

Briefing on Professional Placement Programme (PPP)

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Why PPP?

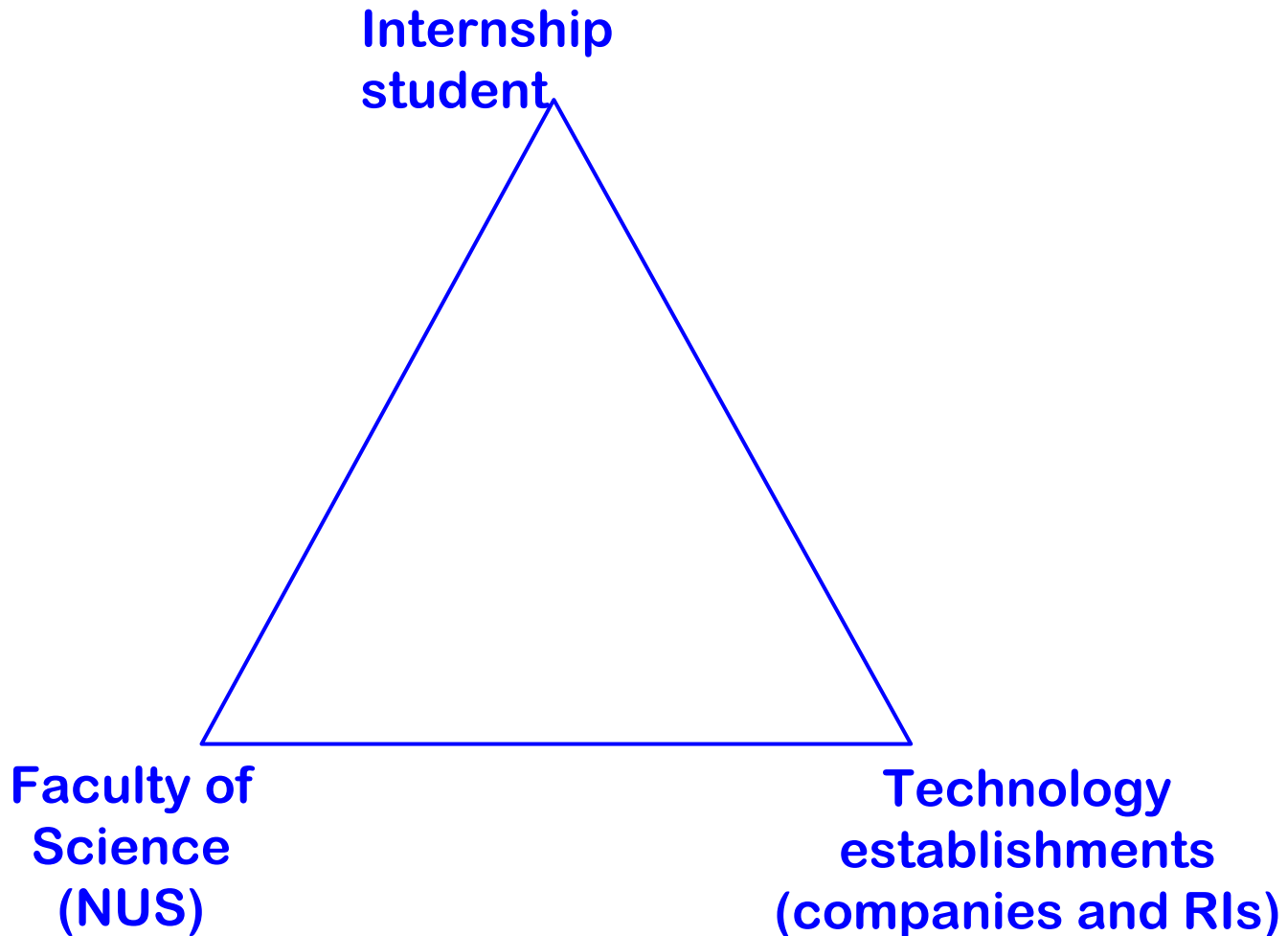
PPP: A Must

- **As a compulsory module**
- **The module provides 8 modular credits.**
- **Attached full-time to companies**
- **Offered in Semester I of Year 3**

PPP: Benefit You

- **Gain hands-on experience**
- **Contribute to R/D projects**
- **Look for job opportunities**

Interrelationships among three parties



Role of the University

- **Identify and negotiate placements**

Initiate and self-initiate

- **Setup the framework for PPP**

Because PPP is a full-time module, you are not allowed to take any other modules concurrently

- **Provide advisors**

Monitor your progress

- **Award you 8 modular credits**

Under the condition that you perform satisfactorily

Helpful Information

During this period, you remain a full-time student in NUS.

