

## university division planner

**BLOOMINGTON CAMPUS** 

# PLANNER

2007-2008

#### How Do I Use the *Planner* (and Why)?

This *Planner*'s most immediate purpose is to help you prepare for your first advising conference at Indiana University Bloomington (IUB). It contains information you need to know before you can select courses for your first term. The *Planner* is organized in a way that will make planning your courses easy. Really use this book. It is yours to read, to write in, to turn down the pages—whatever you like.

When you come to Bloomington for advising and registration, an advisor will answer your questions, explain requirements for degree programs, discuss placement and testing information, and help you finalize a schedule to meet your individual needs. But *you* must take primary responsibility for choosing your courses. Before you arrive, you should read the *Planner* and fully complete the Academic Planning Worksheet (APW) at the end of Part I.

► Follow these easy directions; you will save time and make your advising and registration experience successful!

Notice that the *Planner* is divided into two parts:

- Part I—Planning Your Academic Program. This section provides information about courses that most new students take. You need to read all of Part I and complete the Academic Planning Worksheet (APW), using both Parts I and II to assist you. List courses on your plan that you think you will either need to take or would like to take during your first semester at IUB. When you come to orientation, you will receive additional assistance with finalizing the APW at your pre-advising meeting.
- Part II—Schools and Majors. This section contains important information about IU's schools (degree-granting units) and the majors/programs they currently offer. Each school section includes admission and course requirements, which should help you complete the Academic Planning Worksheet.

If you are unsure about your major, read about all majors of interest to you.

■ You also have a *University Division Planner Course Descriptions* booklet. This companion publication to the *University Division Planner* contains information about courses you may take during your first year at IUB. Browsing through all of the descriptions will give you an idea of the wide variety of courses offered. Be sure to read the course description for any course you are interested in taking.

#### **Indiana University Bulletin**

## UNIVERSITY DIVISION PLANNER 2007–2008

**Bloomington Campus** 

While every effort is made to provide accurate and current information, Indiana University reserves the right to change without notice statements in the Bulletin series concerning rules, policies, fees, curricula, courses, or other matters. If you would like to request this *Planner* in an alternative format, please contact University Division to make this request.

Indiana University is an Affirmative Action/Equal Opportunity institution. Students who may need disability support services should visit the Office of Disability Services for Students Web site at www.indiana.edu/~iubdss or phone (812) 855-7578. TTY, (812) 856-2264.

## Here is a list of common terms that you will often see and hear, along

with their

definitions.

#### Glossary—Getting to Know IU Terminology

**A&H** Courses categorized as Arts and Humanities by the College of Arts and Sciences—also known as Humanities, Language Arts, and Oral and Written Expression courses by some other schools.

**ASC** Academic Support Center. Located in three of IUB's residence halls, these centers provide a wide range of free services, including tutoring, advising, workshops, review sessions, and other academic support.

**Bulletin** Document produced by each of IUB's schools that includes official information, degree requirements, courses taught, faculty information, etc.

Campus Access Card In addition to being a photo ID, library card, residence hall meal card, and debit card, this card will provide you with access to other convenient services (e.g., copy machines, laundry facilities).

**Certify** Meet admission requirements for major; records are transferred from University Division to appropriate school.

**CGPA** Cumulative grade point average (includes grades for all graded courses taken at IUB and at other IU campuses).

Cr. (credit hour)/Unit Amount of credit earned to graduate. You will usually need between 120 and 127 (depending on your major). Each class you take is worth a certain number of credit hours or units, e.g., ENG-W 131 (3 cr.), HPER-E 119 (2 cr.). Sometimes indicates the number of hours the class meets each week.

**Degree** B.A.—Bachelor of Arts; B.S.—Bachelor of Science (conferred by IU when you graduate). B.S. degrees usually require more major courses and fewer courses in general education.

**Degree Progress Report** Electronic degree auditing system that indicates how completed or intended courses count toward a specific major.

**Distribution Courses** Term used by College of Arts and Sciences and some other schools to designate courses that count in specific categories (e.g., A&H, S&H, or N&M).

Enrollment and Student Academic Bulletin Contains enrollment instructions and information on accessing the online Schedule of Classes offered each term; also contains the official calendar with dates for dropping courses and other procedural deadlines, holidays, etc.

**Registration System** Web-based system that enables IU students to register for classes and adjust their schedules through the first week of classes.

FIGs (Freshman Interest Groups) Groups of 15–20 students, often living in the same residence hall, who enroll in the same two or three academic courses plus a 1 credit hour seminar—designed to enhance the transition from high school to college. FIGs is a unit in University Division.

GPA Grade point average.

**HPER** School of Health, Physical Education, and Recreation (*not* abbreviated as HYPER).

**HPPLC** Health Professions and Prelaw Center, located in Maxwell Hall. HPPLC is a unit in University Division.

IUB Indiana University Bloomington campus.

Matriculate Enroll as a student.

**Matriculation date** The date you first enroll at any IU campus.

**Midterm grades** Grade estimates from instructors at the halfway point of the term, given to UD students.

N&M Courses categorized as Natural and Mathematical Sciences by the College of Arts and Sciences—also known as Life and Physical Sciences, Natural and Physical Sciences, Natural Sciences, and Quantitative Methods by some other schools.

**Network ID (NID)** Your key to University Information Technology Services' shared, central computers. Your username and password make up the NID, which you can use to access e-mail, online classrooms, software, and other services.

**OneStart** Indiana University's Web-based application portal that provides a common front door to online services at all IU campuses: onestart.iu.edu.

**Permission (PERM)** Permission to register for a course that is restricted to a certain student population.

**Prerequisite (P:)** A course that you must have completed before enrolling in another—e.g., CHEM-C 102 has a prerequisite, CHEM-C 101.

**S&H** Courses categorized as Social and Historical Studies by the College of Arts and Sciences—also known as Social Competency, Social Science, and Behavioral Science by some other schools.

SPEA School of Public and Environmental Affairs.

UD or UDIV University Division.

**University ID (UID)** Your unique 10-digit identification number used to track your university records.

Waitlist An option in the enrollment process. You may waitlist a closed class and will be automatically placed in the class when/if an opening occurs.

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## Welcome to Indiana University and the University Division!

Welcome to Indiana University Bloomington (IUB) where you are about to begin one of the most exciting times in your life. As a college student on this campus, you can discover the joys of learning in new ways, of expanding your intellectual and social relationships, and of realizing self-discipline amid the challenges and opportunities that are inherent in a university. IUB's faculty and staff are committed to helping you succeed in college, and we offer a variety of student services for that purpose. We encourage you to explore and take advantage of your options to make the most of your experiences here!

#### WHAT IS THE UNIVERSITY DIVISION?

University Division (UD) is the "academic home" for most new students on the IUB campus. UD provides academic advising and support to its students (most of whom are freshmen and transfer students) and maintains their academic records until they are admitted to one of the degree-granting units (College of Arts and Sciences, Kelley School of Business, etc.). UD also supports students interested in preparing for careers in the legal and health professions through the Health Professions and Prelaw Center (HPPLC).

UD's central academic advising office, the UD records office, and the HPPLC are all located in Maxwell Hall. UD also includes the Student Academic Center (SAC), which provides services designed to help students develop critical academic skills. The SAC is located at the corner of Seventh Street and Jordan Avenue. Finally, UD has a number of advising offices located in the residence halls. These offices are available to serve UD freshmen students where they live.

#### HOW LONG DO I REMAIN IN UNIVERSITY DIVISION?

A student entering IUB through UD must complete specific requirements for admission into one of the degree-granting schools (units). It's important to understand that admission requirements vary by program and/or by school. For some programs and schools, completion of admission requirements leads to automatic certification (transfer of the student record from UD to a degree-granting unit). For others, an admission application is required and applicants must be selected for admission before their records will be transferred from the UD Records Office to the records office of the admitting unit.

Most students remain in University Division for two terms and then certify into a degreegranting unit.

**Policy:** Students enrolled at IU Bloomington through University Division must *certify into degree-granting units at the beginning of the term following the one in which they complete 70 credit hours.* 

**Exception:** All transfer students, regardless of how many credit hours they have transferred to IUB, will be allowed to enroll through University Division for at least two terms.

