

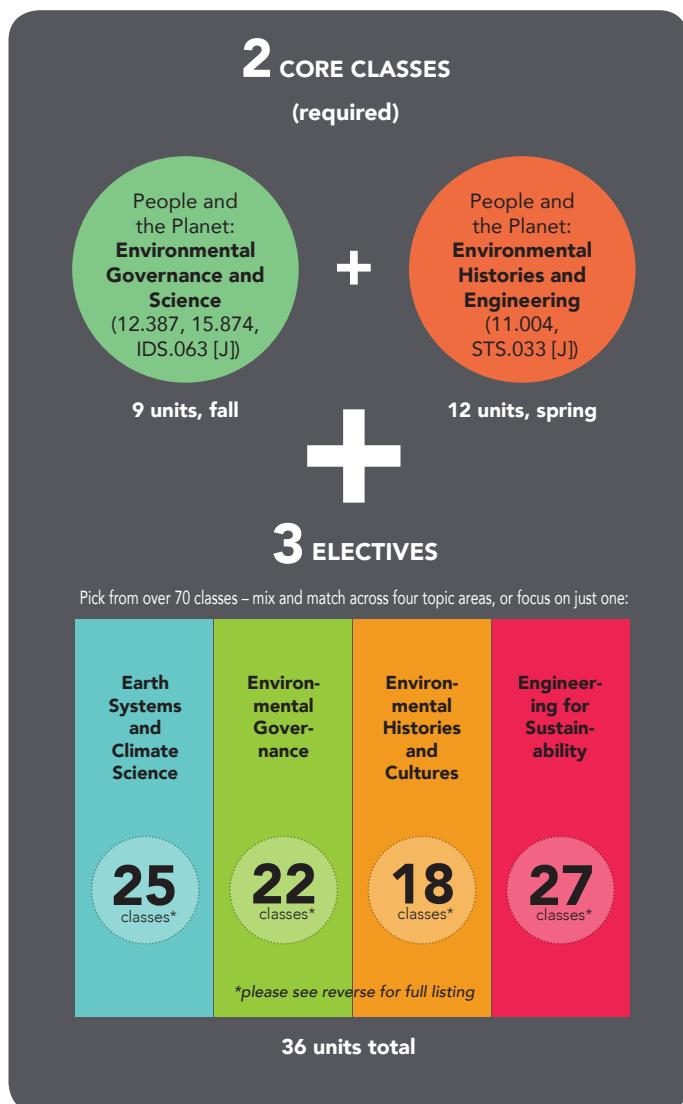
# NEW UNDERGRADUATE MINOR IN ENVIRONMENT & SUSTAINABILITY

## WHO should take it?

MIT undergraduates in all majors: problem-solvers, critical thinkers, storytellers, designers, programmers – ALL are welcome!

## WHY should I take it?

- investigate and apply your knowledge to important, challenging, real-world problems
- make a difference in the world
- learn how to advance environmental solutions and forge a healthier, more humane world



## WHAT does it include?

Coursework and in-class activities span:

Water • Cities • Food • Climate • Pollution • Technology  
• Justice • International Regulation •  
Sensors & Data Analysis

plus

Hands-on projects • Policy simulations • Design exercises  
• Systems modeling • In-depth case studies • MIT campus and local community applications

## WHEN can I apply?

Anytime! Required core classes are offered fall and spring semesters. Several electives are open for first year enrollment. Connect with advisors and enroll in the E&S Minor early in your MIT career to make the most of your program: email [esi@mit.edu](mailto:esi@mit.edu) to sign up.

## HOW do I find an advisor?

Email [esi@mit.edu](mailto:esi@mit.edu). Students enrolled in the E&S Minor are matched with a faculty-led advising group; the group will meet monthly to discuss topics ranging from career exploration and research trends, to subject selection and fitting the Minor into your major and interests.

## WHERE do I get more information?

Minor: [environment.mit.edu](http://environment.mit.edu)

UROPs, independent student projects, groups, and events: [environmentalsolutions.mit.edu](http://environmentalsolutions.mit.edu)

Email: [esi@mit.edu](mailto:esi@mit.edu)

Like us at Facebook ([mitesi](#)) and Twitter ([mit\\_esi](#))

## Elective Subjects for Environment & Sustainability Minor

Pick from over 70 classes – mix and match across four topic areas, or focus on just one:

