research among PhD candidates and supervisors is carried out once every three years.

2. In any case, such research will pay attention to the following points ²²

- **Personal background PhD candidate:**
 - ✓ month and year of birth
 - ✓ gender
 - ✓ nationality
 - ✓ highest degree obtained before start of PhD programme

- **Start of the PhD project:**
 - ✓ year and month of start of PhD research
 - ✓ duration of PhD project as agreed upon at the start
 - ✓ number of hours a week to work on PhD project, according to contract or training and supervision plan
 - ✓ in average week, number of hours worked on PhD project
 - ✓ salary, funding and/or hours to conduct PhD research
 - ✓ presence of employment or grant/scholarship contract at the start
 - ✓ kind of employment or grant/scholarship contract at the start
 - ✓ UFO code (academic job classification)
 - ✓ full-time or part-time contract
 - ✓ kind of funding of the PhD project
 - ✓ location where PhD research is carried out (faculty or academic domain)
 - ✓ source of funding for PhD project

- **Research environment**
 - ✓ kind of facilities candidate can dispose of such as workplace, computer and software, research facilities (e.g. lab, instruments, field work, databases), access to library (e.g. journals, books, and other information)
 - ✓ adequacy of facilities
 - ✓ participation in research community when working on PhD project

- **PhD Supervision**
 - ✓ composition of supervision team
 - ✓ scientist who supervises candidate most of the time (i.e., the daily supervisor)
 - ✓ number of hours of supervision received in average week
 - ✓ satisfaction with nature, quality, frequency, and timeliness of the supervision
 - ✓ annual evaluation meeting and monitoring meeting

- **PhD Education and training**
 - ✓ access to education activities

²² Primary source of information: Netherlands PhD Experience survey 2.5

- ✓ obligatory courses as part of the PhD educational training
 - ✓ sufficient time to participate in courses, seminars, conferences, and other education activities
 - ✓ satisfaction with the educational activities on offer at university and/or in the (national) Graduate School
 - ✓ contribution of educational activities to PhD completion
 - ✓ support by supervisors regarding participation in educational activities
 - ✓ satisfaction as regards post-PhD career orientation
- **Teaching tasks and other duties**
 - ✓ educational duties and/or supervising BA/MA students
 - ✓ number of hours per week, on average, spend on educational tasks and supervision of students
- **Support structures and processes**
 - ✓ familiarity with organisations at the university (relevant to PhD candidates)
- **PhD Progress and well-being**
 - ✓ being on schedule with candidate's planning
 - ✓ length of expected delay
 - ✓ workload or time pressure in PhD project
 - ✓ impact of PhD project on well-being
 - ✓ familiarity with PhD support organisations at the university
 - ✓ knowledge of availability of counsellors in case of problems (e.g., related to well-being or problems with supervisor)
- **Finishing PhD project**
 - ✓ discussion of the scientific requirements as regards the PhD thesis
 - ✓ clarity of those requirements
- **Future career PhD candidate**
 - ✓ career perspectives aspired after graduation
 - ✓ sector of career perspectives after completing PhD research

3. Specification of primary supervisor's qualities needs to be considered.

There are good reasons to investigate the qualities of the supervision in more detail as proposed in the Netherlands PhD experience survey 2020. This is in line with a lot of international research and Dutch examples. A good example is the survey report supervision quality from Zurich University. A survey among PhD supervisors will thus provide much more specific information about the qualities of the supervision and opportunities for improvement²³.

Supervision qualities that can be incorporated in the survey are: supervisor's trust in candidate's abilities – giving space to candidate to choose his or her own direction – enthusiasm – discussion of mutual expectations – asking questions that trigger new perspectives on the project – promoting contacts with peers and colleagues in the field – providing information on Graduate School guidelines – encouraging to present work at research forums – timely response in case of questions and work to be discussed – showing respect – support in maintaining focus on research objectives – constructive support as regards writing research texts – offering constructive feedback

²³ *Survey Report Supervision Quality, Zürich University, 2017.* <http://www.phdcentre.eu/inhoud/uploads/2020/04/PhD-survey-Z%C3%BCrich-2020.pdf>

– guidance in search for relevant literature – availability – regularly monitoring progress – discussion of the expected product and scope of thesis (articles, book) -support in defining research scope – swift action when candidate gets ‘stuck’- advocating for candidate’s needs and interests – up to date expertise on the topic of research – good advice on work planning – helpful advice on research design and methodology – support in making plans for the near future (after thesis) – courage to intervene in project in case of problems that are very difficult to solve for the candidate – discussion of the assignment of co-authorships of candidate’s articles.