#### WHO WILL HELP ME PLAN FOR MY FIRST YEAR?

This *Planner* has been created to help you prepare for your initial term on the Bloomington campus. During new student orientation, as a part of your scheduled activities, you will meet with an academic advisor with whom you will discuss your interests and skills. The advisor will assist you in finalizing your course enrollment plan. You will find that advisor knowledgeable about the most recent developments and changes in academic programs

Your advisor expects to talk with you five to six times during your first year at IUB. and services at IUB. Since many changes occur each year, you should not rely solely on information from friends, family, or other students attending IU.

After you are registered, you will be assigned to an advisor who will most likely be different from the advisor seen during your initial orientation/advising session. If you are a freshman living in a residence hall, you will probably be assigned a University Division advisor who maintains an office near your residence. If you have a declared major, you may be assigned a faculty advisor, but you will still be in the University Division until you certify to a school, unless you have already been directly admitted to a school. International students, transfer students, students in the Groups Student Support Services program, and students who live off campus are usually assigned an advisor who has an office in Maxwell Hall. Students in the Honors College are assigned an Honors advisor.

You will have a required meeting with your assigned advisor during fall Welcome Week.

#### WHAT IF I AM A TRANSFER STUDENT?

If you are transferring 26 or more credit hours, you may need additional information before registering. This will be available when you see an advisor. Special instructions for transfer students are included in the directions for completing the Academic Planning Worksheet (APW) at the end of Part I. If you are transferring fewer than 26 credits, follow all general instructions in Part I.

#### WHAT HAPPENS NEXT?

You are receiving information from the Office of Orientation Programs about orientation, advising, and registration. Your full participation in preparing for these activities is essential. To make your orientation, advising, and registration experiences productive, it's extremely important that you read this booklet and complete the Academic Planning Worksheet (APW) on pages 23-24 before you arrive on campus. As a part of your formal orientation to the IUB campus, you will have the opportunity to talk individually and at length with an academic advisor who can give you constructive recommendations and feedback related to your ideas, interests, and concerns. We encourage you to bring your questions and concerns to that advising conference.

#### WHAT ARE MY RESPONSIBILITIES AS A STUDENT?

You are responsible for:

- Understanding the academic standards you must meet in order to stay enrolled at IUB.
- Abiding by personal conduct standards as published in the *Code of Student Rights, Responsibilities, and Conduct*.
- Understanding and completing all degree requirements by the time you wish to graduate. Advisors, faculty members, and records office personnel will help you learn the requirements; however, you alone must complete them.

#### WHAT DOES IUB EXPECT IN TERMS OF STUDENT E-MAIL USE?

The university reserves the right to send official communications to students by e-mail with the full expectation that students will receive e-mail and read these e-mails in a timely fashion. Official university e-mail accounts are available to all registered students, and official university communications are sent to the student's official university e-mail address. For IU Bloomington, this is the @indiana.edu address. Students are expected to check their e-mail on a frequent and consistent basis in order to stay current with university-related communications.

Students who choose to have their e-mail forwarded from their official university e-mail address to another address do so at their own risk. The university is not responsible for any difficulties that may occur in the proper or timely transmission or access to e-mail forwarded to any other address, and any such problems will not absolve students of their responsibility to know and comply with the content of official communications sent to their official IU e-mail addresses. Instructions on setting up or canceling the forwarding of e-mail may be found by visiting itaccounts.iu.edu.

## WHAT ARE THE ACADEMIC STANDARDS FOR UNIVERSITY DIVISION STUDENTS?

To remain in good academic standing, University Division students must maintain a cumulative grade point average (CGPA) of 2.00 or higher. If the CGPA falls below 2.00, students are placed on probation or dismissed from the university, according to the benchmarks listed below. (*Exception:* Students who earn a semester GPA of 2.5 or higher are not dismissed regardless of their cumulative grade point average.)

Your CGPA is computed using the following grades:					
A+ or A	4.0 points				
A-	3.7 points				
B+	3.3 points				
B	3.0 points				
B-	2.7 points				
C+	2.3 points				
C	2.0 points				
C-	1.7 points				
D+	1.3 points				
D	1.0 points				
D-	.7 points				
F (Failing)	0.0 points				

Credit Hours	Critical Probation or Dismissed If IU CGPA Is*	Probation If IU CGPA Is Less Than 2.00 and
1-18	Less than 1.33	1.33 or higher
19-36	Less than 1.63	1.63 or higher
37-45	Less than 1.83	1.83 or higher
46 or more	Less than 2.00	
* The first time a st	udant's CCPA falls balow any banchn	park in this column ho/sho is

<sup>\*</sup> The first time a student's CGPA falls below any benchmark in this column, he/she is placed on "critical probation." If the student's CGPA falls below a benchmark again, he/she is dismissed and may not enroll at IUB for at least one fall or spring term. The student may then petition to be considered for reinstatement.

Academic records of UD students are reviewed at the end of each term. Determination of academic status is based upon all credit hours (transfer and IU graded hours) and IU cumulative GPA. "Graded hours" include credit hours for courses completed with a grade of F, but do not include credit hours earned with a grade of P or S.



Students relax between classes at Ballantine Hall.

## What Can I Expect of My University Division Advisor?

You will be assigned an advisor who will help you explore IU's many academic options, find campus/community services and resources, and make a successful transition from high school to college. During individual conferences and/or group meetings, you can expect assistance with any of the items listed below.

#### INFORMATION ABOUT SCHOOLS/MAJORS/CAREERS

- Obtaining/interpreting school bulletins and requirement sheets
- Exploring majors in order to select one appropriate for your interests
- Learning requirements for any major(s) and minor(s) that you may be considering
- Exploring careers related to your chosen or potential major(s)
- Learning about/using computer-based advising resources (online Schedule of Classes, OneStart, Degree Progress Report, etc.)

#### COURSE SCHEDULING/REGISTRATION/CREDIT

- Finding specific courses related to your personal interests
- Planning academic programs for each semester
- Discussing any needed adjustments to your academic schedule
- Obtaining information about the registration process, waitlisting courses, summer school, and transfer of credit from other universities

#### ACADEMIC PERFORMANCE

- Discussing grades and course problems
- Discussing tutoring and other appropriate academic support services as needed
- Discussing and developing time management and study skills
- Learning about academic standing and how to calculate a grade point average

#### **EDUCATIONAL ENHANCEMENT**

- Exploring possibilities for participation in special programs, e.g., overseas study
- Finding academically oriented lectures, meetings, and programs
- Exploring possibilities for extracurricular activities
- Obtaining information about/referral to other campus student service units, e.g., Student Academic Center (SAC), Academic Support Centers (ASCs), Career Development Center (CDC), Health Center, Disability Services for Students

A Note about Faculty and Departmental Advising: After you certify to your major (in a degree-granting school), you will no longer meet with your University Division advisor. A faculty or departmental advisor will help you fine-tune your academic program and keep you informed about special departmental programs and opportunities—honors programs, internships, career fairs, special major tracks, and specialized upper-level courses.



Visit the University Division Web site often throughout the year. This site includes information about advising, UD advisors, majors and careers, HPPLC, and SAC.

#### Part I—Planning Your Academic Program

#### HOW DOES COLLEGE PLANNING DIFFER FROM THAT FOR **HIGH SCHOOL?**

Indiana University classes are organized around what is called a "term system," formerly referred to as a "semester system." This means that you register for courses and complete them in one term. Fall term concludes in mid-December and spring term in early May. There are also summer sessions that begin in mid-May and end in mid-August.

As you are using this book, you are planning primarily for one term of course work. It is useful, however, to consider courses you will need for an entire year. In many instances it will not matter which term you take a course. For example, a course such as ENG-W 131 Elementary Composition may be taken during your first or second term.

As you complete your planning, consider the wide range of courses that you will want or need to take during your first year at IUB. Listing your first choices for fall term courses plus many alternate courses on your Academic Planning Worksheet at the end of Part I will give you much more flexibility when you actually design your schedule (choose the days/ times of your classes) and register for classes.

