#### College of Design and Engineering

Dean's Office (Office of Undergraduate Programmes)



# Advanced Placement Credits & Exemptions for Freshmen Enrolling in Academic Year 2022/2023 Engineering and Computer Engineering

#### Acceptable Diplomas for all Engineering Majors except for Computer Engineering

Advanced Placement Credits (APCs) will be granted for engineering freshmen who have diplomas accredited to the Engineering course and who are admitted to the following majors:

- 1. Biomedical Engineering
- 2. Chemical Engineering
- 3. Civil Engineering
- 4. Electrical Engineering
- 5. Engineering Science
- 6. Environmental Engineering
- 7. Industrial and Systems Engineering
- 8. Infrastructure and Project Management
- 9. Materials Science and Engineering
- 10. Mechanical Engineering

For the diplomas highlighted in yellow, the APCs granted are:

- Unrestricted Electives: 20 MCs
- EG3611P Industrial Attachment: 10 MCs
- CDE2000 Creating Narratives: 4 MCs
- PF1101 Fundamentals of Project Management: 4 MCs
- Total: 38 MCs

For all other diplomas, the APCs granted are:

- Unrestricted Elective Modules: 20 MCs
- EG3611P Industrial Attachment: 10 MCs
- DTK1234 Design Thinking: 4 MCs
- EG1311 Design and Make: 4 MCs
- Total: 38 MCs

| Polytechnic         | Acceptable Diplomas for all Engineering Majors  |
|---------------------|---|
| Nanyang Polytechnic | <ul> <li>Aeronautical &amp; Aerospace Technology</li> <li>Aerospace Systems &amp; Management</li> <li>Biologics &amp; Process Technology</li> <li>Biomedical Engineering</li> <li>Chemical &amp; Green Technology</li> <li>Chemical &amp; Pharmaceutical Technology</li> <li>Digital &amp; Precision Engineering</li> <li>Digital Entertainment Technology</li> <li>Electrical Engineering with Eco-Design</li> <li>Electronic Systems</li> <li>Electronics, Computer &amp; Communication Engineering</li> <li>Electronics, Computer &amp; Control Engineering</li> <li>Engineering with Business</li> <li>Infocomm and Security</li> <li>Information Technology</li> </ul> |



| Polytechnic             | Acceptable Diplomas for all Engineering Majors  |
|-------------------------|---|
| Nanyang Polytechnic     | <ul> <li>Manufacturing Engineering</li> <li>Mechatronics Engineering</li> <li>Multimedia &amp; Infocomm Technology</li> <li>Multimedia Systems Engineering</li> <li>Nanotechnology &amp; Materials Science</li> <li>Robotics &amp; Mechatronics</li> <li>Telematics &amp; Media Technology</li> </ul>   |
| Ngee Ann<br>Polytechnic | <ul> <li>Aerospace Electronics / Aerospace Electronics (with Minor in Business Management)</li> <li>Aerospace Technology / Aerospace Technology (with Minor in Business Management)</li> <li>Audio-visual Technology / Audio-visual Technology (with Minor in Business Management)</li> <li>Automation Mechatronic Systems / Automation Mechatronic Systems (with Minor in Business Management)</li> <li>Biomedical Engineering / Biomedical Engineering (with Minor in Business Management)</li> <li>Building Services Engineering</li> <li>Chemical Engineering</li> <li>Chemical Engineering</li> <li>Chemical Engineering</li> <li>Civil &amp; Environmental Engineering</li> <li>Civil &amp; Environmental Engineering</li> <li>Clean Energy Management</li> <li>Electrical Engineering / Electrical Engineering (with Minor in Business Management)</li> <li>Electrical &amp; Electronic Engineering</li> <li>Electronics &amp; Computer Engineering / Electronic &amp; Computer Engineering (with Minor in Business Management)</li> <li>Electronics &amp; Telecommunications Engineering</li> <li>Environmental Engineering</li> <li>Environmental Engineering</li> <li>Environmental &amp; Water Technology</li> <li>Hotel and Leisure Facilities Management</li> <li>Internetworking &amp; Communications</li> <li>Logistics Management</li> <li>Logistics Engineering &amp; Management</li> <li>Marine &amp; Offshore Technology / Marine &amp; Offshore Technology (with Minor in Business Management)</li> <li>Mechatronics Engineering / Mechatronics Engineering (with Minor in Business Management)</li> <li>Mechatronics Engineering / Mechatronics Engineering (with Minor in Business Management)</li> <li>Network Systems &amp; Security</li> <li>Product Design &amp; Innovation</li> <li>Quality Assurance Engineering</li> </ul> |



