TRANSFER GUIDE FOR OREGON STATE UNIVERSITY

Major Offered At:

CORVALLIS ECAMPUS

Tillamook Bay Community College

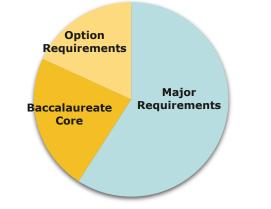
Natural Resources Major with Fish & Wildlife Conservation Option

Natural Resources students are passionate about the world around them. They collaborate to preserve and protect the natural world for future generations. Completing this option prepares students for careers natural resource and wildlife conservation.

It emphasizes understanding the relationship between animal species and their habitat requirements and ability to apply that knowledge to the management of ecosystems as a means of conserving fish and wildlife.

Your Bachelor's Degree (BS) in Natural Resources

CASCADES



- A minimum of 180 credits are required for graduation; 60 must be upper division (300 and 400-level courses).
 - A maximum of 135 credits earned at a community college may be applied toward a bachelor's degree at OSU.
- Only courses with letter prefixes and numbers above 100 are accepted.
- <u>more info at forestry.oregonstate.edu/undergraduate-</u> programs/natural-resources/fish-and-wildlifeconservation

Courses Required for Natural Resources Major

NR Core Requirements	TBCC Course	OSU Course	Notes
Complete one course per category		550.405	
Consensus and Natural Resources		FES 485	Available online at OSU
Managing Nat Res for the Future	NAT 201	NR 201	Available online at OSU
Natural Resource Problems & Solutions		NR 202	Available online at OSU
Natural Resources Decision Making		NR 455	Available online at OSU
Advanced Communication:			
Intro to Communication Theory		COMM 321	
Small Group Problem Solving	COMM 215	COMM 322	
Communication in Organizations		COMM 324	
Intercultural Communication	COMM 140	COMM 326	
Non-Verbal Communication		COMM 328	Available online at OSU
Communication and Culture in Cyberspace		COMM 385	Available online at OSU
Theories of Conflict and Conflict Management		COMM 440	
Bargaining and Negotiating Processes		COMM 442	
Forest as Classroom		FES 430	Available online at OSU
Effective Comm in Fish & Wildlife Sciences		FW 489	Available online at OSU
Critical thinking for NR Challenges		NR 312	
Environmental Interpretation		TRAL 493	Available online at OSU
Technical Writing	WR 227	WR 327	Available online at OSU
Science Writing		WR 362	Available online at OSU
Environmental Writing		WR 462	
Professional Writing		WR 466	
Biology I			
Introduction to Biology I		BI 204	Available online at OSU
Principles of Biology: Cells	BI 211	BI 221	
Biology II			
Introduction to Biology II		BI 205	Available online at OSU
Principles of Biology: Organisms	BI 213	BI 222	