The number of credit hours designated for a course usually determines the amount of work required in that course and the amount of time each week you will spend in class. When registering for courses, you will learn that courses may be formatted differently, even when equal in number of credit hours. For example, a 3 credit hour course might meet three times per week for two lectures and one smaller discussion period, or twice per week for 75 minutes. For many courses, you will have some flexibility in choosing the course format most comfortable for you.

You may be surprised to learn that the amount of study time *outside* of *classroom* attendance substantially increases from high school to college. A good rule of thumb for college students is to plan to study (complete homework, read, review and rewrite notes, write papers, look up information, etc.) at least two hours outside the classroom per week for each credit hour enrolled. This means if you take 15 credit hours, you will need to study for no fewer than 30 hours per week. Some classes require even more study time outside of class, especially when term papers or outside lab work are needed or when the course content is difficult for you.

You will want to learn quickly the vocabulary that will become a part of your college life! Be sure to read "Glossary—Getting to Know IU Terminology" on p. 2 to learn the meanings of terms such as credit hour, NID, and UID.

#### HOW DO I KNOW WHAT COURSES TO SELECT?

Part I of the *Planner* will help you understand how to explore your academic options at IUB. It contains information about the various components of undergraduate degrees that can help you determine what courses you will take. As you develop a list of options for your first term, you will include some skills and general education courses. In addition, you will identify courses offered for your major or courses that will help you explore your interests in several majors. You may also want to include some elective courses.

There is no one plan of study for all students entering IU. All degree-granting units have some similar course requirements, but each academic unit (or school) defines these

Remember that advisors recommend and advise about academic courses but do not plan your program of study for you.

requirements somewhat differently. Together with your advisor, you will tailor your plan of study individually to meet your interests and abilities.

As you read Part I, you should refer to Part II of this book for descriptions of schools and majors that interest you. In that section, you will find suggestions for selecting courses that meet specific school and major requirements.

It's also important that you read the course descriptions that accompany this *Planner* before listing courses on your Academic Planning Worksheet at the end of Part I.

#### WHAT ARE MY OPTIONS FOR A MAJOR?

When you earn your degree, it will be awarded for a specific major or concentration within your degree-granting school. A list of majors and concentrations can be found on the next two pages. If you have not already done so, check this list to find one or more majors of interest to you. If you are undecided about your major, you should circle several areas of possible interest. (You will need to list one or more majors or interest areas on the Academic Planning Worksheet at the end of Part I.)

Read the information about schools and majors in Part II. You will probably be unfamiliar with some of the majors offered at IUB. Take time to read about any majors that appear interesting and to reflect on what you want to learn in your courses and in a major.

If you are not ready to declare a major and are still in the process of discovering your interests and linking them to the curriculum, you may enter Indiana University as an exploratory student. While classified this way, you will take courses and use campus resources that will assist you in deciding upon an appropriate major. To earn a degree, you must eventually declare a major and enter one of the schools (degree-granting units) that are described in Part II.

As you select courses for your first semester and complete the Academic Planning Worksheet, be guided by your interests. Read the chart on pp. 18–21, entitled "Courses That Are Required for Degree Programs and/or Match Your Interests." Actively explore one or more majors by selecting a required or recommended course. When you are on campus, advisors can help identify possible majors that could mesh with your interests, skills, and goals.

#### MAJORS, MINORS, AND CERTIFICATE PROGRAMS

Following is an alphabetical list of all majors, interdepartmental majors, minors, and certificate programs available at IUB. The page numbers listed after each major refer to Part II, where you will find information about each program. Footnotes indicate special information about each major, such as whether it can also be a minor. In Part II, you can also find listings of majors available within each school that has more than one major.

As indicated, some programs are available *only* as minors or certificate programs. Note also that some programs allow for prerequisite course work to be taken at IUB, but require completion of the degree at another IU campus.

If you are considering a career in dentistry, law, medicine, pharmacy, occupational therapy, physical therapy, optometry, or veterinary medicine, see the section on preprofessional studies on pp. 70–76.

Schools are listed after the major/minor/certificate with the following abbreviations: College of Arts and Sciences (COLL); Business (BUS); Continuing Studies (SCS); Dentistry (DENT); Education (EDUC); Health, Physical Education, and Recreation (HPER); Informatics (INFO); Journalism (JOUR); Labor Studies (LSTU); Medicine—Health Professions Programs (MED); Music (MUS); Nursing (NURS); Optometry (OPT); Public and Environmental Affairs (SPEA); Social Work (SWK).

IU offers more than 140 majors!

Minors enable you to complement and enhance your major field of study.

#### MAJORS, MINORS, AND CERTIFICATE PROGRAMS

Accounting—BUS p. 43 African American and African Diaspora studies-COLL<sup>2</sup> p. 27 African American and African Diaspora studies/ English—COLL<sup>3</sup> African American and African Diaspora studies/ History—COLL<sup>3</sup> African American and African Diaspora studies/ Religious studies—COLL<sup>3</sup> African American and African Diaspora studies/ Sociology—COLL<sup>3</sup> African languages (minor only)—COLL African studies (certificate only)—COLL p. 27 American Humanics (certificate only)—SPEA American studies—COLL<sup>2</sup> p. 27 Animal behavior (certificate and minor program only)—COLL Anthropology—COLL<sup>2</sup> p. 28 Apparel merchandising—COLL<sup>2</sup> p. 28 Aquatics (minor only)—HPER Arts management—SPEA<sup>2</sup> p. 68 Astronomy and astrophysics—COLL<sup>2</sup> p. 28 Athletic training (Nonteaching)—HPER p. 52 Athletic training (Teacher preparation)—HPER Audio recording arts<sup>1</sup>—MUS pp. 60, 62, 63 Audiology and hearing—COLL p. 41 Ballet—MUS p. 62 Biochemistry—COLL p. 29, 30 Biology—COLL<sup>2</sup> p. 29 Biotechnology—COLL p. 29 Business economics and public policy—Public policy analysis track—BUS p. 43
Business economics and public policy— Economic consulting track—BUS p. 43 Business foundations (certificate only)—BUS Business Information Systems (second major only)—BUS p. 43 Business (minor)—BUS Business process management—BUS p. 44 Central Eurasian studies (certificate only)—COLL p. 29 Chemistry—COLL<sup>2</sup> p. 29 Choral Teaching—MUS p. 61 Classical civilization—COLL<sup>2</sup> p. 30 Art and archaeology Culture and literature Classical studies (Latin and Greek)—COLL<sup>2</sup> p. 30 Clinical laboratory science—MED<sup>4</sup> p. 75 Coaching (minor only)—HPER Cognitive science—COLL<sup>2</sup> p. 30 Communication and culture—COLL<sup>2</sup> p. 30 Comparative arts (minor only)—COLL Comparative literature—COLL<sup>2</sup> p. 31 Composition—MUS p. 61 Computer information systems—BUS p. 43 Computer science B.A.—COLL<sup>2</sup> p. 31 Computer science B.S.—INFO<sup>2</sup> p. 57 Creative Writing—COLL p. 32 Criminal justice—COLL<sup>2</sup> p. 31 Cytotechnology—MED<sup>4</sup> p. 75 Dance—HPER<sup>2</sup> p. 52 Dental hygiene—DENT<sup>4,5</sup> p. 73 Dietetics—HPER p. 50

Dental nygene—DEN1<sup>135</sup> p. 73
Dietetics—HPER p. 50
Dutch studies (minor only)—COLL
Early music—Instrument—MUS
Early music—Voice—MUS
East Asian languages and cultures (Chinese,
Japanese, and Korean)—COLL<sup>2</sup> p. 31
East Asian studies—COLL<sup>2</sup> p. 31
Economics—COLL<sup>2</sup> p. 31

Economics/Mathematics—COLL³ p. 32 Economics/Political science—COLL²,³ p. 32 Education—All-grade (grades K-12)—EDUC p. 48 Education—Early childhood education—EDUC p. 47 Education—Elementary (grades 1-6)—EDUC p. 48 Education—Exceptional needs/Early and late adolescence—EDUC p. 48 Education—Middle school, junior high, or high school (grades 6–12)—EDUC p. 48 Education—Teaching All Learners (special education/elementary)—EDUC p. 48 English—COLL<sup>2</sup> p. 32 English/African American and African Diaspora studies—COLL<sup>3</sup> Entrepreneurship—BUS<sup>2</sup> p. 44 Environmental management—SPEA<sup>2</sup> p. 66 Environmental science—COLL and SPEA p. 32, Environmental science and health (minor only)—SPEA Environmental studies (certificate only)—SPEA European Union studies (minor only)—COLL Exercise science—HPER<sup>2</sup> p. 53 Fashion design (certificate only)—COLL Finance—BUS p. 43

