

<b>SCHOOL OF PUBLIC HEALTH – ENVIRONMENTAL HEALTH SCIENCES</b>		
<b>General Concentration (BSPH) – 120 hours</b>		<b>Effective 2014-2016</b>
<b>Name:</b>	<b>PID:</b>	<b>Optional 2<sup>nd</sup> Major or Minor</b>

**FOUNDATIONS**

English Comp. and Rhetoric	Foreign Language* HSFL(s)	Quant. Reas. (QR)	Lifetime Fitness (LF)
	1.	3.	(1 hr.)
	2.	4.	
* Through Level 3		MATH 231 or 241**	
		(**) Grade of C or better (not C-) required.	

**APPROACHES**

Phys. and Life Sciences (PL)	Social and Behavioral Sciences	Humanities/Fine Arts
CHEM 101 101L (**)	Hist. Analysis (HS): ¥	Vis. & Perf. Arts (VP):
BIOL 101 101L (**)	Soc. Sci (SS): ¥	Literary Arts (LA):
	Soc. Sci./Hist. Analysis (SS/HS):	Phil. Reasoning (PH):

\*\* Grade of C or better (not C-) required.

¥, ENST 201 (SS, GL), ENVR585 (HS, NA) suggested

**CONNECTIONS ##**

Communication Int. (CI)	Quant. Int. (QI) or 2 <sup>nd</sup> Quant. Reas. (QR)	Exp. Education (EE)	Global Issues (GL)
BIOL 101L	MATH 232 or 283** (**)		§
US Diversity (US)	North Atlantic World (NA)	World before 1750 (WB)	Beyond the NA (BN)

## Must satisfy GL, US, EE, and two additional Connections. § GEOG434 (GL) or GEOG445 (GL) suggested

**MAJOR**

Public Health Core (**)	Environmental Health Science Core (**)	Additional Requirements (**)			
BIOS 600	ENVR 230	BIOL 101 BIOL 101L	MATH 232 ♦ or 283		
EPID 600	ENVR 430	BIOL 201 ♦			
HBEH 600	ENVR 698 (Sr.Yr.) or 593 or 695 (w/approval)	BIOL 202 ♦	MATH 233 (if placed out of 231 and 232)		
HPM 600		CHEM101 CHEM 101L	PHYS 114 ♦ or 118 (118 preferred)		
Advanced ENVR or Related Courses (>400) (**, ***)	Honors (Optional)* Honors Research (ENVR 691H)	CHEM 102 CHEM 102L ♦			
		CHEM 261 ♦	PHYS 115 ♦ or 119 (119 preferred)		
1.	Honors Thesis (ENVR 692H)	COMP 116 or BIOL 201H or BIOL/MATH 553 or GEOG 597 ♦			
2.	Undergrad Research (Optional)*				
3.	ENVR 295	MATH 231 ♦ or 241			
4.	ENVR 695				

\*Students with a grade point average of 3.3 or higher are eligible to participate in honors research and to write an honors thesis. \*\* Grade of C or better (not C-) required.

\*\*\* At least two of these four courses should be listed (or cross-listed) as ENVR courses that are at least two credit hours and numbered between 401 and 690, except for ENVR 593, 600, and 601. Other courses may be substituted with the approval of the director of undergraduate studies

♦By the end of their sophomore year successful applicants should have earned a grade of C or better from UNC-CH in at least one course in three of the following groups: BIOL 201, 202; CHEM 102/102L, 261; COMP 116 (or approved alternative: BIOL 201H, BIOL/MATH 452, or GEOG 595); MATH 231 or 241, 232 or 283, 233; PHYS 114, 115, 118, 119.

**Planning Notes:**

FALL	SPRING	SUMMER	FALL	SPRING

## ADVANCED ENVIRONMENTAL HEALTH ELECTIVES

Course #	Course Title	Faculty	Semester
ENVR 403	Environmental Chemistry Processes (3)	Surratt	Spring
<a href="#">411</a>	Laboratory Techniques and Field Measurements (3)	Nylander-French, Weinberg, Whalen	Fall
<a href="#">412</a>	Ecological Microbiology (3)	Stewart	Spring
<a href="#">413</a>	Limnology (3)	Whalen	Fall
<a href="#">416</a>	Aerosol Physics and Chemistry (3)	Surratt	Fall
<a href="#">417</a>	Oceanography	MASC Faculty	Fall
418	Chemical Oceanography (3)	MASC Faculty	
<a href="#">419</a>	Chemical Equilibria in Natural Waters (3)	Staff	Fall
<a href="#">421</a>	Environmental Health Microbiology (3)	Sobsey	Spring
<a href="#">423</a>	Industrial Medicine and Toxicology (3)	Stopford, Randolph	Spring
<a href="#">431</a>	EHS Techniques (2)	Ball	Fall
<a href="#">432</a>	Occupational Safety and Ergonomics (3)	Wallace	Fall
<a href="#">433</a>	Health Hazards of Industrial Operations (3)	Flynn	Spring
<a href="#">442</a>	Biochemical and Molecular Toxicology (BIOC 442) (TOXC 442) (3)	Staff	Fall
<a href="#">451</a>	Elements of Chemical Reactor Engineering (3)	Vizuete	Fall
<a href="#">453</a>	Groundwater Hydrology (3)	Miller	Fall
<a href="#">468</a>	Advanced Functions of Temporal GIS (3)	Serre	Fall
<a href="#">470</a>	Environmental Risk Assessment (3)	MacDonald Gibson	Spring
471	Quantitative Risk Assessment in Environmental Health Microbiology (3)	Sobsey	Spring
<a href="#">514</a>	Measurement of NO <sub>x</sub> , O <sub>3</sub> , and Volatile Organic Compounds (3)	Sexton	Spring
<a href="#">516</a>	Aerosol Science Laboratory	Staff	Fall
520	Biological Oceanography (4)		
<a href="#">570</a>	Methods of Environmental Decision Analysis (3)	MacDonald	Fall
<a href="#">585</a>	American Environmental Policy (3)	Andrews	Fall
<a href="#">611</a>	Scientific Computation I (3)	Huang	Fall
<a href="#">630</a>	Systems Biology in Environmental Health (3)	Fry	Spring
<a href="#">640</a>	Environmental Exposure Assessment (3)	Pleil	Fall
<a href="#">666</a>	Numerical Methods (3)	Miller	Fall
671	Environmental Physics I (3)	Miller/Gray	Fall
672	Environmental Physics II (3)	Miller/Gray	Spring
686	Environmental Policy Instruments (PLCY686) (3)	Andrews	Spring
<a href="#">890</a>	Water, Sanitation, Hygiene and Global Health (3)	Bartram/Sobsey	Spring
ENST 450	Biogeochemical Cycling (4)		
ENST 480	Environmental Decision Making (3)	Andrews	
GEOG 434	Cultural Ecology of Agriculture, Urbanization, and Disease (3)		Spring
GEOG 445	Medical Geography (3)		Fall

Students pursuing research projects will want to be aware of the services from the office of Undergraduate Research including possible fellowships and scholarships <http://www.unc.edu/depts/our/index.html>.