NR Core Requirements (continued) Complete one course per category	TBCC Course	OSU Course	Notes
Biology III			
Introduction to Biology III		BI 206	Available online at OSU
Principles of Biology: Populations	BI 212	BI 223	
Chemistry			
General Chemistry I with Lab		CH 121	Available online at OSU
General Chemistry (Majors) I with Lab	CH 221	CH 231 & 261	Available online at OSU
Climate Science			
Climate Science		ATS 201	Available online at OSU
Global Change Biology		FW 345	
Climatology		GEOG 323	Available online at OSU
Intro to Climate Change		SUS 103	Available online at OSU
Earth or Soil Science			
Soil Science		CSS 205	Available online at OSU
Principles of Soil Science		CSS 305	
The Solid Earth	GS 106	GEO 101	Available online at OSU
Physical Geology	G 201	GEO 201	
Earth Systems Science	G 202	GEO 202	
Environmental Geology	0 202	GEO 221	Available online at OSU
Physical Geography		GEOG 102	Available online at OSU
Soil Science with Lab	SOIL 205	SOIL 205 & 206	
Soil Science with Forest Soils Lab	SOIL 205	SOIL 205 & FOR 206	
Ecology	5012 205	5012 205 01 01(200	
Marine Ecology		BI 351	Available online at OSU
General Ecology		BI 370	Available online at OSU
Plant Ecology		BOT 341	Available online at OSU
Forest Ecology		FES 341	Available online at OSU
Mathematics		123 341	Available offinite at 050
Elementary Functions	MTH 112	MTH 112	Available online at OSU
Calculus for Mgmt, Life, and Social Science	MTH 241	MTH 241	Available online at OSU
Math for Mgmt, Life, and Social Science	1111 241	MTH 245	Available online at OSU
Differential Calculus	MTH 251	MTH 251	Available online at OSU
Statistics	1111231		
Principles of Statistics	MTH 243	ST 201	Available online at OSU
Intro to Statistical Methods	1111 245	ST 351	Available online at OSU
Animal ID		51 551	
Terrestrial Vertebrate ID & Natural History		FOR 210	
Forest Entomology		FES 412	
Systematics of Birds		FW 312	Available online at OSU
Systematics of Fishes		FW 316	Available online at OSU
Systematics of Mammals		FW 318	Available online at OSU
Biology of Insects		Z 365	Available offine at 050
Herpetology		Z 473	Available online at OSU
Aquatic Entomology		Z 477	Available online at 050
Environ. Assessment & Planning	1	2 177	
Ecological Restoration		FES/FW 445	Available online at OSU
Ecosystems Services		FW 462	Available online at OSU
Land Use Planning for Sust. Communities		GEOG 250	Available online at OSU
Land Use in the American West		GEOG 450	
Planning Principles for Resilient Communities		GEOG 451	
Sustainable Site Planning		GEOG 451	Available online at OSU
Scientific Methods for Analyzing NR Problems		NR 325	
Wildland restoration and Ecology		RNG 421	Available online at OSU
Habitat Analysis I		RNG 421 RNG 457	Available online at OSU
Rangeland Management and Planning		RNG 490	Available online at OSU
Sustainability Assessment		SUS 304	Available online at OSU
Sustainable Communities		SUS 350	Available online at OSU
Planning for Sustainable Recreation		TRAL 456	
Planning for Sustainable Tourism		TRAL 450	
FIGHTING TOT SUSTAILIANCE TOULISTI		IRAL 437	