Fashion design (certificate only)—COLL Finance—BUS p. 43
Fitness instruction (minor only)—HPER Finance/real estate—BUS p. 43
Fitness specialist—HPER p. 53
Folklore—COLL<sup>2</sup> p. 33
French—COLL<sup>2</sup> p. 33
Fundraising and resource development (minor only)—HPER

Game studies (certificate only)—COLL
Gender studies—COLL² p. 33
General Music Teaching—MUS
General studies (bachelor's degree)—SCS p. 46
General studies (associate degree)—SCS p. 46
Geography—COLL² p. 33
Geological sciences—COLL² p. 34
Germanic studies (German)—COLL² p. 34
Gerontology (minor only)—HPER
Global Human Diversity (certificate only)—COLL
Guitar (Classical)—MUS

Health administration—SPEA<sup>2</sup> p. 67

Health education—Secondary teacher preparation—HPER p. 50
Hebrew (minor only)—COLL
History—COLL<sup>2</sup> p. 34
History/African American and African Diaspora studies—COLL<sup>3</sup>
History and philosophy of science—COLL (certificate and minor only) p. 34
History of art—COLL<sup>2</sup> p. 32
Human biology—COLL<sup>2</sup> p. 35
Human development and family studies—HPER<sup>2</sup> p. 50
Human resources (minor only)—SPEA
Human sexuality (minor only)—HPER

India studies—COLL<sup>2</sup> p. 35 Individualized Major Program—COLL p. 35

<sup>&</sup>lt;sup>1</sup> Associate degree is also offered.

<sup>&</sup>lt;sup>2</sup> A minor and/or certificate is also available in the program.

<sup>&</sup>lt;sup>3</sup> Interdepartmental major.

<sup>&</sup>lt;sup>4</sup> Students may take prerequisite courses at IUB but must complete this degree on another IU campus.

<sup>&</sup>lt;sup>5</sup> Associate degree only.

Informatics—INFO<sup>2</sup> p. 56 Information systems (minor only)—SPEA Information technology (minor only)—INFO Instrumental teaching-Band-MUS Instrumental teaching-Strings-MUS Interior design—COLL p. 28 International business (must complete a second major in business)—BUS p. 44 International studies—COLL<sup>2</sup> p. 35 Italian—COLL<sup>2</sup> p. 36 Jazz studies—MUS p. 61 Jewish studies—COLL<sup>2</sup> p. 36 Journalism—JOUR<sup>2</sup> p. 58 Kinesiology (minor only)—HPER Labor studies<sup>6</sup> Latin American and Caribbean studies—COLL (certificate and minor only) Latino studies (minor only)—COLL Leadership (minor only)—HPER Leadership, ethics, and social action (minor only)— COLL p. 37 Legal studies—BUS p. 43 Legal studies—SPEA<sup>2</sup> p. 67 Liberal arts and management (certificate only)— COLL p. 37 Linguistics—COLL<sup>2</sup> p. 37 Linguistics/Speech and hearing sciences—COLL<sup>3</sup> Management-BUS p. 43 Management—SPEA<sup>2</sup> p. 67 Marketing—BUS p. 44 Martial arts (certificate only)—HPER Mathematics—COLL<sup>2</sup> p. 38 Mathematics/Economics—COLL<sup>3</sup> p. 38 Medical imaging technology—MED<sup>4</sup> p. 75 Medieval studies (certificate and minor only)— COLL Microbiology—COLL p. 29 Music—MUS<sup>2</sup> p. 61 Music and an outside field—MUS p. 60 Musical theatre—COLL p. 42 Near Eastern languages and cultures (Arabic, Persian, Islamic Studies, Near Eastern Civilization)—COLL<sup>2</sup> p. 38 Neuroscience—COLL<sup>2</sup> p. 40 New media and interactive storytelling (certificate only)—COLL Nonprofit management—SPEA<sup>2</sup> p. 67 Nuclear medicine technology—MED<sup>4</sup> p. 76 Nursing—NURS p. 64 Nutrition science—HPER<sup>2</sup> p. 51 Optometric technology—OPT<sup>5</sup> p. 65 Orchestral instrument (any) performance—MUS Organ—MUS Outdoor recreation and resource management— HPER<sup>2</sup> p. 55 Paramedic science—MED<sup>4,5</sup> p. 76 Park and recreation management—HPER p. 55 Philosophy—COLL<sup>2</sup> p. 38 Philosophy/Political science—COLL<sup>3</sup> p. 39 Philosophy/Religious studies—COLL<sup>3</sup> p. 39 Physical education teacher education (All-grade)— HPER p. 53 Physics—COLL<sup>2</sup> p. 39 Piano—MUS p. 61 Policy analysis—SPEA<sup>2</sup> p. 67 Political science—COLL<sup>2</sup> p. 39 Political science/Economics—COLL<sup>2,3</sup> p. 39 Political science/Philosophy—COLL<sup>3</sup> p. 39
Portuguese—COLL<sup>2</sup> p. 41
Production/Operations management—BUS p. 44

Psychology—COLL<sup>2</sup> p. 39 Psychology/Speech and hearing sciences—COLL<sup>3</sup> Public affairs—SPEA<sup>2</sup> p. 67 Public affairs/health administration (11 different minors)—SPEA Public and environmental affairs (minor)—SPEA Public financial management—SPEA<sup>2</sup> p. 67 Public health—SPEA<sup>2</sup> p. 67 Public health—HPER<sup>2</sup> p. 51 Public management—SPEA<sup>2</sup> p. 67 Radiography—MED<sup>4</sup> p. 76 Radiography—MED<sup>4,5</sup> p. 76 Real estate: see Finance Recreation (minor)—HPER Recreational sport management—HPER<sup>2</sup> p. 55 Religious studies—COLL<sup>2</sup> p. 40 Religious studies/African American and African Diaspora studies—COLL<sup>3</sup> p. 40 Religious studies/Philosophy—COLL<sup>3</sup> p. 40 Respiratory therapy—MED<sup>4</sup> p. 76 Russian—COLL p. 41 Russian and East European studies (minor only)— Safety Management (associate degree, certificate, and minor only)—HPER Safety science—HPER p. 51 Slavic languages and literatures—COLL<sup>2</sup> p. 40 Social science and medicine (minor only)—COLL Social work—SWK p. 69 Sociology—COLL<sup>2</sup> p. 41 Sociology/African American and African Diaspora studies—COLL<sup>3</sup> Sociology of work and business (minor only)—COLL Spanish—COLL<sup>2</sup> p. 41 Speech and hearing sciences—COLL<sup>2</sup> p. 41 Speech and hearing sciences/Linguistics—COLL<sup>3</sup> Speech and hearing sciences/Psychology-Speech language pathology—CÓLL p. 41 Sport communication (broadcast emphasis)-HPER p. 53 Sport communication (print emphasis)—HPER p. 53 Sport marketing and management—HPER<sup>2</sup> p. 54 Statistics—COLL p. 41 String instrument technology—MUS<sup>5</sup> p. 63 Studio art—COLL<sup>2</sup> p. 32 Supply Chain Management—BUS p. 44 Telecommunications—COLL<sup>2</sup> p. 42 Theatre and drama—COLL<sup>2</sup> p. 42 Therapeutic recreation—HPER p. 55 Tourism management—HPER<sup>2</sup> p. 55 Underwater Resource Management—HPER (certificate only) Urban studies (certificate)—COLL Urban studies (certificate)—SPEA Voice-MUS p. 61 West European studies (minor only)—COLL Woodwind—multiple instruments—MUS p. 61 Yiddish studies (minor only)—COLL

Are you interested in prelaw, premed, predent, preoptometry, or another health profession? See pp. 70-76.

<sup>&</sup>lt;sup>1</sup> Associate degree is also offered.