Your PPP allowance is not subjected to income taxation, and you are not entitled to CPF contributions.

You do not require a work permit for the PPP (even if you are a non-local student).

You are protected by the regular student medical insurance (NTUC Income administered by University Health and Wellness Centre: total protection of \$15,000; medical claims up to a maximum of \$4,000 per incident).

The internship company or research institute in turn is protected by a Public Liability Insurance Policy taken by NUS.

You will continue to enjoy access to NUS libraries, internet account and sports facilities.

You will also continue to enjoy access to department research facilities and faculty research facilities for the benefit of your project at the internal rate.

Role of the Internship Company or RI

Guidelines to the participating company/ RI:

Project assigned should be consistent with the normal job description of a university science graduate.

The project would have significant scientific and/or technological content related to materials science and technology.

The project could be a short-term project/ or a part of a continual development or long-term effort.

The company/ RI would provide a supervisor to monitor and review your progress regularly.

The company would allow you to participate in general company/ RI activities, such as technical meetings and seminars.

The company/ RI would own all intellectual properties arising from your work in the PPP, and the right to vet your PPP report and presentation.

Leave matters:

Paid leave. This is currently specified as a maximum of 5 days at the discretion of the company/ RI. Your entitlement will be made known to you in your Letter of Offer.

Medical leave. Medical leave has to be certified according to your company procedures or NUS procedures.

Special leave for competition and cultural events (if you represent Singapore or NUS in these activities) has to be approved by your internship company/ RI on a case-by-case basis.

Compassionate leave may be granted at the discretion of the company/ RI.

Taking excess leave over the specified entitlement may result in deduction of your allowance. Furthermore, excessive leave may result in your termination from the PPP.

Your Role

You will report to your designated supervisor in the company/ RI who shall have authority over your project, work hours, dress code and leave matters.

You are subject to company rules and regulations. Violators will be reported to the Department, and serious or repeat offenders may be terminated from the PPP.

You will take reasonable steps to protect the intellectual properties of the company/ RI.

Appeals

If you are seriously unhappy with the work (or lack of) that you have been assigned, you must contact your PPP advisor preferably within the first month! If notified early and we decided that the case has merit, we may be able to seek an alternative placement for you.

Time-table of events

24 Feb 06

Deadline for submission one-page resumè and university transcript to Mdm Karen Kan.

Please submit 5 copies of each.

24 Feb 06:

Start of project placement selection.