NR Core Requirements (continued) Complete one course per category	TBCC Course	OSU Course	Notes
Fish & Marine Sciences			
Intro to Marine Biology Biology of Marine Mammals		BI 150 FW 302	Available online at OSU
Oceans in Peril		BI 347	Available online at OSU
Marine Ecology		BI 351	Available online at OSU
Intro to Population Dynamics		FW 320	Available online at OSU
Mgmt Principles of Pacific Salmon in the NW		FW 323	Available online at OSU
Coastal Ecology and Resource Management		FW 426	Available online at OSU
Fishery Biology		FW 454	Available online at OSU
Marine Fisheries		FW 465	
Fish Ecology		FW 473	Available online at OSU
Wildlife Ecology		FW 481	Available online at OSU
Oceanography	GS 108	OC 201	Available online at OSU
Coastal Oceanography	00 100	OC 332	
Forestry		00002	
International Forestry		FE/FOR 456	
Forest Biology	FOR 240	FES 240	Available online at OSU
Forest Ecology	101(240	FES 341	Available online at OSU
Forest Types of the Northwest		FES 342	Available online at OSU
Urban Forestry Wildland Fire Ecology		FES/HORT 350 FES 440	Available online at OSU Available online at OSU
Wildland Fire Ecology		FES 440 FES/FW 445	
Ecological Restoration		- /	Available online at OSU
Biodiversity Conservation in Managed Forests		FES/FW 452	Available online at OSU
Agroforestry		FES/NR 477	Available enline at OCU
Topics in Wildland Fire		FOR 346 FOR 441	Available online at OSU
Silviculture Principles Land & Water		FOR 441	
Watershed Processes		FE 430	Available online at OSU
Forest Watershed Management		FE 434	Available online at 030
Integrated Watershed Management		FW 326	Available online at OSU
Freshwater Ecology and Conservation		FW 456	Available online at OSU
		FW 430 FW 479	Available online at OSU
Wetlands and Riparian Ecology		GEO 306	
Minerals, Energy, Water and the Environment			Available online at OSU
National Park Geology and Preservation		GEO 307	Available online at OSU
Global Change and Earth Sciences		GEO 308	Available online at OSU
Introduction to Water Science & Policy		GEOG 340	Available online at OSU
Water Resources Management in the U.S.		GEOG 440	
International Water Resource Management		GEOG 441	Available online at OSU
Desert Water Shed Management		RNG 355	Available online at OSU
Riparian Ecohydrology and Management		RNG 455	Available online at OSU
Ecosystems of Wildland Soils		SOIL 366	Available online at OSU
Soil Systems and Plant Growth		SOIL 388	Available online at OSU
World Soil Resources		SOIL 395	Available online at OSU
Soil Morphology and Classification		SOIL 466	Available online at OSU
Range		550 440	
Wildland Fire Ecology		FES 440	Available online at OSU
Ecological Restoration		FES/FW 445	Available online at OSU
Topics in Wildland Fire		FOR 346	Available online at OSU
Rangeland Ecology and Management		RNG 341	Available online at OSU
Range Ecology I – Grasslands		RNG 351	Available online at OSU
Range Ecology II – Shrub Lands		RNG 352	Available online at OSU
Wildland Restoration and Ecology		RNG 421	Available online at OSU
Rangeland Analysis		RNG 441	Available online at OSU
Rangeland-Animal Relations		RNG 442	Available online at OSU
Rangeland Management and Planning		RNG 490	Available online at OSU
Vegetation ID			
Diant Systematics		BOT 321	
Plant Systematics		BOT 414	
Agrostology			
Agrostology Flora of the Pacific Northwest		BOT 425	
Agrostology Flora of the Pacific Northwest Dendrology	FOR 241		Available online at OSU
Agrostology Flora of the Pacific Northwest Dendrology Landscape Plant Materials I: Decid & Conifers	FOR 241	BOT 425 FES 241 HORT 226	Available online at OSU
Agrostology Flora of the Pacific Northwest Dendrology	FOR 241	BOT 425 FES 241	

NR Core Requirements (continued) Complete one course per category	TBCC Course	OSU Course	Notes
Wildlife Management			
Introductory Population Dynamics		FW 320	Available online at OSU
Applied Community and Ecosystem Ecology		FW 321	Available online at OSU
Wildlife in Agricultural Ecosystems		FW 435	Available online at OSU
Avian Conservation and Management		FW 451	Available online at OSU
Biodiversity Conservation in Managed Forests		FES/FW 452	Available online at OSU
Mammal Conservation and Management		FW 458	Available online at OSU
Wildlife Ecology		FW 438	Available online at OSU
Animal Behavior		Z 350	Available online at OSU
		2 330	Available offinite at 050
Ethics & Philosophy		10.201	
Ecosystems Science of the PNW Indians		AG 301	Available online at OSU
Anthropology, Health, and the Environment		ANTH 352	Available online at OSU
Ecological Anthropology		ANTH 477	Available online at OSU
Natural Resources and Community Values		ANTH 481	Available online at OSU
Anthropology of International Development		ANTH 482	
Multicultural Perspectives in NR		FW 340	Available online at OSU
Transforming Environmental Conflicts		GEOG 241	Available online at OSU
Environmental Justice		GEOG 330	Available online at OSU
Environmental History of the United States		HST 481	Available online at OSU
Critical Thinking for NR Challenges		NR 312	
Nature in Storytelling over the Centuries		NR 380	Available online at OSU
Environmental Ethics		PHL 440	Available online at OSU
World View and Environmental Values		PHL/REL 443	Available online at OSU
Sustainability, Justice & Engagement		SUS 331	Available online at OSU
Natural Resource Policy			
Environmental Law		AEC 432	Available online at OSU
Rural Development Economics & Policy		AEC 454	Available online at OSU
Public Lands Policy & Management		FES 486	Available online at OSU
Forest Policy		FOR 460	
Natural Resources Policy and Law		FOR 462	
Fish & Wildlife Law and Policy		FW 415	Available online at OSU
Introduction to Ocean Law		FW 422	Available online at OSU
		PS 473	Available online at OSU
U.S. Energy Policy		PS 475	
Environmental Politics and Policy			Available online at OSU
International Environmental Politics & Policy		PS 477	Available online at OSU
Political Issues			
Plagues, Pests, and Politics		ENT/HORT 300	Available online at OSU
Natural Resource Policy and Law		FOR 462	
Endangered Spec, Society and Sustainability		FW 350	Available online at OSU
When Science Escapes the Lab		NR 351	
The Politics of Climate Change		PS 455	Available online at OSU
Environmental Politics and Policy		PS 475	Available online at OSU
Science and Politics		PS 476	Available online at OSU
International Environmental Politics & Policy		PS 477	Available online at OSU
Wilderness Management		TRAL 352	Available online at OSU
Economics			
Intro to Environmental Economics & Policy		AEC 250	Available online at OSU
Intro to Microeconomics	EC 201	ECON 201	Available online at OSU