<sup>&</sup>lt;sup>2</sup> A minor and/or certificate is also available in the program.

<sup>&</sup>lt;sup>3</sup> Interdepartmental major.

<sup>&</sup>lt;sup>4</sup> Students may take prerequisite courses at IUB but must complete this degree on another IU campus.

<sup>&</sup>lt;sup>5</sup> Associate degree only.

<sup>&</sup>lt;sup>6</sup> Labor Studies is being reorganized. If you have questions, consult with your advisor.

#### WHAT ENGLISH COMPOSITION COURSE SHOULD I TAKE?

All schools at IUB have a composition requirement. Students typically fulfill this requirement by successfully completing one or more designated writing classes; however, you may be able to establish exemption from this requirement on the basis of scores from standardized tests.

## AM I EXEMPT FROM THE ENGLISH COMPOSITION REQUIREMENT?

- Exemption without composition credit: If you have achieved one of the following test scores, you have fulfilled the English composition requirement and will be exempted from it without credit:
  - a. SAT Critical Reading score of 670 or higher; or
  - b. ACT English score of 32 or higher; or
  - c. AP Program English: Composition and Literature score of 4 or 5; or
  - d. AP Program English: Language and Composition score of 4 or 5.
- 2. Exemption with composition credit: If you have achieved one of the above test scores and you scored 660 or higher on the SAT: Writing Test, you are exempt from the English composition requirement and are eligible to apply for 2 credit hours in English W143 with a grade of S (satisfactory).

#### WHAT ARE THE ENGLISH COMPOSITION COURSE OPTIONS?

If you have not established exemption from the English composition requirement (as previously described), you will need to fulfill this requirement by satisfactorily completing appropriate course work. Majors in health professions programs; business; education; health and physical education teacher education; informatics; recreation; music education; journalism; and nursing require a minimum grade of C. The School of Social Work requires a passing grade. Other majors require a grade of C- or higher.

Your advisor will help you determine your placement course based on your SAT/ACT scores, your high school background, and possible majors. Depending on your scores, you may be placed in a smaller section of ENG-W 131. The smaller sections are for students who need more basic instruction in writing (some are for international students). If you do not place into a basic writing section, most majors allow you to choose either of the options below. Read descriptions for the courses indicated. Also look at the composition options in Part II of this booklet for any major(s) you are considering. Some majors recommend or require that you take a particular option to complete this requirement.

#### **OPTION I: ONE-SEMESTER COURSE IN COMPOSITION**

ENG-W 131 Elementary Composition and ENG-W 170 Projects in Reading and Writing are one-semester, 3 credit hour courses that focus on the skills required in college writing. Completion of either one, with at least the minimum grade required by your major, fulfills the composition requirement. Reading materials are used as sources for the writing, but the emphasis is on written assignments that require synthesis, analysis, argument, and the handling of evidence. ENG-W 131 and W 170 are offered in both fall and spring terms.

#### OPTION II: TWO SEMESTERS OF DESIGNATED COURSES IN WRITING AND READING

Option II consists of two courses for a total of 8 credit hours (4 credit hours each term), distributed within degree requirements as follows: 2 credit hours fulfill the English composition requirement; 6 credit hours count toward arts and humanities requirements or elective credits (some education and preprofessional programs are exceptions to this).

ENG-L 141-142 Introduction to Writing and the Study of Literature and AAAD-A 141-142 Introduction to Writing and the Study of Black Literature are two-semester sequences. Each course provides both analysis of texts and instruction in writing. These courses typically meet twice a week for lectures and twice a week in discussion sections of about 25 students.

AP English Composition and Literature test scores of 4 or 5 award 3 college credits for ENG-L 198 (literature). ENG-W 143 (1 cr.) taken in conjunction with one of the following 3 credit hour courses also counts toward fulfilling the composition requirement: CMLT-C 145 Major Characters in Literature/C 146 Major Themes in Literature.

**OPTION I** Offered in both fall and spring term (take only one course for one term)

ENG-W 131 (3 cr.) or ENG-W 170 (3 cr.)

**OPTION II** Fall term Spring term

ENG-L 141 (4 cr.) ENG-L 142 (4 cr.)

AAAD-A 141 (4 cr.) AAAD-A 142 (4 cr.)

CMLT-C 145 (3 cr.) CMLT-C 146 (3 cr.) and ENG-W 143 (1 cr.)

*Note*: For Option II, you are not required to take both courses in a single sequence. You may take any two of the courses listed in Option II, one each semester. For example, the following combinations of courses could be used: AAAD-A 141 first semester and CMLT-C 146 (plus ENG-W 143) second semester; or CMLT-C 145 (plus ENG-W 143) first term and ENG-L 142 second term. Some courses are offered only in the first term and some only in the second term. Because these courses often fill up quickly during registration, you should plan several different combinations of courses to fulfill this requirement.

Read descriptions of these courses in the *Planner Course Descriptions* booklet that accompanies this *Planner*; then list them according to your preference on your Academic Planning Worksheet. Be sure that you list only courses that are offered during the fall term.

## WHAT IS THE UNIVERSITY DIVISION ENGLISH COMPOSITION POLICY?

University Division strongly recommends that you fulfill the fundamental English composition requirement by the end of your freshman year. The skills you develop are important for success in most of your courses and fulfillment of the requirement is necessary for admission to most schools. You must complete the fundamental composition requirement within your first 55 credit hours of study, or within two terms if you are a transfer student who will complete 55 credit hours during your first semester at IUB. For additional information, access the University Division Web site at www.iub.edu/~udiv. Then click on "Academic Advising," followed by "Academic Standards/Policies," and then "English Composition Completion Requirement."

Your advisor will help you decide which composition course is best for you.

#### DO ALL UNDERGRADUATES AT IUB TAKE MATHEMATICS?

Almost all students will need one or more mathematics courses to fulfill degree requirements. You should consider taking a math course during your first term while your mathematical skills developed in high school are still fresh. Read the information in Part II of this booklet for each school and major you are considering before writing your course choice(s) on the Academic Planning Worksheet.

## WHY AM I REQUIRED TO TAKE A MATHEMATICS PLACEMENT EXAM?

IUB administers its own placement exams because students come to IUB with quite different mathematical backgrounds. High school courses vary from state to state, and even from one school to another within the same locale. IUB's exams provide a common measure for all students. The Department of Mathematics placement exams are given during summer and fall advising and registration. The Mathematical Skills Assessment Test is a general-purpose assessment that everyone takes. The Calculus Advanced

Placement Exam is taken only by students who have completed a one-year high school calculus course.

#### THE MATHEMATICAL SKILLS ASSESSMENT TEST

This general-purpose assessment will measure your readiness for IUB's freshman math courses. All students take the assessment because almost all students will take mathematics courses sometime during their studies here. Although you may now be planning a program of study that omits mathematics, you may well discover that because of a change in your major you will need to take at least one math course.

The 30-minute test, consisting of 26 multiple-choice questions, is designed to measure your knowledge of first-year through college algebra (pre-calculus). The problems range from easy to difficult because the assessment test measures readiness for IUB math courses from MATH-M 014 Basic Algebra to MATH-M 211 Calculus I. You will probably think that some questions are too easy and others are too hard. That is the way it should be.

Your score on the assessment test will indicate to you and your advisor whether you are ready to take the courses you select, and the score will neither appear on your grade transcript nor count as part of any grade. The test results are advisory. You will make the final decision about what math courses you will register to take.

You should review material from your most recent mathematics courses and the sample problems located on pp. 79–80 of the *Planner* before you come to new student orientation. Bring a #2 pencil to use for the assessment test. Calculators are prohibited.

## HOW DO I DECIDE WHICH MATHEMATICS COURSES ARE APPROPRIATE FOR ME?

Your choice of a mathematics course will depend on several factors: requirements for the degree(s) you are considering, high school preparation, your score(s) on the SAT and/or ACT exams, your score on the IUB Mathematical Skills Assessment Test, your advanced placement results (if applicable), and other academic and personal considerations. If you have already studied calculus, you may be ready for MATH-M 212 or M 213 as indicated by your performance on the CEEB–AP exam and/or the IUB Calculus Advanced Placement Exam.

