

PROFESSIONAL EXPERIENCE REQUIREMENTS

ENGG454

SUBJECT OUTLINE + GUIDELINES

2021:

STUDENTS & SUPERVISORS

Last updated Feb 19th 2021



Faculty of Engineering and Information Sciences

PROFESSIONAL EXPERIENCE REQUIREMENTS

INTRODUCTION

As a requirement for the Bachelor of Engineering (Honours) suite of degrees, students are required to obtain at least *twelve (12) weeks of approved professional experience in a relevant industry* during their course and submit a report to a satisfactory standard (based on the marking guide on page 9).

Students are highly encouraged to commence planning for their professional experience in their first year. It is preferable that candidates undertake this requirement during the summer recess and should be completed at the latest between the third and fourth years of the BE(Hons) degree.

Students should enrol in ENGG454 the session before undertaking 12 weeks full time or equivalent of professional experience. Students need to have nominated a major engineering discipline in SOLS; this will decide your placement group in EIS PEXs. Please check with your discipline coordinator if your professional experience will be multi-discipline, for example, a material student seeking training not only in material but also mechanical, mechatronics, management, or civil.

Exemption from the Professional Experience requirement will be given to students who have passed one or more of the Professional Option subjects (refer to the professional experience coordinator for details).

Note: If a student is unable to obtain twelve weeks continuous employment, a number of shorter periods (totalling at least 12 weeks full time or equivalent) is acceptable. In this case one report covering all periods is required.

ENGG454 MOODLE SITE

Please access the Moodle site for important information

<https://moodle.uowplatform.edu.au/course/view.php?id=26082>

EIS PEXs (Professional Experience system)

All students enrolled in ENGG454 are automatically added to the EIS PEXs system.

Access the system using this link, and log on using your UOW username and password.

<https://studentplacement.uow.edu.au/SoniaOnline/School.aspx?SchoolId=11>

Any system issues, please contact Robyn Hughes rhughes@uow.edu.au

ENQUIRIES

All enquiries must be directed to the appropriate professional experience coordinator for your discipline, whose name will be posted on the home page once you log onto EIS PEXs.

OBJECTIVES

The objectives of undertaking this experience is to:-

- Expose the student to an industrial/technical environment in order to appreciate the various activities associated with engineering in industry;
- Allow the student to observe and undertake tasks in practical aspects of investigation, design and construction of engineering works as a complement to theoretical studies;

- Instil confidence in the student to take up positions that require responsibility, motivation, decision making and communication with other people in the market place; and
- Facilitate recognition of the degree by professional bodies such as the Institution of Engineers, Australia.

EMPLOYMENT

It is the student's own responsibility to make every possible effort to obtain employment by either:

- contacting various industries and companies
- submitting applications in response to advertisements that appear on Discipline or Faculty of Engineering and Information Sciences Notice Boards, and in the Internship Opportunities section of the Moodle site.

Students are advised to seek employment well in advance to ensure the approval process is completed before employment commences.

ENROLMENT AND PLACEMENT GROUPS

Students can enrol in Autumn, Spring, Annual or Summer session for ENGG454. In EIS PEXs there are 2 placement groups each year. Students are assigned to a placement group based on their major engineering discipline and their subject instance. Students enrolled in Autumn, Annual and Summer instances will be assigned to the Autumn Placement group, while students enrolled in Spring session will be assigned to the Spring group.

SUMMARY OF PROCESS

These steps summarise the process, starting with student enrolment and finishing with the discipline coordinator marking the student's final report. The different roles are:

- Student
- Discipline Coordinator
- Organisation Mentor
- School Admin
- UOW Finance

1. Student enrolls in ENGG454 and ensures a major engineering discipline has been nominated for their course.
2. Student added to either Autumn or Spring Placement group for their discipline, according to their nominated major in EIS PEXs. Start and end dates for the placement groups are:
 - a. Autumn - 31st January to 30th June the following year
 - b. Spring - 30th July to 31st December the following year
3. Student seeks potential employment opportunities and secures a position with an organisation.
4. Student receives Welcome to ENGG454 email after placement group start date.
5. Student completes EEO online modules and submits EEO Check in EIS PEXs.
6. Student receives email with a link to an online form asking to nominate either Paid or Unpaid professional experience after discussions with organisation.
7. Student receives email with the nominated Paid Work Experience Application or Unpaid Work Experience Application form.
8. Student completes and submits Paid Work Experience Application or Unpaid Work Experience Application Form.
9. Discipline Coordinator receives email with a link to the application form and either:
 - a. Accepts professional experience application