NR Core Requirements (continued) Complete one course per category	TBCC Course	OSU Course	Notes
Spatial Analysis			
Precision Agriculture		CROP/HORT 414	Available online at OSU
GIS and Forest Engineering Applications	GEO 265	FE 257	Available online at OSU
Survey of Geographic Information Systems		FW 303	Available online at OSU
Foundations of Geospatial Science & GIS		GEOG 201	Available online at OSU
Geoscience I: GIS and Theory		GEOG 360	Available online at OSU

Courses Required for Fish & Wildlife Conservation Option

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Requirement Complete one course per category unless otherwise noted.	TBCC Course	OSU Course	Notes
Measurements			
Field Methods in Marine Ecology		BI 373	
Field Methods in Ecological Restoration		BI 375	
Field Sampling of Fish & Wildlife		FW 255	Available online at OSU
Field Methods for Marine Research		FW 493	Available offine at 050
Scientific Methods for Analyzing NR Problems		NR 325	
Rangeland Analysis		RNG 441	Available online at OSU
Forest Types of the Northwest		FES 342	
Introduction to Forestry	FOR 111	FOR 111	Available online at OSU
Wildland Fire Ecology		FES 440	Available online at OSU
Topics in Wildland Fire		FOR 346	Available online at OSU
Wildland Fire Science and Management		FOR 436	Available online at OSU
Biodiversity Conservation in Managed Forests		FES/FW 452	Available online at OSU
Conservation Genetics		FW 370	Available online at OSU
Principles of Fish & Wildlife Conservation	FW 251	FW 251	Available online at OSU
Fish & Wildlife Biology – complete 3			
Biology of Marine Mammals		FW 302	Available online at OSU
Ornithology		FW 311	Available online at OSU
Ichthyology		FW 315	Available online at OSU
Mammalogy		FW 317	Available online at OSU
Introductory Population Dynamics		FW 320	Available online at OSU
Applied Community and Ecosystem Ecology		FW 321	Available online at OSU
Ecology of Marine and Estuarine Birds		FW 331	
Fish Ecology		FW 473	Available online at OSU
Wildlife Ecology		FW 481	Available online at OSU
Environmental Physiology		Z 423	Available online at OSU
Herpetology		Z 473	