Subject number	Subject title	Units and (GIRs fulfilled)			
EC.701[J]	D-Lab: Development	12 (HASS-S)	x	x	x
EC.711[J]	D-Lab: Energy	12	x	x	x
EC.714	D-Lab: Earth	6	x	x	x
EC.715	D-Lab: Water, Sanitation, Hygiene and Environmental Innovations for the Common Good	9	x	x	x
EC.716	D-Lab: Waste	9	x	x	x
EC.733[J]	D-Lab: Supply Chains	12	x	x	x
IDS.062[J]	Global Environmental Negotiations	6	x	x	x
SP.360	Terrascope Radio	12 (HASS-A; Cl-H)	x	x	x
STS.009	Evolution and Society	12 (HASS-H; Cl-H)	x	x	x
STS.032	Energy, Environment, and Society	12 (HASS-H; Cl-H)	x	x	x
1.007	Big Engineering: Small Solutions with a Large Impact	6	x	x	x
1.011	Project Evaluation and Management	12	x	x	x
1.018A[J]	Fundamentals of Ecology I & 1.018B[J]	12	x	x	x
1.078	Introduction to Soil Science	12	x	x	x
1.080A	Environmental Chemistry I	12	x	x	x
& 1.080B	and Environmental Chemistry II	12	x	x	x
1.089	Environmental Microbiology	12	x	x	x
or 1.089A	Environmental Microbiology I	6	x	x	x
1.801[J]	Environmental Law, Policy, and Economics: Pollution Prevention and Control	12 (HASS-S)	x	x	x
1.802[J]	Regulation of Chemicals, Radiation, and Biotechnology	12	x	x	x
2.00A	Fundamentals of Engineering Design: Explore Space, Sea and Earth	9	x	x	x
2.00C	Design for Complex Environmental Issues: Building Solutions and Communicating Ideas	9	x	x	x
2.627	Fundamentals of Photovoltaics	12	x	x	x
2.981	New England Coastal Ecology	3	x	x	x
3.094	Materials in Human Experience	9 (HASS-S)	x	x	x
3.982	The Ancient Andean World	9 (HASS-S)	x	x	x
3.983	Ancient Mesoamerican Civilization	9 (HASS-S)	x	x	x
4.401	Environmental Technologies in Buildings	12	x	x	x
4.411[J]	D-Lab Schools: Building Technology Laboratory	12 (Institute LAB)	x	x	x
4.42[J]	Fundamentals of Energy in Buildings	12 (REST)	x	x	x
4.432	Modeling Urban Energy Flows for Sustainable Cities and Neighborhoods	12	x	x	x
4.622	Islamic Gardens and Geographies	12	x	x	x
8.21	Physics of Energy	12 (REST)	x	x	x
10.04	A Philosophical History of Energy	12	x	x	x
10.05	Foundational Analyses of Problems in Energy and the Environment	12	x	x	x
11.016[J]	The Once and Future City	12 (HASS-H; Cl-H)	x	x	x
11.123	Big Plans and Mega-Urban Landscapes	9 (HASS-S)	x	x	x
11.142	Geography of the Global Economy	12 (HASS-S)	x	x	x
11.148	Environmental Justice: Law and Policy	12 (HASS-S)	x	x	x
11.162	Politics of Energy and the Environment	12 (HASS-S)	x	x	x

Subject number	Subject title	Units and (GIRs fulfilled)			
12.000	Solving Complex Problems	9	x	x	x
12.001	Introduction to Geology	12 (REST)	x	x	x
12.002	Introduction to Geophysics and Planetary Science	12 (REST)	x	x	x
12.003	Introduction to Atmosphere, Ocean, and Climate Dynamics	12 (REST)	x	x	x
12.007	Geobiology: History of Life on Earth	12	x	x	x
12.021	Earth Science, Energy, and the Environment	12	x	x	x
12.102	Environmental Earth Science	12	x	x	x
12.104	Geochemistry of the Earth and Planets	12	x	x	x
12.120	Environmental Earth Science Field Course	6	x	x	x
12.170	Essentials of Geology	12	x	x	x
12.174	Biogeochemistry of Natural and Perturbed Systems	12	x	x	x
12.213	Alternative Energy Sources	6	x	x	x
12.307	Weather and Climate Laboratory	15 (Institute LAB)	x	x	x
12.335	Experimental Atmospheric Chemistry	12 (Institute LAB)	x	x	x
12.349	Mechanisms and Models of the Global Carbon Cycle	12	x	x	x
12.385	Science, Politics, and Environmental Policy	9	x	x	x
17.051	Ethics of Energy Policy	12 (HASS-S)	x	x	x
17.181	Sustainability: Political Economy, Science, and Policy	12 (HASS-S)	x	x	x
17.309[J]	Science, Technology, and Public Policy	12 (HASS-S; Cl-H)	x	x	x
17.411	Globalization, Migration, and International Relations	12 (HASS-S)	x	x	x
20.106[J]	Systems Microbiology	12	x	x	x
21A.155	Food, Culture, and Politics	12 (HASS-S)	x	x	x
21A.303[J]	The Anthropology of Biology	12 (HASS-S)	x	x	x
21A.410	Environmental Struggles	12 (HASS-S)	x	x	x
21G.417	Cultural Geographies of Germany, Nature, Culture, and Politics	12 (HASS-H)	x	x	x
21H.185[J]	Environment and History	12 (HASS-S; Cl-H)	x	x	x
21H.380[J]	People and Other Animals	12 (HASS-S)	x	x	x
21H.383	Technology and the Global Economy, 1000-2000	12 (HASS-S)	x	x	x
21L.449	The Wilds of Literature	12 (HASS-H)	x	x	x
21W.012	Writing and Rhetoric: Food for Thought	12 (HASS-H; Cl-H)	x	x	x
21W.036	Science Writing and New Media: Writing and the Environment	12 (HASS-H; Cl-H)	x	x	x
21W.775	Writing about Nature and Environmental Issues	12 (HASS-H; Cl-H)	x	x	x
22.033	Nuclear Systems Design Project	15	x	x	x
22.040[J]	Social Problems of Nuclear Energy	12 (HASS-S)	x	x	x
22.081[J]	Introduction to Sustainable Energy	12	x	x	x
24.03	Good Food: The Ethics and Politics of Food	12 (HASS-H; Cl-H)	x	x	x

Check the current course catalog for updated information on subject availability.

Additional subjects may be counted toward the Minor elective requirement in consultation with Minor advisors.

Contact [esi@mit.edu](mailto:esi@mit.edu) with questions.