Because college courses are much more difficult than those taken in high school, many students discover that they have to take one or more preparatory courses before attempting the courses required for the major(s) they are considering.

Following these steps will help you choose an appropriate math course:

- □ If you took calculus in high school, read carefully the course descriptions in your *Planner Course Descriptions* booklet for MATH-M 212, M 213, and MATH-S 212.
- ☐ Complete the sample Mathematical Skills Assessment/Calculus Placement sample test questions on pp. 79–80.
- □ Read about the major(s) you are considering in Part II of this booklet and learn which math courses are appropriate.
- □ Read the mathematics course descriptions in your *Planner Course Descriptions* booklet. Pay special attention to the courses that you could use to fulfill requirements.
- ☐ List the courses you may need to take on the Academic Planning Worksheet.

#### WHAT OTHER SKILLS COURSES SHOULD I TAKE?

You may wish to consider courses that help you develop computer, foreign language, and/or oral communication skills. Refer to Part II of this booklet to determine which majors require or recommend them. If you want to take such courses, read their

You will take the IUB Mathematical Skills Assessment Test—see pp. 79–80 for sample problems.

Your advisor will help you decide which math course is best for you. descriptions in your *Planner Course Descriptions* booklet and list your choice(s) on your Academic Planning Worksheet.

#### THE FOREIGN LANGUAGE PLACEMENT TEST

If you have studied one or more years of foreign language in high school, you will be required to take a foreign language placement test at IUB (regardless of whether you currently plan to continue foreign language study). Even if you have already taken another foreign language test such as the AP or CEEB Achievement test, you are still required to test at IUB to validate your placement.

If you are an international student whose native language is not English, you are not eligible for special credit in your native language, but you may be able to use placement (if a test is available in your native language) toward fulfilling or partially fulfilling the foreign language requirement in some schools.

Testing opportunities are available in French, German, Hebrew (modern), Italian, Japanese, Latin, Russian, and Spanish when you come to campus for advising and registration. You may be able to earn special credit depending on the results of your placement test and the language in which you test.

If you continue studying the language you took in high school, your advisor will help you determine the placement level based on your test score.

## HOW DO I CHOOSE MAJOR AND GENERAL EDUCATION COURSES?

#### **MAJOR COURSES**

Most degree programs require a group of courses referred to as the major, concentration, or core. These courses provide you with an opportunity to study a particular subject matter in depth.

As you read in Part II about the major(s) you are considering, you will find recommendations for courses to take during your first year. Read the descriptions for these introductory courses; then choose courses that will help you learn more about the particular major(s) of interest to you.

#### **GENERAL EDUCATION COURSES**

All majors require that you take a certain number of additional general education courses. These courses are usually divided into several broad categories, although different schools use slightly different terminology to specify their areas.

*Arts and Humanities:* These courses teach students to understand human values, emotions, and thought, and to be open to diversity of expression. Examples: English, fine arts, philosophy, religious studies.

Social and Historical Studies: These courses provide an objective understanding of social institutions, historical contexts, and human behavior. Examples: history, political science, sociology.

*Natural and Mathematical Sciences:* These courses explore, through scientific inquiry, our environment in the physical and biological world. Examples: biology, chemistry, geology, mathematics.

*Culture Studies:* These courses study ethnic and international communities. Through them, students are encouraged to become involved in the contemporary world and to cultivate an informed sensitivity to global issues. School bulletins provide a list of approved courses. Not all degree programs require culture studies.

Choose a balanced selection of courses from arts and humanities, social and historical studies, and natural and mathematical sciences. If you are considering several majors (even

IUB offers instruction in more than two dozen languages (see your Planner Course Descriptions booklet). several within different schools), try to choose general education courses that are appropriate for at least two of the majors or are widely applicable to all of the majors you are considering. Read a wide variety of course descriptions in order to become familiar with IUB's broad selection and to find courses that really interest you.

#### SHOULD I TAKE ELECTIVE COURSES?

Electives are courses that do not fulfill any particular requirement for your degree but count in the total credits you need for graduation. Different majors classify different courses as electives. You can take such courses to satisfy your own personal interests, enhance your major, and develop additional skills. Besides the usual 3-5 credit hour academic elective courses, you may want to consider some of the 1 and 2 credit hour options listed below. You will find them described in the *Planner Course Descriptions* booklet.

COLL-X 112
Traditions and
Cultures of
Indiana
University is a
Web-based
course—an
excellent choice for
freshmen.

SLIS-L 161 Library Skills/Resources
ASCS-Q 294 Basic Career Development
COLL-X 112 Traditions and Cultures of Indiana University
EDUC-F 200 Examining Self as a Teacher
EDUC-X 101, 150, 152, 156—Critical thinking, listening, and reading
skills courses (see "Student Academic Center" in the Planner Course Descriptions booklet)

EDUC-U 205, 211, 212—Student development courses HPER-E courses—Physical activity instruction Music ensembles, individual lessons, or group instruction AERO-A 100, 101, 201—Aerospace studies (ROTC courses) MIL-G 101 or 201—Military science (ROTC courses)

Some majors allow a very limited number of electives to count toward graduation hours. Discuss with your advisor how elective credit hours will count in your academic program.

#### SHOULD I TAKE THE CHEMISTRY PLACEMENT EXAM?

The Chemistry Placement Exam (CPE) is one of the prerequisites for CHEM-C 117. If you plan to take CHEM-C 117 during your first term, you must take and pass the CPE and have earned a math SAT of 580 or higher (math ACT of 25 or higher) along with a satisfactory Mathematical Skills Assessment Test score. On the basis of these scores, students are placed into one of the following: CHEM-C 103 (a course specially designed to prepare students for C 117), CHEM-C 117, or CHEM-S 117 (the honors version of C 117).

For information on how to prepare for and take the CPE and information about the mathematics prerequisites for CHEM-C 117, please visit the following site: chem.indiana.edu/academics/ugrad/cpe.asp. You may also contact the Chemistry Undergraduate Office at (812) 855-2700 or chemound@indiana.edu.

## SHOULD I TAKE PLACEMENT EXAMS TO EARN ADVANCED CREDIT?

Special tests can be used to earn advanced credit and placement or exemption. You may have taken some of these tests through your high school; others are available for you to take at IUB. If you think there is any likelihood that you can "test out" of college courses in biology, calculus, chemistry, music theory, or political science, and possibly receive credit for doing so, you should inquire about taking one or more departmental exams at IUB.

Identify and put a check  $(\checkmark)$  by the exam or exams you want to take.

1)	Biology: BIOL-L 111 and/or 112 <sup>1</sup>	4)	Music theory (MUS-T 109)
2)	Calculus (see information on p. 17) <sup>1</sup>	5)	Political science (POLS-Y 103)
3)	Chemistry (CHEM-C 101-121 or 117)		

These tests are usually administered during your first advising/registration session.

### A NOTE ABOUT THE CALCULUS ADVANCED PLACEMENT EXAM AND THE SAMPLE PROBLEMS

This exam is given once each day during the Freshman Advising and Registration Program, and on the first day of fall orientation. The times for the exam appear on the orientation schedule. To prepare, review material from your most recent mathematics courses and also review the sample problems on p. 80.

Bring a #2 pencil to use when taking the exam. Calculators are prohibited.

Credit for MATH-M 211 with a grade of S is automatically awarded to students who earn a score of at least 20 out of 24 on the Calculus Advanced Placement Exam.

Students earning a score of 17, 18, or 19 out of 24 are eligible to take MATH-M 213 and are awarded credit for MATH-M 211 if they earn an A or B in MATH-M 213.

#### CALCULUS COURSES AT IUB (M 212, S 212, M 213)

College calculus is more advanced and faster paced than high school calculus. If you have successfully completed a strong, one-year high school calculus course, then you will know most (but not all) of the first semester of college calculus (M 211) and will know part of the second semester of college calculus (M 212). To enable you to move ahead in mathematics without needless duplication of work, the Department of Mathematics provides two options: 1) advanced placement into second-semester college calculus (M 212 or S 212) with credit for first-semester college calculus (M 211), or 2) placement into the accelerated first-year college calculus course (M 213) with the option of earning additional credit hours for M 211.

