



# School of Materials Science & Engineering

## Industrial Training Guidelines

Never Stand Still

Science

School of Materials Science and Engineering

### What is Industrial Training?

Industrial Training refers to work experience done during the program of study that is relevant to professional development prior to graduation. All Engineering programs accredited by Engineers Australia (EA) require completion of at least 60 working days of approved industrial training prior to graduation.

All students in the School's BE programs (3131/3135 BE, 3132 BE/BEng Sci, 3136 BE/BCom, 3137BE/BE, 3133/3138 BE/MBiomedE) must complete at least 60 days approved industrial training to complete their degree and to obtain EA accreditation.

### Objectives of Industrial Training

The fundamental objective of Industrial Training is to prepare students for future employment in their chosen engineering discipline. Industrial Training enhances the academic material studied at University by allowing students to practice what they have learned and to develop key professional attributes. Industrial training should provide an opportunity for students to:

1. Experience the discipline of working in a professional engineering organisation
2. Develop understanding of the functioning and organisation of a business
3. Interact with other professional and non-professional groups
4. Apply engineering methods such as design and problem solving
5. Develop technical, interpersonal and communication skills, both oral and written

Industrial training also gives employers an opportunity to assess future employees. A demonstrated commitment and ability to take responsibility, make sound decisions, and apply technical skills will be highly regarded. Industrial training gives students an opportunity to evaluate future employers as well as enabling informed decisions about the discipline and career paths to follow.

### Acceptable Areas of Industrial Training

Students may be employed in any capacity associated with the development, design and/or manufacture of products including: production, quality control, chemical analysis, plant maintenance, design office duties or research in materials processing, materials engineering and materials characterisation. It is desirable that the student be assigned to some member of the technical staff in the plant who will give general guidance on the work to be undertaken. Whilst difficult, it is desirable to obtain experience in a range of activities including design, analysis, experimentation, production, and other on-site activities. It is important that students make the most of their Industrial Training by soliciting varied and challenging projects from the employer.

Research and development is valid training for an engineer and such work is done in companies, research organisations (such as CSIRO and ANSTO) and universities. Projects associated with the Taste of Research Summer Scholarships in the Faculties of Science and Engineering may be acceptable as Industrial Training.

Work done within the School, such as vacation research work, is considered to not satisfy the spirit and requirements of industrial training and so is not eligible to count towards the 60 days Industrial Training.

### Obtaining Suitable Industrial Training

The School does not provide a list of potential employers for industrial training. It is the responsibility of each student to obtain his/her own employment for Industrial Training.

Students can search for potential employers/companies using resources such as internet business directories, professional journals, professional societies, employment agencies, careers fairs, etc. Online career advice, employment vacancies, and recruitment resources can be found from internet sites such as UNSW Careers and Employment (<http://www.careers.unsw.edu.au>), Gradlink (<http://www.gradlink.edu.au>), MyFuture (<http://www.myfuture.edu.au/>), Seek (<http://www.seek.com.au>) and MyCareer (<http://www.mycareer.com.au>).

Students can also become student members of the Engineers Australia, which gives access to a register of available industrial training (this is compiled annually). Students can consult academic staff, who often have suitable contacts, or may be able to advise on sources of information about companies.

### Timing and Location

Industrial Training must be concurrent with program enrolment and the 60 days is accumulated by employment usually during the summer recesses at the end of the 1st, 2nd, and, most commonly, 3rd year.

Industrial training can be completed locally, interstate, or overseas, provided that the employment and work done are considered by the School to be relevant to the discipline.

Students having an academic standing of suspension or exclusion are not allowed by the University to complete anything toward their degree and this includes Industrial Training. Employment completed by students whilst being suspended or excluded is not recognised by the University as industrial training nor is it covered by University insurance (see below).

### Insurance Whilst on Industrial Training

Employers normally provide insurance cover to their employees for the duration of Industrial Training. They also carry public liability insurance to indemnify them against the actions of their employees. The employer may require a letter of indemnity from the University (to be signed by the Head of School), which can be downloaded from:

<https://www.fin.unsw.edu.au/Insurance/Insurance.html>

UNSW provides accidental injury insurance for students who are injured while participating in a UNSW activity such as approved Industrial Training, and for indemnity against third party claims. Information about UNSW insurance can be found at:

<https://www.fin.unsw.edu.au/Insurance/Insurance.html>

Frequently asked questions about UNSW student personal accident insurance can be found at:

<https://www.fin.unsw.edu.au/Insurance/Insurance.html>

### Approval and Completion of Industrial Training

Each industrial training placement requires the following documentation and approval (a separate set of forms should be completed for each Industrial Training placement):

- 1) Prior to accepting or commencing work with a particular employer, students should complete Sections 1 and 2 of the Industrial Training Employment Record form and submit to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au) for School approval.
- 2) Part way through the industrial training placement, students should complete Sections 3a and 3b of the Industrial Training Employment Record form including confirmation of the placement by the employer. Once the form has been completed and signed by the Company Supervisor, the form should be emailed to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au) as soon as practical.
- 3) At the end of the industrial training placement, students should complete Sections 4a, 4b, 5 and 6 of the Industrial Training Employment Record form. Once the form has been completed and signed by the Company Supervisor, the form should be emailed to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au) as soon as practical.

Final completed forms should be submitted to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au) **within 30 days of completing the training.**

Students are reminded that 60 days of Industrial Training must be completed prior to the last day of session in their final stage of the program for them to be eligible for graduation. It may be possible to submit a late report; however this may delay graduation by up to 6 months.