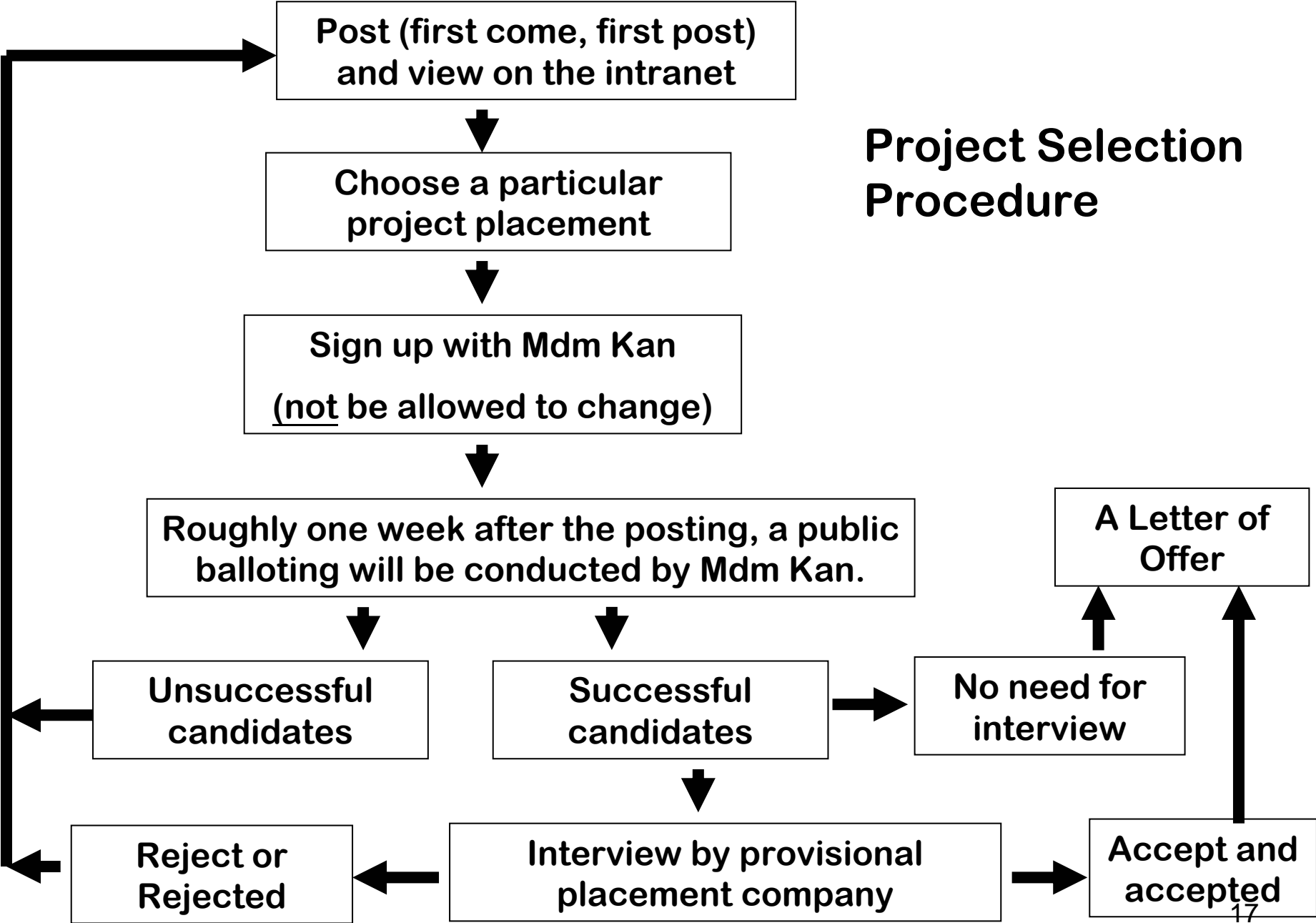
14 Apr 06:

End of project placement selection.

1 Apr 06:

Deadline for self-initiated placements.

Project Selection Procedure



<http://www.matsci.nus.edu.sg/ppp/index.html>

To view the proposals, you need the password.

3 Jul 06:

Official start of Materials Science PPP2006.

15 Dec 06:

Official end of Materials Science PPP2006.

30 Dec 06:

Deadline for submission of PPP report and feedback form. PPP presentations.

Safety first

Companies are required to provide a safety orientation for you in the first week of the PPP and provide a safe working environment.

You are however responsible for your own safety.

No sandals in laboratories.

No loose hair in laboratories.

Wear goggles (and face-shield if necessary) in chemical or hazardous work.

If you are unsure of a procedure or tool or chemical, please seek advice.

Check out the Materials Safety and Data Sheet (MSDS) which are available on the web (see for example, <http://www.msdssearch.com/>).

Check out the chemical safety handbooks are available in libraries (see for example, chemical safety sheets: working safely with hazardous chemicals, Kluwer Academic, 1991).

If you think you have spotted an unsafe situation, contact your supervisor (and your company's safety officers) right away. If this is not resolved, contact your PPP advisor!

Expectations Management

Induction to a real-life working environment at zero cost.

Opportunities to meet interesting colleagues, superiors and subordinates, and learn workplace social skills.

Opportunities to learn company/ RI organisational structures and how the company/ RI operates in Singapore.

Opportunities to be presented with difficult and/or stressful situations and learn how to cope with them and make decisions with incomplete knowledge.

Opportunities to make contacts and new friends.

Time to clarify your career thoughts.

Opportunities to acquire new technical knowledge and skills.