4. An update of the questionnaire due to the COVID-19 pandemic and its consequences is recommendable.

Questions that may be added during this period may focus on:²⁴

- impact of pandemic on ability to submit PhD thesis on time and remediation measures to overcome planning problems;
- impact of the COVID-19 pandemic on daily working activities;
- need of an extension of PhD process due to the impact of the COVID-19 crisis;
- expected support to ask for an extension of the deadline of the PhD thesis;
- financial concerns due to the COVID-19 pandemic because there is lack of clarity about labour contract or scholarship terms;
- consequences of giving support to partner, family, friends, or neighbours who have health issues;
- knowledge on supervisor’s side as regards informal care before and/or during the COVID-19 pandemic given by PhD candidate;
- kind of agreements made with supervisor to be able to give informal care;
- considerations as regards stopping with the PhD research during the COVID-19 pandemic;
- health issues during the COVID-19 pandemic.

5. Neglected but recommendable: consultation of PhD supervisors.

- A growing number of Graduate Schools question PhD candidates about many aspects of their PhD trajectory. However, the number of Graduate Schools that ask their supervisors for their opinion on the organization of the PhD programme, the quality of the candidates hired, their own needs for peer support, and the tensions that may arise in supervision teams is almost negligible.²⁵
- By a simultaneous consultation of PhD candidates and supervisors, it becomes possible to see on which aspects the two groups reached the same judgment and where short circuits occurred.

²⁴ CWTS, *COVID 19 Health and Care Survey*, 2020

²⁵ (2008) *De Kwaliteit van de Promotiebegeleiding bij het Onderzoeksinstituut Geschiedenis en Cultuur* (UU). <http://www.phdcentre.eu/inhoud/uploads/2018/02/RapportDekwaliteitvanpromotiebegeleidingbijOGC5-11-08def.pdf>

22. Graduate School and PhD programme are evaluated periodically

1. The evaluation is led by the Strategy Evaluation Protocol (SEP) 2021–2027.

Every six years, the functioning of the Graduate School is evaluated by an external and international committee. The procedure is laid down in the VSNU Strategy Evaluation Protocol.²⁶

In practice, not the Graduate School is evaluated but the respective research units. The PhD programme is one of the 4 specific aspects in such a review. Therefore, so to speak, the Graduate School is constantly reviewed as part of the various units of the university. In exemplary cases, for example Twente University, there are guidelines about the setup and achievements of the Graduate School. Research units can highlight their own PhD population (e.g., in comparison with the statistics of the whole Graduate School and other research units).

2. The subjects of the evaluation of PhD policy and training are laid down in the same protocol²⁷.

- The supervision and instruction of PhD candidates, including PhD education at relevant institutional Graduate School(s) and (national) research school(s)
- Proper functioning of the quality assurance system
- PhD training, mentoring, and coaching
- The institutional context of the PhD programmes
- The PhD programme content and structure,
- The selection and admission procedures for PhD candidates,
- The position of PhD candidates and PhD training in the unit's research
- The supervision of PhD candidates
- The effectiveness of the Training and Supervision Plans,
- The guidance of PhD candidates towards the job market
- Duration success rate of the program
- Exit numbers and career prospects for PhD candidates.

3. Preferably, the PhD programmes in the same discipline are evaluated in a national comparative and open procedure.

4. In preparation for this external evaluation, the Graduate School prepares a self-evaluation every three years.

Possible topics in self-evaluation reports are:

- Institutional and financial context;
- The composition of the PhD community;
- The PhD programme: content and structure;
- The selection and admission procedures;
- Supervision of PhD candidate;
- The career of PhD recipients;
- Duration and the success rate of the PhD programmes;
- Quality assurance of PhD programmes, supervision, and PhD research.

