

**Courses taken by students in Environmental Earth Systems Science with 2<sup>nd</sup> Major in Sustainability  
(from AY23-24 onwards)**

<b>EESS Major Core</b>		
<b>Course Code</b>	<b>Course Title</b>	<b>AU</b>
ES0001	Physical Environments of Singapore	3
ES0138	Introduction to Scientific Writing	2
ES1001	Environment and Society	4
ES1003	Solid Earth	4
ES1006	Introductory Field Experience	4
ES1007	Climate Change	3
ES2001	Computational Earth Systems Science	4
ES2003	Biosphere	4
ES2802	GIS and the Earth System	3
MH1802	Calculus for the Sciences	4



<b>EESS Specialisation</b>
<p>Students can choose either one of the specialisations below:</p> <ul style="list-style-type: none"> <li>• Geosciences or</li> <li>• Ecology and Ecosystems or</li> <li>• Society and the Earth Systems</li> </ul>



<b>Second Major in Sustainability</b>
<p><b>Course Requirements for Second Major in Sustainability</b></p> <p>To be awarded the Second Major in Sustainability, students are required to complete:</p> <ul style="list-style-type: none"> <li>• 1 core course in each knowledge area (People, Planet, Profit, Practice and Policy)</li> <li>• Elective courses</li> <li>• Interdisciplinary project (3 AU)</li> </ul> <p>A minimum total of 30 AU has to be completed (core courses in each knowledge area + electives + interdisciplinary project).</p>

<b>Core Courses</b>		
<b>(To complete at least 1 course in each knowledge area – People, Planet, Profit, Practice and Policy)</b>		
<b>Knowledge Area</b>	<b>Course Title</b>	<b>AU</b>
1) People	<a href="#">EM5109 Environmental Issue &amp; Sustainability</a>	3
	<a href="#">ES5006 Environmental Sustainability</a> (not eligible to ESSN/ASE students)	3
	<a href="#">HV5001 Introduction to Environmental Humanities</a>	3
2) Planet	<a href="#">ES5001 Natural Hazards and Society</a> (not eligible to ESSN/ASE students)	3
	<a href="#">ES5005 Environmental Earth System Science</a> (not eligible to ESSN/ASE students)	3
	<a href="#">ES5007 Climate and Climate Change</a> (not eligible to ESSN/ASE students) OR <a href="#">ES1007 Climate Change (only for ESSN students)</a>	3
3) Profit	<a href="#">AB0603 Social Entrepreneurship</a>	3
	<a href="#">HE5091 Principles of Economics</a>	3
4) Practice	<a href="#">EM5103 Water Resources Management</a>	3
	<a href="#">EM5104 Air Quality Management</a>	3
	<a href="#">EG1001 Engineers in Society</a>	2
	<a href="#">BM2517 Marketing Sustainability for the Next Generation</a>	3
5) Policy	<a href="#">HU1002 Introduction to Urban Planning</a>	
	<a href="#">HA1001 Introduction to International Relations and Foreign Policy</a>	3
	<a href="#">HA1003 Introduction to Public Administration and Public Policy</a>	3

Elective Courses		
Knowledge Area	Course Title	AU
1) People	<a href="#">ES3201 Coupled Human and Natural Systems*</a>	4
	<a href="#">ES3202 Resilient Urban Systems*</a>	3
	<a href="#">HC2017 Writing on Places: Nativism, Ecology, Politics 地文誌: 从乡土文学到生态批评 (Offered in Mandarin)*</a>	3
	<a href="#">HC3043 Chinese Ecological Thoughts and Philosophy 古今生态思想与哲学(offered in Mandarin)</a>	3
	<a href="#">HC5010 Animals in Chinese Cultures</a>	3
	<a href="#">HL4013 Advanced Studies in Literature &amp; Culture: Ecocritical Approaches to Literature*</a>	4
	<a href="#">HG2027 Ecolinguistics: Language and the Environment</a>	3
	<a href="#">HY2008 Environmental Ethics</a>	3
	<a href="#">HP3206 Environmental Psychology*</a>	3
2) Planet	<a href="#">EM5101 Environmental Quality</a>	3
	<a href="#">ES2303 Introduction to Ecology*</a>	3
	<a href="#">ES3103 Sea-level Rise and Coastal Processes</a>	2
	<a href="#">ES3302 Tropical Ecology*</a>	3
	<a href="#">ES3305 Current issues in Ecology*</a>	3
	<a href="#">ES3306 Global Change Ecology*</a>	3
	<a href="#">ES4301 Conservation Biology and Biodiversity*</a>	3
	<a href="#">ES4303 Marine and Freshwater Ecology*</a>	3