Requirement Complete one course per category unless	TBCC Course	OSU Course	Notes
otherwise noted.			
Habitat Management – complete 2			
Ecological Restoration		FES/FW 445	Available online at OSU
Integrated Watershed Management		FW 326	Available online at OSU
Coastal Ecology and Resource Management		FW 426	Available online at OSU
Estuarine Ecology		FW/OC 434	Available online at OSU
Wildlife in Agricultural Ecosystems		FW 435	Available online at OSU
Freshwater Ecology and Conservation		FW 456	Available online at OSU
Wetlands and Riparian Ecology		FW 479	Available online at OSU
Rangeland Ecology and Management		RNG 341	Available online at OSU
Riparian Ecohydrology and Management		RNG 455	Available online at OSU
Ecosystems of Wildland Soils		SOIL 366	Available online at OSU
Soil Systems and Plant Growth		SOIL 388	Available online at OSU
Soil Morphology and Classification		SOIL 466	Available online at OSU
Natural Resource Policy		301L 400	Available offilitie at 030
Public Lands Policy and Management		FES 486	Available online at OSU
Endangered Species, Soc and Sustainability		FW 350	Available online at OSU
Fisheries and Wildlife Law and Policy		FW 415	Available online at OSU
Human Dimensions in Fish & Wildlife Mgmt		FW 439	Available online at OSU
Natural Resource Policy and Law		FOR 462	
Electives – complete one			
Oceans in Peril		BI 347	
Aquatic Biological Invasions		FW 421	Available online at OSU
Environmental Case Studies		ENSC 479	Available online at OSU
Human Dimensions in Fish & Wildlife Mgmt		FW 439	Available online at OSU
Mgmt Principles of Pacific Salmon in NW		FW 323	Available online at OSU
Origins of Fish & Wildlife Management		FW 360	Available online at OSU
Environmental Contaminants in F&W		FW 366	Available online at OSU
Natural History of Whales and Whaling		FW 419	Available online at OSU
Principles of Wildlife Disease		FW 427	Available online at OSU
Dynamics of Marine Biological Resources		FW 431	
Avian Conservation and Management		FW 451	Available online at OSU
Fishery Biology		FW 454	Available online at OSU
Ecosystems Services		FW 462	Available online at OSU
Marine Fisheries		FW 465	
Antarctic Science and Conservation		FW 467	
Phys and Behavior of Marine Megafauna		FW 469	Available online at OSU
Environmental Physiology of Fishes		FW 471	
Early Life History Fishes		FW 474	
Wildlife Behavior		FW 475	Available online at OSU
Fish Physiology		FW 476	Available online at OSU
Aquaculture		FW 497	Available online at OSU
Aquaculture Laboratory		FW 498	
Scientific Methods for Analyzing NR Problems		NR 325	
Oceans, Coasts, and People		OC 333	Available online at OSU
Biological Oceanography		OC 333 OC 440	Available offine at 050
			Available online at OSU
Habitat Analysis I Biadius Causas, Canagauanas, Canagauatian		RNG 457	
Biodiv: Causes, Consequences, Conservation		Z 349	Available online at OSU
Animal Behavior		Z 350	Available online at OSU
Biology of Insects		Z 365	
Aquatic Entomology	1	Z 477	

General Education Courses (called the Baccalaureate Core)

- Complete one course in each Perspective category with no more than two in the same department.
- Full listing of TBCC courses that fulfill Bacc Core requirements: <u>admissions.oregonstate.edu/baccalaureate-core-course-</u> equivalencies-tillamook-bay-community-college

SKILLS COURSES	Math Writing I Writing II Speech (Writing III) Fitness	Completed as part of major: MTH 112 or higher WR 121. Required to transfer. Can be completed as part of major: see advisor Choose one course from Bacc Core link above PE 295 @ TBCC
PERSPECTIVE COURSES	Biological Science Physical Science Additional Biological or Physical Science Cultural Diversity Literature and the Arts Social Processes and Institutions Western Culture	Completed as part of major: Biology I Completed as part of major: Chemistry Completed as part of major: Biology II Choose one course from Bacc Core link above Choose one course from Bacc Core link above Completed as part of major: EC 201 Choose one course from Bacc Core link above
DPD COURSE	Difference, Power, & Discrimination	Can be completed as part of major: see advisor
SYNTHESIS COURSES	Contemporary Global Issues Science, Technology, & Society	Upper division course, take through OSU Upper division course, take through OSU

Advising Contacts

Academic advisors at your community college and OSU are available to answer your questions and assist you in creating a transfer plan. **See your community college advisor first and use this Transfer Guide to help you plan.** It is important to speak with your OSU academic advisor early on, and often, to ensure correct course selection and sequencing. See <u>visitosu.oregonstate.edu/visit-campus</u> to schedule your personalized visit.

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