| Polytechnic              | Acceptable Diplomas for all Engineering Majors  |
|--------------------------|---|
| Ngee Ann<br>Polytechnic  | <ul> <li>Quality Management &amp; Engineering</li> <li>Real Estate Business</li> <li>Shipbuilding &amp; Offshore Engineering</li> <li>Shipbuilding &amp; Repair Technology</li> <li>Sustainable Urban Design &amp; Engineering</li> </ul>   |
| Republic Polytechnic     | <ul> <li>Aerospace Avionics</li> <li>Aerospace Engineering</li> <li>Aerospace Engineering (Quality Systems)</li> <li>Aviation Management</li> <li>Biomedical Electronics</li> <li>Biomedical Electronics Engineering</li> <li>Civil Aviation</li> <li>Communications &amp; Automation Electronics</li> <li>Digital Entertainment Electronics</li> <li>Electrical and Electronic Engineering</li> <li>Electronics Engineering</li> <li>Engineering Design with Business</li> <li>Engineering Systems and Management</li> <li>Green Building Energy Management</li> <li>Industrial &amp; Operations Management</li> <li>Industrial &amp; Systems Engineering</li> <li>Interactive &amp; Digital Media</li> <li>IT Service Management</li> <li>Materials Science</li> <li>Micro &amp; Nanotechnology</li> <li>Renewable Energy Engineering</li> <li>Supply Chain Management</li> </ul> |
| Singapore<br>Polytechnic | <ul> <li>Aeronautical Engineering</li> <li>Aerospace Electronics</li> <li>Applied Chemistry</li> <li>Applied Chemistry with Materials Science</li> <li>Applied Chemistry with Pharmaceutical Science</li> <li>Bioelectronics</li> <li>Bioengineering</li> <li>Chemical Engineering</li> <li>Chemical Process Technology</li> <li>Civil Engineering</li> <li>Civil &amp; Structural Engineering</li> <li>Civil Engineering and Management</li> <li>Civil Engineering with Business</li> <li>Clean Energy</li> <li>Computer &amp; Network Technology</li> <li>Computer Engineering</li> <li>Electrical &amp; Computer Control Engineering</li> <li>Electrical Engineering</li> <li>Electronics, Computer &amp; Communication Engineering</li> </ul>   |



| Polytechnic              | Acceptable Diplomas for all Engineering Majors  |
|--------------------------|---|
| Singapore<br>Polytechnic | <ul> <li>Electronics &amp; Communications Engineering</li> <li>Electronic, Computer &amp; Communication Engineering (Biomedical Engineering option)</li> <li>Electrical &amp; Electronic Engineering</li> <li>Energy Systems and Management</li> <li>Engineering Systems</li> <li>Engineering with Business</li> <li>Environmental Management &amp; Water Technology</li> <li>Facilities Management</li> <li>Food Science and Technology</li> <li>Games Design &amp; Development</li> <li>Hotel and Leisure Facilities Management</li> <li>Info-Communication Engineering &amp; Design</li> <li>Information Communication Technology</li> <li>Instrumentation &amp; Control Engineering</li> <li>Integrated Events and Project Management</li> <li>Manufacturing Engineering</li> <li>Marine Engineering</li> <li>Materials Engineering</li> <li>Materials Science</li> <li>Mechatronics</li> <li>Mechatronics and Robotics</li> <li>Process Engineering</li> <li>Resort Facilities Services and Management</li> <li>Structural Engineering</li> <li>Resort Facilities Services and Management</li> <li>Structural Engineering</li> </ul> |
| Temasek Polytechnic      | <ul> <li>Aerospace Electronics</li> <li>Aerospace Engineering</li> <li>Aviation Management</li> <li>Aviation Management &amp; Services</li> <li>Biomedical Engineering</li> <li>Biomedical Informatics &amp; Engineering</li> <li>Business Process &amp; Systems Engineering</li> <li>Chemical Engineering</li> <li>Clean Energy</li> <li>Computer Engineering</li> <li>Cyber &amp; Digital Security</li> <li>Cybersecurity &amp; Digital Forensics</li> <li>Digital Forensics</li> <li>Electronics</li> <li>Game &amp; Entertainment Technology</li> <li>Game Design &amp; Development</li> <li>Green Building &amp; Sustainability</li> <li>Infocomm &amp; Network Engineering</li> <li>Information Technology</li> </ul>   |