You may choose to work with the company in the future!

What the PPP is not

You should not expect to be given structured learning programmes or be spoon-fed. Learning how to take initiative and think on your own.

You should also not expect the PPP to be directly related to what you have learnt in coursework. A university science education aims to train you to do rational thinking and life-long learning so that you can excel in a wide range of environments.

How to get the most out of PPP

Be alert

Be attentive

Be smart

Be initiative. Don't wait for events to take place - make them happen yourself!

Be polite. No one likes arrogant uncivilised people.

A golden rule to bear in mind: If you make your boss look good, he/ she will also think highly of you.

Documentation

Student's log sheet.

You will have to fill in the log sheet and get it endorsed by your company/ RI supervisor weekly. This log sheet will protect you in case of a dispute with your supervisor, and will have to be handed in to the Department at the end of the attachment.

Student's feedback form.

You will have to submit this feedback form to the Department at the end of the attachment.

Performance evaluation form.

Your company/ RI supervisor will submit this directly to the Department at the end of your attachment.

Progress report.

Your PPP advisor with keep track of this.

PPP report.

You will have to submit a technical report not more than 20,000 words and preferably not less than 5,000 words in length, to the Department by **30 Dec 2006** to fulfill the conditions of the PPP module.

Report clearance form.

You will have to get your company/ RI supervisor to sign this form to clear your report and presentation for release to the Department. This form protects you in case of a dispute over breach of confidentiality.

Guidelines for presentation

Prepare a 12-min presentation (and 3-min of questions and answers).

You will not be allowed to exceed the time limit.

You are recommended to make your presentation on a presentation software, such as Microsoft PowerPoint. The font size must not be smaller than 18.

For a 12-min presentation, you should normally not use more than 8 slides.

Your audience would be members of the academic and research staff, your coursemates and your juniors.

You will need to make your presentation comprehensible to a non-expert audience (introducing the background, presenting the selected / particular results or understanding that you have obtained).

Do not try to tell every experiment that you have attempted in the PPP.

If some particular results do not make sense to you, they would most likely not make sense to us either.

Guidelines for preparing your CV

Prepare your CV on only one page of white page.

Do not use NUS logo or official letterhead anywhere on your CV – it is a personal document.

Emphasize your strengths and/ or experiences which you think set you apart from others.

Other skills: (for example, database, computational, programming, R&D tools etc)

Familiar with C++ Programming.

Familiar with SEM, TEM, AFM, XRD, SIMS....

Relevant work experience: (e.g. previous internships, research (UROP etc), familiarity with instrumental and/or particular technologies, etc)

2002 Undergraduate research opportunity programme. Worked on the synthesis and characterisation of polymer thermal gels.
Published a paper: D.B.H. Tan et al, Macromolecules, 79 (2003) 1154.

Awards: (only from Junior college/ polytechnic onwards)

2003 Young inventor's medal: Bronze (Singapore Science Centre): built a self-propelled skate.

How to prepare interview

To win the battle,
know your enemy and know yourself!

Know the company:

Structures, products and locations:

Website, newspaper, personal visits,
classmates, friends and relatives.

Know the project:

Proposal: related principles and concepts,
equipments and skills
(Using libraries and internet)

Ask yourself questions, prepare answers and then practise.

- 1. Why do you choose our company?**
- 2. What do you think our company?**
- 3. Briefly describe yourself.**
- 4. What kind of jobs would you like to do after your graduation?**
- 5. What courses have taken so far?**
- 6. Are you a quicker learner?**
- 7. How is your university life?**
- 8.**

Questions that you might ask:

1. I have gone through the proposal, which requires certain ..., is there any other background knowledge that is required for the project?
2. The project is interesting. I would like to know more about the project. Would you please suggest some references?

Questions that you should not ask:

1. How much does the company pay me?
2. Am I entitled to have leaves?
3. Do I have any oversea travel opportunity?

- **Check interview locations!**
- **Punctual: not too early , not too late!**
- **Polite and confident!**

(“Good morning every one. My name is It is nice to meet all of you”. (Do not sit unless you are asked).

(Do not interrupt interviewer’s remark. Listen carefully. Make eye contact.)

(Thank all of you, I really appreciate your time.)

Interview etiquettes

First impression counts: dress formally !