- b. Requires more information before approving professional experience application – **Student** must submit a new form
- c. Rejects professional experience application – **Student** must submit a new form
10. **School Admin** receives an email with link to the application form and :
 - a. manually creates placement and allocates student to organisation and mentor in EIS PEXs
 - b. manually assigns form to **Organisation mentor**
11. If Unpaid, **School Admin** sends application form to **UOW Finance** for approval
 - a. **UOW Finance** attaches Certificate of Insurance
12. **Organisation Mentor** receives email with link to form and approves student's placement request by submitting form.
13. **School Admin** receives email with link to form approved from the organisation mentor.
14. **School Admin** manually approves placement and assigns workflows so
 - a. **Student** receives email with confirmation that placement is approved
 - b. **Organisation mentor** receives email with confirmation of placement and Certificate of Insurance attached if Unpaid.
15. **Student** starts placement, receives email with link to weekly diary.
16. **Student** receives email after 2 weeks in placement with reminder to complete weekly diary.
17. **Student** receives email when placement ends, with a link to a form titled 'Organisation Mentor – Certificate of Service'.
18. **Student** writes final report, including weekly diary, and any documents or images attached to the diary.
19. **Student** attaches final report to the form titled 'Organisation Mentor – Certificate of Service' and submits the form.
20. **Organisation mentor** receives email with a link to 'Organisation Mentor – Certificate of Service' form. **Organisation Mentor** provides feedback regarding the report and the student's performance during the professional experience, and submits form.
21. **Student** receives email with a link to the feedback from the Organisation Mentor.
22. **Student** includes the feedback form in the final report and submits their report on Moodle, using either the Autumn or Spring submission portal.
23. **Discipline Coordinator** marks report and assigns Grade

APPLICATION FOR APPROVAL

It is a requirement that employment be approved by the professional experience discipline coordinator using the online form assigned to students in EIS PEXs form. Approval MUST occur well in advance of taking up the employment. Students may undertake approved employment in another country, if they have the opportunity to do so.

TRAINING

Students are advised to plan a program of training with the help and consent of a senior engineer of the organisation who should be a corporate member of the Institution of Engineers Australia, or equivalent, and who will act as a mentor. If necessary, this mentor will be contacted by the relevant discipline coordinator to ascertain the progress of the student.

Students must keep a weekly diary of various activities of the Professional Experience done over 12 weeks or equivalent. This weekly diary will be assigned as a form once your placement starts and can be accessed via EIS PEXs from the Forms tab. Images and documents can be uploaded to support the weekly tasks. This diary MUST be included in the final report, and can be saved as a pdf from EIS PEXs.

REPORT

At the completion of the professional experience, the student is required to produce and submit an engineering report. This report must be processed on A4 size sheets, around 4,000 words in length (word count on title page). You must produce a title page which includes your name, organisation name, mentor name and project title, length of time you spent on the project. Illustrations and relevant photographs, computer programs and drawings may be added as an appendix to the main report. It is stressed that the report should be technical in nature and any relevant technical information must conform to SI Units.

The following information must be included in the report. A marking guide is available in the report submission portal on Moodle:

- Title Page – providing student's name, student ID number, project name, word count and Professional Experience Coordinator's name;
- Paid Work Experience Application form or Unpaid Work Experience Application form (depending on which form is applicable) - detailing the organisation where the student worked, the position held, name and position of mentor and period of employment;
- Description and duration of work on the project(s), significant aspects of the student's activity on the project(s) assigned by the work mentor and the contribution of the student (provide evidence where possible);
- Student's personal evaluation of the organisation and the work force;
- Critical evaluation and comments by the student on the usefulness of the training and its relevance to university education;
- Safety and environmental procedures adhered to within the industry.
- Weekly diary of activities prepared in the duration of professional experience. The preferred location of this diary is in the Appendix of the PE Report. (Please note, this diary does not replace the 4000 word description/discussion of the professional experience in the PE Report)

APPROVAL OF REPORT BY ORGANISATION MENTOR

It is a requirement that the organisation mentor completes the "Organisation Mentor -Certificate of Service" (see step 20 in the Summary of Process above). In the form, the mentor verifies the period of employment of the student and acknowledges that the report prepared by the student is a true representation of the activities undertaken. The mentor will rate the student's performance during the professional experience according to key attributes such as technical ability, cooperation, initiative, standard of work and conduct.