| Polytechnic         | Acceptable Diplomas for all Engineering Majors   |
|---------------------|--|
| Temasek Polytechnic | <ul> <li>Integrated Facility Management</li> <li>Media &amp; Communication Technology</li> <li>Mechatronics</li> <li>Microelectronics</li> <li>Mobile &amp; Network Services</li> <li>Quality Engineering</li> <li>Quality Engineering &amp; Management</li> <li>Telecommunications</li> </ul> |

## **Acceptable Diplomas for Computer Engineering Major**

Advanced Placement Credits (APCs) will be granted for engineering freshmen who have diplomas accredited to the Computer Engineering Major.

## The APCs granted are:

Unrestricted Elective Modules: 20 MCs
 EG3611P Industrial Attachment: 10 MCs

DTK1234 Design Thinking: 4 MCsEG1311 Design and Make: 4 MCs

Total: 38 MCs

| Polytechnic         | Acceptable Diplomas for Computer Engineering Major   |
|---------------------|--|
| Nanyang Polytechnic | <ul> <li>Aerospace Systems &amp; Management</li> <li>Biomedical Engineering</li> <li>Business Enterprise IT</li> <li>Business Intelligence &amp; Analytics</li> <li>Cyber Security &amp; Forensics</li> <li>Cybersecurity &amp; Digital Forensics</li> <li>Digital Entertainment Technology</li> <li>Electrical Engineering with Eco-Design</li> <li>Electronic Systems</li> <li>Electronics, Computer &amp; Communication Engineering</li> <li>Electronics, Computer &amp; Control Engineering</li> <li>Engineering Informatics</li> <li>Financial Informatics</li> <li>Game Development &amp; Technology</li> <li>Infocomm and Security</li> <li>Information Security</li> <li>Information Technology</li> <li>Mechatronics Engineering</li> <li>Multimedia &amp; Infocomm Technology</li> </ul> |