### Industrial Training Poster Competition

This competition will be held in the first half of Semester One. Students who have completed their industrial training since the previous event are required to present an A0 sized poster and deliver a 1 minute speech

showcasing their experience. Placement supervisors are invited to attend and awards are given for the most impressive presentations. More information about this is distributed to students during the first week of session.

### **Industrial Training School Contacts**

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SECTION 1 – Student Information (to be completed by the student)

Student Number: \_\_\_\_\_  
Family Name: \_\_\_\_\_ Given Name: \_\_\_\_\_  
Email Address: \_\_\_\_\_  
Address: \_\_\_\_\_  
Phone Number: \_\_\_\_\_  
Program: \_\_\_\_\_  
Program Stage: \_\_\_\_\_  
Academic Plan: \_\_\_\_\_

SECTION 2 – Employment Details (to be completed by the student)

Student's Name: \_\_\_\_\_  
Employer's Name (Company): \_\_\_\_\_  
Address: \_\_\_\_\_  
Supervisor: \_\_\_\_\_ Phone: \_\_\_\_\_  
Supervisors email address: \_\_\_\_\_  
Employment will commence on: \_\_\_\_\_  
OR  
Ongoing Employment: Full Time  Part Time   
Method of Travel: \_\_\_\_\_  
Company website: \_\_\_\_\_  
Brief Description of Company's Core Activities:  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
Proposed Duties for Industrial Training:  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

School Approval (attained prior to commencement of IT): \_\_\_\_\_

**SECTION 3a – Employer's Interim Report**  
(to be completed by the student's company supervisor midway through IT)

Employment commenced on: \_\_\_\_\_

OR

Ongoing Employment:                      Full Time                       Part Time

Number of full days worked (thus far): \_\_\_\_\_

Number of days absent (incl. holidays): \_\_\_\_\_

Reason for any days absent: \_\_\_\_\_

How much did the student require:	None	Little	Average	Excessive
Direction on new tasks				
Supervising whilst tasks were in progress				
Intervention when things didn't go according to plan				
Ongoing encouragement and attention				

How well did the student:	Not applicable	Ineffectively	Satisfactorily	Effectively
Learn from having a setback				
Work as part of a team				
Take directions				
Define problems				
Find innovative solutions				
Handle multiple tasks				

How good was the student's:	Above Average	Average	Below Average	Unsatisfactory
Technical ability				
General attitude				
Oral communication skills				
Written communication skills				

Comments:

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

I certify that the above named student is a **PAID/UNPAID** employee of the stated company for the duration indicated in Section 3a of this document.

Students Company Supervisors Name: \_\_\_\_\_

Signature: \_\_\_\_\_

Phone: \_\_\_\_\_

Date: \_\_\_\_\_

**SECTION 3b – Student's Comments on Employer's Interim Report**

Note: this section should be completed **after** the employer has completed the Employer's Interim Report (above).  
Comments will remain confidential within MSE.

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

Please email completed forms to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au)

**SECTION 4a – Employer's Final Report**  
(to be completed by the student's company supervisor at the conclusion of IT)

Number of full days worked (total): \_\_\_\_\_  
 Number of days absent (incl. holidays): \_\_\_\_\_  
 Reason for any days absent: \_\_\_\_\_

How much did the student require:	None	Little	Average	Excessive
Direction on new tasks				
Supervising whilst tasks were in progress				
Intervention when things didn't go according to plan				
Ongoing encouragement and attention				

How well did the student:	Not applicable	Ineffectively	Satisfactorily	Effectively
Learn from having a setback				
Work as part of a team				
Take directions				
Define Problems				
Find innovative solutions				
Handle multiple tasks				

How good was the student's:	Above Average	Average	Below Average	Unsatisfactory
Technical ability				
General attitude				
Oral communication skills				
Written communication skills				

Comments:  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

I certify that the above named student is a **PAID/UNPAID** employee of the stated company for the duration indicated in Section 3a of this document.

Student's Company Supervisor's Name: \_\_\_\_\_

Signature: \_\_\_\_\_ Phone: \_\_\_\_\_

Date: \_\_\_\_\_

**SECTION 4b – Student's Comments on Employer's Final Report**

Note: this section should be completed **after** the employer has completed the Employer's Interim Report (above). Comments will remain confidential within MSE.

\_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

**SECTION 5 – Student’s Reflection  
(to be completed by the student)**

How did you hear about / approach the company about securing an Industrial Training placement?

\_\_\_\_\_

Did you attend an interview for the position? \_\_\_\_\_

Please respond to these questions as they relate to your Industrial Training:


	Strongly Agree	Agree	Disagree	Strongly Disagree
The work setting was a pleasant one in which to work				
I gained information to clarify career goals.				
The learning experience was challenging and meaningful				
The placement allowed me to apply skills and knowledge gained through my University Studies				
I felt that my work contributed to the company’s goals				
My placement imparted and promoted a sense of professionalism				
I was motivated by my experience				
I found the work with the company stimulating				
I was paid adequately for my work				
I was given appropriate training , guidance and feedback on my performance				
I would recommend this company to another student for their Industrial Training				
I would consider working for this company after graduating				

If employment ceased, what was the reason for the termination of employment:

\_\_\_\_\_  
\_\_\_\_\_

**SECTION 6 – Submission Checklist**

Please ensure that you have completed and are submitting all of the following (please note that if you have been granted any exception to the following submission criteria you must attach email approval from the IT Coordinator):

IT Report Documents (this document)	
Copy of Employment Contract	

I agree that the Information I have provided in my IT Report is accurate and true to the best of my knowledge:

Student’s Signature: \_\_\_\_\_ Date: \_\_\_\_\_

Please email completed forms to [enquiries@materials.unsw.edu.au](mailto:enquiries@materials.unsw.edu.au)