Once the "Organisation Mentor - Certificate of Service" is returned to the student with the mentor's comments and feedback, it is to be included in the final report.

If a student spends six weeks with one organisation in one year and a further six weeks with another the next year, aa "Organisation Mentor - Certificate of Service" form covering each period will be sent to the organisation mentor, and both need to be included in the final report.

SUBMISSION AND DUE DATES FOR SUBMISSION

All final reports **MUST** be submitted through the Moodle submission link for either Autumn or Spring. Reports will be examined critically to evaluate the student's input and the results of the experience. Assessment will be made on the basis of the content, presentation and mentor's feedback. The following

grades can be awarded, and students must check on the Moodle submission link for grades and feedback:

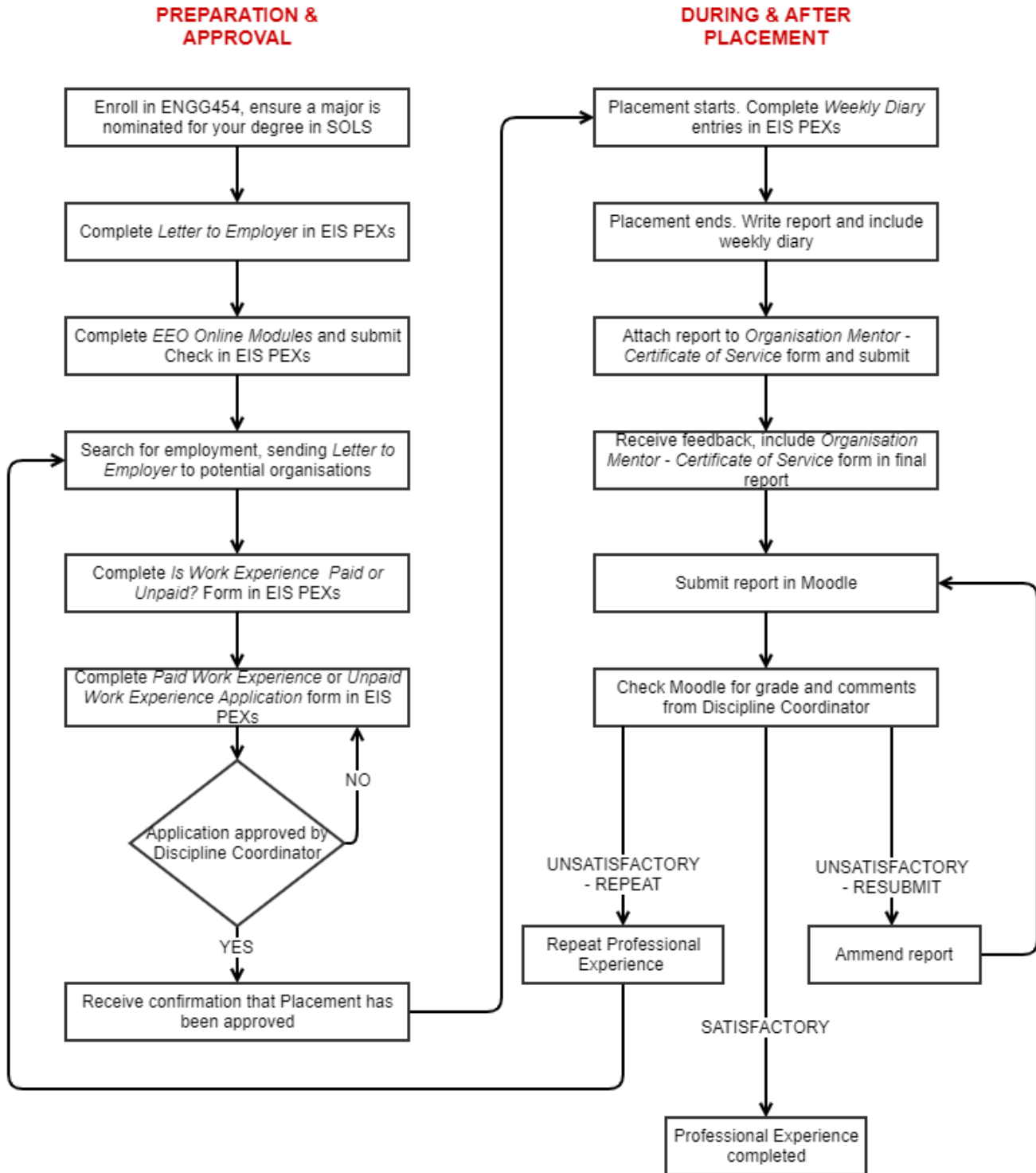
- Satisfactory
- Unsatisfactory – Resubmit.
The student is asked to amend the report and resubmit, or add an additional report
- Unsatisfactory – Repeat
The student is asked to repeat the professional experience for 12 weeks or less