	<a href="#">HH3042 Climate and Society in Historical Perspective</a>	3
	<a href="#">HH4006 The Green Earth: Issues in Environmental History*</a>	4
	<a href="#">HH3017 World Environmental History</a>	3
	<a href="#">HH3018 The Environmental History of Oceans</a>	3
3) Profit	<a href="#">BF2228 Sustainable Finance</a>	3
	<a href="#">HE2010 Development Economics*/ HE3021 Intermediate Econometrics*#</a>	3
	<a href="#">HE3602/HE3032# Game Theory &amp; Applications to Social Science*</a>	3
	<a href="#">HE3005 Environmental Economics*/ HE3024 Introduction to Applied Economic Policy Research*#</a>	3
	<a href="#">HE3613/HE3026# Urban Economics*</a>	3
	<a href="#">HE4010/HE4042# Singapore Economy in a Globalized World*</a>	4
	<a href="#">HE4040 Behavioural Economics*</a>	4
4) Practice	<a href="#">BU5102 Sustainability Reporting*</a>	
	<a href="#">CM5091 Industrial and Environmental Chemistry</a>	3
	<a href="#">CS5209 Collective Problem Solving</a>	3
	<a href="#">HP1100 Fundamentals of Social Science Research or CS2008 Fundamentals of Research</a>	3
	<a href="#">MS4664 Environmental Sustainability and Materials*</a>	3
	<a href="#">MS4666 Environmental Degradation of Plastics*</a>	1
	<a href="#">EE2005 Electrical Devices &amp; Machines*</a>	3

	<a href="#">EE3015 Power Systems &amp; Conversion*</a>	3
	<a href="#">EE4503 Power Engineering Design*</a>	2
	<a href="#">EE4504 Design of Clean Energy Systems*</a>	2
	<a href="#">EE4530 Power System Analysis &amp; Control*</a>	3
	<a href="#">EE4532 Power Electronics &amp; Drives*</a>	3
	<a href="#">EE4533 Power Apparatus &amp; System Protection*</a>	3
	<a href="#">EE4534 Modern Distribution Systems with Renewable Resource*</a>	3
5) Policy	<a href="#">AB0301 Legal and Ethical Issues in Sustainability</a>	3
	<a href="#">CS4311 Promoting Sustainability</a>	4
	<a href="#">ES2201 Law &amp; Economics, Sustainable Development, and Environmental Protection</a>	4
	<a href="#">ES2202 Global Environmental Politics and Governance*</a>	4
	<a href="#">ES4201 Environmental Management and Valuation*</a>	3
	<a href="#">HA3014 Singapore Foreign Policy*</a>	3
	<a href="#">HP3203 Conservation Psychology*</a>	3
	<a href="#">HS0301 Environmental Sustainability</a>	3
	<a href="#">HS2023 Environmental Sociology*</a>	3

# Students who matriculated in AY2021-2022 or later should choose these course codes.

\* Pre-requisites apply

**ICC (University Level)**

<b>Courses</b>	<b>AU</b>	<b>Semester</b>
Inquiry and Communication in an Interdisciplinary World	2	Year 1 Sem 1
Ethics & Civics in a Multi-Cultural World	2	Year 1 Sem 1
Navigating the Digital World	2	Year 1 Sem 2
Healthy Living & Mental Wellbeing	3	Year 1 Sem 2
Career & Entrepreneurial Development for the Future World	2	Year 2 Sem 2
Science & Technology for Humanity	3	Year 2 Sem 1
Sustainability: Human, Social, Economic & Environment	3	Year 2 Sem 1
<b>Total AU</b>	<b>17</b>	

**ICC (College Level)**

<b>Courses</b>	<b>AU</b>	<b>Semester</b>
Fundamentals of Data Science for Earth and Environmental Systems Science	3	Year 3 Sem 2
Communication course	2	Year 3
Professional Attachment	5	Year 4
<b>Total AU</b>	<b>10</b>	