| Polytechnic             | Acceptable Diplomas for Computer Engineering Major   |
|-------------------------|--|
| Nanyang Polytechnic     | <ul> <li>Multimedia Systems Engineering</li> <li>Robotics &amp; Mechatronics</li> <li>Telematics &amp; Media Technology</li> </ul>   |
| Ngee Ann<br>Polytechnic | <ul> <li>Aerospace Electronics / Aerospace Electronics (with Minor in Business Management)</li> <li>Aerospace Technology / Aerospace Technology (with Minor in Business Management)</li> <li>Audio-visual Technology / Audio-visual Technology (with Minor in Business Management)</li> <li>Automation Mechatronic Systems / Automation Mechatronic Systems (with Minor in Business Management)</li> <li>Biomedical Engineering / Biomedical Engineering (with Minor in Business Management)</li> <li>Business Information Technology</li> <li>Clean Energy Management</li> <li>Cybersecurity &amp; Digital Forensics</li> <li>Electrical Engineering / Electrical Engineering (with Minor in Business Management)</li> <li>Electrical &amp; Electronic Engineering</li> <li>Electronic Engineering</li> <li>Electronic Engineering</li> <li>Electronics &amp; Computer Engineering / Electronic &amp; Computer Engineering (with Minor in Business Management)</li> <li>Electronics &amp; Telecommunications Engineering</li> <li>Engineering Science</li> <li>Information Technology</li> <li>Information Technology (Mobile Computing)</li> <li>Internetworking &amp; Communications</li> <li>Mechatronics Engineering / Mechatronics Engineering (with Minor in Business Management)</li> <li>Mobile Business Solutions</li> <li>Network Systems &amp; Security</li> </ul> |
| Republic Polytechnic    | <ul> <li>Aerospace Avionics</li> <li>Biomedical Electronics Engineering</li> <li>Business Applications</li> <li>Business Computing</li> <li>Business Information Systems</li> <li>Communications &amp; Automation Electronics</li> <li>Digital Entertainment Electronics</li> <li>Electrical and Electronic Engineering</li> <li>Electronics Engineering</li> <li>Green Building Energy Management</li> <li>Infocomm Security Management</li> <li>Information Technology</li> <li>Industrial &amp; Operations Management</li> <li>Interactive &amp; Digital Media</li> <li>IT Service Management</li> <li>Mobile Software Development</li> </ul>   |



| Polytechnic              | Acceptable Diplomas for Computer Engineering Major   |
|--------------------------|--|
| Republic Polytechnic     | Renewable Energy Engineering     Supply Chain Management   |
| Singapore<br>Polytechnic | <ul> <li>Aerospace Electronics</li> <li>Bioelectronics</li> <li>Business Information Technology</li> <li>Clean Energy</li> <li>Computer Information Systems</li> <li>Computer &amp; Network Technology</li> <li>Computer Engineering</li> <li>Digital Media</li> <li>Electronics, Computer &amp; Communication Engineering</li> <li>Electronics &amp; Communications Engineering</li> <li>Electrical &amp; Electronic Engineering</li> <li>Energy Systems and Management</li> <li>Engineering Systems</li> <li>Engineering with Business</li> <li>Financial Informatics</li> <li>Games Design &amp; Development</li> <li>Info-Communication Engineering &amp; Design</li> <li>Information Communication Technology</li> <li>Infocomm Security Management</li> <li>Information Technology</li> <li>Mechatronics</li> <li>Mechatronics and Robotics</li> <li>Multimedia Software Engineering</li> <li>Multimedia Technology</li> </ul> |
| Temasek Polytechnic      | <ul> <li>3D Interactive Media Technology</li> <li>Aerospace Electronics</li> <li>Aerospace Engineering</li> <li>Big Data &amp; Analytics</li> <li>Big Data Management &amp; Governance</li> <li>Biomedical Engineering</li> <li>Biomedical Informatics &amp; Engineering</li> <li>Business Intelligence &amp; Analytics</li> <li>Clean Energy</li> <li>Computer Engineering</li> <li>Cyber &amp; Digital Security</li> <li>Cybersecurity &amp; Digital Forensics</li> <li>Digital Forensics</li> <li>Electronics</li> <li>Financial Business Informatics</li> <li>Game &amp; Entertainment Technology</li> <li>Game Design &amp; Development</li> <li>Green Building &amp; Sustainability</li> <li>Infocomm &amp; Network Engineering</li> <li>Information Management</li> <li>Information Technology</li> </ul>   |

## College of Design and Engineering

Dean's Office (Office of Undergraduate Programmes)



| Polytechnic         | Acceptable Diplomas for Computer Engineering Major   |
|---------------------|--|
| Temasek Polytechnic | <ul> <li>Interactive Media Informatics</li> <li>Internet &amp; Multimedia Development</li> <li>Media &amp; Communication Technology</li> <li>Mechatronics</li> <li>Microelectronics</li> <li>Mobile &amp; Network Services</li> <li>Mobile &amp; Wireless Computing</li> <li>Telecommunications</li> </ul> |