The first option, advanced placement into second-semester college calculus (M 212 or S 212) with credit for the first-semester course (M 211), is for those students who know almost everything in M 211. Your eligibility for this option is determined by your performance on either the CEEB Advanced Placement (AP) Program exam or the IUB Calculus Advanced Placement Exam. If your score on one of these exams demonstrates that you know almost all of M 211, then you will receive credit for M 211 and may proceed to second-semester college calculus (M 212 or S 212). If you qualify for this option, the Department of Mathematics recommends that you take S 212 rather than M 212 because S 212 is specifically designed for students who excel in mathematics.

The second option, placement into the one-semester, accelerated college calculus course M 213 (which merges M 211 and M 212 into one course) with the possibility for tuition-free credit for M 211, is for students who know most of M 211 but need to review some of it. Your eligibility for this option is determined by your score on the IUB Calculus Advanced Placement Exam. If you have done well in a strong high school calculus course, then you probably know most of M 211 but still may have a few gaps. If the gaps are small, rather than largely repeating the material by taking M 211, you may be able to take the accelerated calculus course, M 213.

First course(s) if you are exploring Area of study a major, or intend to major in this area		First course(s) if you are interested, but do not intend to major in this area
COLLEGE OF ARTS AND SCIE	NCES	
African American and African Diaspora Studies	A 100, A 110, A 120, A 141, A 142, A 150, A 154, A 156, A 201, A 203, A 210, A 221, A 249, A 250, A 264, A 265, A 278, A 290	A 100, A 110, A 120, A 141, A 142, A 150, A 154, A 156, A 201, A 203, A 210, A 221, A 249, A 250, A 264, A 265, A 278, A 290
African Studies	No major (area certificate available).	L 231, L 232
American Studies	A 100, A 200, A 350, A 351, A 450	A 100, A 201, A 202
Anthropology	B 200, E 200, L 200, P 200	A 105, E 101, E 105, A 150, E 205, E 210, E 260, P 210, P 240
Apparel Merchandising	H 100, H 209	H 100, H 209
Astronomy and Astrophysics	A 221 (See astronomy department advisor.)	A 100, A 102, A 103, A 105, A 115
Audiology and Hearing Science (See also Speech and Language Pathology)	SPHS S 110, S 111	SPHS S 110
Biology	L 111	L 100, L 104
Central Eurasian Studies	No major (area certificate available).	U 284
Chemistry/Biochemistry	C 117 (C 103 recommended if enrollment criteria for C 117 not met.)	C 100, C 101/C 121, C 102/C 122, or C 117 if qualified
Classical Studies: Classical Civilization Greek Latin	C 101, C 102, C 205, C 206 G 100 (See advisor.) Placement-level course	C 101, C 102, C 205, C 206 G 100 (See advisor.) Placement-level course
Cognitive Science	Q 240, Q 250, Q 270, Q 320	Q 240
Communication and Culture	C 190 and C 205	C 121, C 122, C 201, C 202, C 203, C 204, C 208, C 223, C 225, C 228, C 229, C 290, C292
Comparative Literature	C 100, C 145-C 146, C 147, C 200, C 205, C 251, C 252, C 255, C 257, C 261	C 145-C 146, C 151, C 155, C 200, C 216, C 217, C 219, C 255, C 257, C 310, C 340
Computer Science B.A.	C 211, H 211	A 110, A 111, A 112, A 113, A 114, A 201, C 102
Criminal Justice	P 100, P 200	P 100, P 200
East Asian Languages and Cultures	Placement-level language course	Placement language course or 100-200 level E courses
East Asian Studies	Placement-level language course or 200-level E course	Placement language course or 100-200-level E course
Economics	E 201	E 201
English	L 202 (usually not taken in first semester freshman year); or any English elective at the 200 level	L 203, L 204, L 205, L 206, L 207, L 141-L 142, W 103
Fine Arts: History of Art	A 101, A 102	H 100, any 200-level course
Fine Arts: Studio Art	A 101, A 102, A 160, F 100, F 101, F 102	F 100, F 101, F 102, N 110, N 130, N 198
Folklore and Ethnomusicology	F 101, F 111, F 131 (Limit: two courses at 100 level)	F 101, F 111, F 121, F 131
French	Placement-level language course.	Placement-level language course; Culture: F 125, F 126

*Note:* The first course for a major may not need to be taken during the first year. Some departments recommend a prior general survey course that may not count in the required credit hours for the major. You should always see your academic advisor for degree requirements and/or course selection assistance before registering for any course.

Area of study	First course(s) if you are exploring a major, or intend to major in this area	First course(s) if you are interested, but do not intend to major in this area
COLLEGE OF ARTS AND SCIE	ENCES, Continued	
Gender Studies	G 101	G 101, G 102, or G 105
Geography	G 107 or G 109, G 110 or G 120	G 107, G 109, G 110, G 120, G 208
Geological Sciences	G 111, G 112	G 103, G 104, G 105, G 114, G 121, G 131, G 141, G 171
Germanic Studies: Dutch	Minor only; placement-level course.	Placement-level course; Culture: N 350, N 450
Germanic Studies: German	Placement-level course.	Placement-level course
Germanic Studies: Norwegian	No major. K 100	K 100
Germanic Studies: Yiddish	Minor only. Y 100	Y 100; Culture: Y 300, Y 350
History	H 101, H 102, H 103, H 104, H 105, H 106, G 101, D 101, W 100 (See advisor about additional options.)	D 101, G 101, H 101, H 102, H 103, H 104, H 105, H 106, W 100 (See advisor about additional options.)
Human Biology	B 101, B 102	B 101, B 102
History and Philosophy of Science	Certificate only; X 102	X 100, X 102, X 110, X 123, X 126, X 200, X 220, X 223, X 226
India Studies	I 310	I 310
Interior Design	H 168 (See advisor.)	
Italian	Placement-level language course	Placement-level language course; Culture: M 222, M 235, M 333, M 334, M 345, M 391
International Studies	I 100 (see advisor about others)	I 100
Jewish Studies	Modern or Biblical Hebrew or Yiddish: JSTU-H 100 or placement-level modern Hebrew or B 100 or GER-Y 100; History: HIST-H 251, HIST-H 252. Religious studies: REL-R 245. COLL-E 103/E 104 (approved topics).	REL-R 245, R 210, R 152; HIST-H 251, H 252; PHIL-P 205
Linguistics	L 103, L 210, L 303, L 306, L 315, L 367	L 103, L 111, L 112, L 113, L 114, L 210, L303, L 315, L 367
Mathematics	M 211 (M 212, S 212, or M 213 with advanced placement)	M 014, M 018, M 025, M 026, M 027, M 118, S 118, A 118, M 119, M 211 (depending upon Mathematical Skills Assessment Test and advising conference)
Microbiology	BIOL-L 112	BIOL-L 100, L 104 (Check topics.)
Near Eastern Languages and Cultures: Arabic Hebrew Persian Turkish	See advisor about culture courses. A 100 or higher level, N 181 JSTU-H 100 or higher level P 100 or higher level CEUS-U 161 or higher level	200 and 300 level Culture courses (See advisor.) A 100 or higher level JSTU-H 100 or higher level P 100 or higher level CEUS-U 161 or higher level
Philosophy	P 100, P 135, P 140, P 270, or any Topics course taught by philosophy faculty.	P 100, P 105, P 135, P 140, P 150, P 240, or any Topics course taught by philosophy faculty.
Physics	P 221, P 222 (consider honors sections)	P 101, P 105, P 108/P 109 (concurrent with P 105), P 110, P 114, P 120, P 125, P 150, P 201
Political Science	1 or 2 from: Y 103, Y 105, Y 107, Y 109, Y 200, Y 202, Y 205, Y 249, Y 281	Y 100, Y 102, Y 103, Y 105, Y 107, Y 109, Y 200, Y 202, Y 249, Y 281

*Note:* The first course for a major may not need to be taken during the first year. Some departments recommend a prior general survey course that may not count in the required credit hours for the major. You should always see your academic advisor for degree requirements and/or course selection assistance before registering for any course.