²⁶ https://www.vsnunl.nl/files/documenten/Domeinen/Onderzoek/SEP_2021-2027.pdf

²⁷ idem

Possible annexes are:

- Current educational programme of the Graduate School;
- Selection and admission procedures;
- PhD Supervision and Training Plan and annual interview forms (incl. go/no-go);
- Risk Inventory PhD Projects;
- Programmes for professionalizing the supervision;
- Labour market position of recent graduates;
- Completion rates – the details;
- Internal Quality Assurance procedures and the PhD Program.

5. In the self-evaluation process, the Graduate School may apply the format of a SWOT analysis (strengths, weaknesses, opportunities, and threats)²⁸

²⁸ Sonneveld, H. *SWOT analysis doctoral environment* 2020

About the Authors



Hans Sonneveld has been a specialist in the field of doctoral studies for 35 years. During his graduate school managing directorship, he wrote his dissertation: *PhD supervisors, PhD candidates and the Academic selection - The collectivization of the Dutch PhD system*. He advised faculties on their doctoral policy and provided training for PhD supervisors at home and abroad. Research remained a core activity. He conducted PhD surveys, studied rejected dissertations and very delayed PhD trajectories, investigated the quality of the Dutch graduate schools, and did research on the quality of supervision at various universities. He is currently finalizing a handbook for PhD supervisors and graduate schools: *The Art of Writing a PhD Proposal - A Handbook to Facilitate the Transition from MA Student to PhD Candidacy*. The book is based on five years of supporting and teaching Research Master students when writing a PhD proposal.



Hannerieke van der Boom is currently working at the *Research Policy Office* at Amsterdam UMC and provides policy advice to researchers working on health care topics. Her focus areas are Talent & Career policy, Recognition & Rewards, and Gender & Diversity. From 2009 to 2021, she both worked as *Faculty policy advisor PhD affairs* at the Research Office of the Faculty of Health, Medicine & Life Sciences and as *PhD coordinator* for the School for Public Health and Primary Care (CAPHRI) at Maastricht University. In these roles, she provided policy advice on all matters related to PhD projects to the Faculty and Graduate School Board. She also set up a registration and monitoring system for PhD candidates and their supervisors, '*PhD TRACK*', which was also implemented at other Faculties at Maastricht and other Dutch Universities. She initiated improvements to enhance the quality of PhD-related organisational processes, the well-being of PhD candidates and implemented a 'Basic Qualification Supervision' course for supervisors. She also provided personal advice in case of problems experienced by PhDs and encouraged them to think about their future careers.



Paul van Dijk worked from 1987 to 2012 at (what is presently known as) the faculty of Geoinformation Science and Earth Observation (ITC) of the University of Twente as assistant professor and later as education programme director (both in Earth Sciences) and lastly as Head of Research ITC. He joined the *Twente Graduate School* in 2012 (since 2015 in the position of *director*) and was involved in the areas of: graduate policy formulation and implementation, development of a PhD Charter stipulating the rights and obligations of all PhD candidates and PhD supervisors, implementation of a doctoral monitoring system for all (types of) PhD candidates, shaping the doctoral education programme and its quality assurance, introducing academic integrity for all PhD candidates, investigating and stimulating PhD wellbeing, and development of joint- and double PhD agreements. Nationally, he

has been active in the development of the National PhD Survey and the comparison of 'healthy practices' in the Dutch doctoral system.



Linda Martens has started her career working as a policy officer for the *Tilburg Graduate Law School*. After first following a study in pedagogy and later in culture studies, she decided that writing university policy was the right fit for her. At the Tilburg Graduate Law School, Linda focuses on PhD related policies, and is also responsible for the monitoring (progress interviews) of internal PhD candidates. In September 2021 she started a new challenge at the Dutch Central Agency for the Reception of Asylum Seekers.



Inge van der Weijden is a *senior researcher* and conducts both *qualitative and quantitative research* on the work experiences and evaluation of early career researchers in order to better understand career development of researchers within and outside academia. Special attention is given to mental health. Inge completed her PhD in 2007 at VU Amsterdam. From 2006 to 2011, she worked as a postdoc at the Rathenau Institute, where she did research into academic management & leadership of group leaders. She joined the *Center for Science and Technology Studies (CWTS)* at Leiden University in 2012. In 2017 she won a Special Recognition Award from the World Cultural Council. Inge serves as a coach in Leiden Leadership Programme and supervises master thesis students. She also acts as *PhD coordinator* for PhD candidates affiliated with CWTS.