Reports are due on the Friday of Week 5 of the session, check the Moodle submission link for the exact date. Reports can be submitted after this date, up to week 13 of the session but will be flagged as a late submission. Reports cannot be submitted after the cut-off date of week 13, and students must apply for an extension by contacting their discipline coordinators. Extension of the submission date will be given only under exceptional circumstances and provided the student has obtained the consent of the coordinator prior to the required submission date.

PROFESSIONAL EXPERIENCE LIABILITY COVER

Please refer to this [document](#) for details of coverage in the Product Disclosure Statement for Personal Accident Insurance. If your professional experience is UNPAID, UOW Finance needs to approve the placement and a Certificate of Insurance will be issued to your organisation mentor upon approval. Please refer to the Summary of Process step 11 above.

PROFESSIONAL EXPERIENCE – STUDENT FLOWCHART



DISTRIBUTION OF FORMS

WHAT STUDENTS NEED TO DO

You need to ENROL in ENGG 454 Professional Experience and choose the appropriate instance i.e. autumn or spring. You need to ensure you have nominated a major engineering discipline for your course.

“Letter to Employer”

This form, when required by the employer, to be completed, saved as a pdf and *presented to potential organisations when seeking employment.*

“Is Work Experience Paid or Unpaid?”

This form, to be completed, is to nominate the type of work you will seek approval for, either paid or unpaid. Once submitted, the correct approval form is assigned to you.

“Paid Work Experience Application”

This form, to be completed, is forwarded to your *Discipline Coordinator* for approval. If approved, the School Admin will receive it and create the placement request in EIS PEXs. If the Discipline Coordinator requires more information, or declines your application, you will need to complete and submit a new form.

“Unpaid Work Experience Application”

This form, to be completed, is forwarded to your *Discipline Coordinator* for approval. If approved, the School Admin will receive it and create the placement request in EIS PEXs. If the Discipline Coordinator requires more information, or declines your application, you will need to complete and submit a new form. The form will be forward to UOW Finance on your behalf for Insurance approval.

“Weekly Diary”

This form is to be completed each week, and saved during the duration of your professional experience. At the completion of your professional experience, save as a pdf and include in your final report.

“Organisation Mentor – Certificate of Service”

This form is to be completed by attaching your report and submitting. The form is forwarded to your Organisation Mentor to provide feedback and review your report. The form is returned to you to be included in the final report submitted on Moodle.

REPORT MARKING GUIDE



PROFESSIONAL EXPERIENCE

Marking guide for report content

Category	Description
Title Page	Include the following: <ul style="list-style-type: none">• Your name• Your project title• Organisation name• Organisation mentor name• Organisation mentor position• Organisation mentor contact phone• Employment period• Word count
Organisation Activities	Describe the major activities of the organisation
Professional Experience Activities	For each project/activity undertaken provide comments as follows: <ul style="list-style-type: none">• What was undertaken?• What did you learn from this?• How does it correlate with your University work?
Student Evaluation	Include a personal evaluation of the organisation and workforce
Procedures within Organisation	Include safety and environmental procedures adhered to within the industry
Length (4000 words)	Report is 4000 words, not including weekly diary
EIS PEXs forms	Include the following as Appendix (not counted in word count): <ul style="list-style-type: none">• Paid Work Experience Application or Unpaid Work Experience Application form (whichever is applicable)• Organisation Mentor – Certificate of Service• Weekly Diary