Area of study	First course(s) if you are exploring a major, or intend to major in this area	First course(s) if you are interested, but do not intend to major in this area	
COLLEGE OF ARTS AND SCIEN	NCES, Continued		
Portuguese	Placement-level language course.	Placement-level language course.	
Psychological and Brain Sciences	P 155	P 101 (If, after taking P 101, you decide to major in psychology, you may take P 102.)	
Religious Studies	R 152, R 153, R 160, R 170, R 210, R 220, R 245, R 250, R 257, R 264, R 280 (Only one 100-level course may be counted toward the major.)	R 152, R 153, R 160, R 170, R 210, R 220, R 245, R 250, R 257	
Slavic Languages and Literatures	Placement-level language course	Placement-level language course	
Croatian	Placement-level language course; S 363-S 364, R 353	Placement-level language course; Culture/literature: S 363-S 364, R 353	
Czech	Placement-level language course; C 363-C 364, C 365, R 353	Placement-level language course; Culture/literature: S 363-S 364, R 353	
Macedonian		Placement-level language course	
Polish	Placement-level language course; P 363-P 364, R 353	Placement-level language course; Culture/literature: P 363-P 364, P 365, R 353	
Romanian	Placement-level language course; R 353	Placement-level language course; Culture/literature: R 353	
Russian	Placement-level language course; R 223, R 263, R 264	Placement-level language course; Culture: R 223; Literature: R 123, R 263, R 264; Cinema: R 352	
Serbian	Placement-level language course; S 363-S 364, R 353	Placement-level language course; Culture/literature: S 363-S 364, R 353	
Ukrainian		Placement-level language course	
Sociology	S 100 and one from S 101, S 105, S 110, S 201, S 210, S 215, S 217, S 220, S 230	S 100, S 101, S 105, S 110, S 201, S 210, S 215, S 217, S 220, S 230	
Spanish	Placement-level language course	Placement-level language course	
Speech Language Pathology	S 110, S 111	S 110	
(see also Audiology) Statistics	MATH-M 211 and 212, STAT-S 320	S 100	
Telecommunications	T 101, T 205, T 206, T 207 (all required)	T 101, T 160, T 191, T 192	
Theatre and Drama	T 100, T 101, T 121, T 125	T 100, T 101, T 120, T 125	
BUSINESS	A 100, K 201, either X 100 or G 100 (both optional electives), X 104	G 100 or X 100, L 100, A 200, K 201, W 211	
EDUCATION	F 205 (second-semester freshmen)	F 200, F 205	
HEALTH, PHYSICAL EDUCATI	ON, AND RECREATION		
Applied Health Science Dietetics	CHEM-C 117 or C 103 (fall term advised); N 231 (spring term advised)	N 220 (spring term advised)	
Safety Management (A.S.)	S 101 (Fall only), S 151 (spring only)	S 101 (Fall), S 151 (spring)	
Human Dev. and Family Studies	F 150, F 255, F 258	F 150, F 258	

*Note:* The first course for a major may not need to be taken during the first year. Some departments recommend a prior general survey course that may not count in the required credit hours for the major. You should always see your academic advisor for degree requirements and/or course selection assistance before registering for any course.

Area of study	First course(s) if you are exploring a major, or intend to major in this area	First course(s) if you are interested, but do not intend to major in this area
HEALTH, PHYSICAL EDUCATI	ON, AND RECREATION, Continued	
Nutrition Science	CHEM-C 117 or C 103 (fall term advised); N 231 (spring term advised)	N 220 (spring term advised)
Safety Science	S 101 (Fall only), S151 (spring only), H 160, H 174	S 101 (Fall), S 151 (spring), H 160
Public Health Education	H 263 (See advisor about others.)	H 263, F 255
Health Education—Secondary Teacher Preparation	F 255, H 160, H 174, H 205, H 180, H 263	F 255, H 160, H 180, H 263
Kinesiology Athletic Training	P 212, P 280, H 160	P 212, P 280
Dance	D 111, D 121, E 255, P 212	D 111, E 155, E 152, E 255
Exercise Science	E 119, P 212, P 280	E 119, P 212
Fitness Specialist	P 105, P 212, P 216, P 280	P 105, P 212, P 216
Physical Education Teacher Preparation (PETE)	P 140/P 141, P 205, P 216, P 219, P 224, P 280	P 140/P 141, P 280
Sport Communication	P 211, P 212, P 213; H 160 or P 280	P 211, P 212, P 213
Sport Marketing and Management	P 211, P 212	P 211
Recreation <i>All majors</i>	R 160, R 231, R 272	R 160
INFORMATICS		
Informatics	I 101	I 101
Computer Science B.S.	C 211, H 211	A 110, A 111, A 112, A 113, A 114, A 201, C 102
JOURNALISM	J 110, J 155, J 200, J 210	C 201, J 110, J 155, J 200, J 210
LABOR STUDIES	Consult with your advisor.	L 100, L 110, L 290
MUSIC	T 109 or exemption; T 151; P 110, P 120 or P 130; E 131 (if B.M.E.); private performance study (Z 110)	J 100, J 210, Z 101, Z 103, Z 111, Z 201, Z 393, T 109, X 001; private performance study (Z 110)
PUBLIC AND ENVIRONMENTA	AL AFFAIRS	
Public Affairs	E 162, E 272 (required for environmental management majors), V 160, V 161, V 220, V 241	E 162, V 160, V 161, V 220, V 241, V 263
Public Health	V 160, H 316, H 320	V 160, H 316, H 320
Environmental Science (B.S.E.S.)	Appropriate science course, GEOG-G 107, G 108; GEOL-G 105, G 171; SPEA-E 262, E 272	GEOG-G 107, G 108; GEOL-G 105, G 171; SPEA-E 262, E 272
SOCIAL WORK	S 100, S 141 (R: English composition)	S 100, S 141 (R: English composition)

*Note:* The first course for a major may not need to be taken during the first year. Some departments recommend a prior general survey course that may not count in the required credit hours for the major. You should always see your academic advisor for degree requirements and/or course selection assistance before registering for any course.

#### Completing the Academic Planning Worksheet (APW)—Directions

Read about planning your academic program in Part I and about any school(s) and major(s) of interest to you in Part II, along with selections in your *Planner Course Descriptions* booklet, before completing the Academic Planning Worksheet (APW) on the following pages. You should then be ready to make decisions about courses for the first semester.

#### HOW DO I COMPLETE THE ACADEMIC PLANNING WORKSHEET (APW)?

- Carefully tear the Academic Planning Worksheet out of the *Planner*.
- Complete each section of the APW as directed on the form. You may need to review the descriptions of skills requirements and general education course work common to most majors in Part I and refer to the "Freshman Year Course Work" for most schools and majors described in Part II.
- Write "completed" on the lines for any requirements you think you have fulfilled by testing out of them or through college credits earned previously. Do not list a course unless you want or need to take an additional course in the area.
- List more courses than you will actually take during the first semester. Doing this will provide you with more flexibility as you discuss your academic plans with your advisor.

#### WHAT IF I AM A TRANSFER STUDENT WITH 26 OR MORE COMPLETED CREDIT HOURS?

- Indicate on the APW which requirement(s) you think you may have already completed, based on your transferred course work.
- Focus on your choice of a major now. Check the first box on the APW under "Major/Concentration"; then list your first major choice and an alternate major choice.
- Refer to your major or school in Part II for information about admission requirements. Include required courses among those you list on the plan.

#### **DEPARTMENTAL/SCHOOL PREFIXES**

To determine which department or school offers the major department courses you are considering, refer to the list of departmental/course prefixes below. Knowing these will also help you locate courses in the *Planner Course Descriptions* booklet.

•					
African American and		Folklore and Ethnomusicology	FOLK	Linguistics	LING
African Diaspora Studies	AAAD	Foster International Center	FLLC	Mathematics	MATH
African Studies	AFRI	French	FRIT	Medical Sciences	MSCI
American Studies	AMST	Gender Studies	GNDR	Music	MUS
Anthropology	ANTH	Geography	GEOG	Near Eastern Languages and	
Apparel Merchandising and		Geological Sciences	GEOL	Cultures	NELC
Interior Design	AMID	Germanic Studies	GER	Optician/Technician	TOPT
Arts and Sciences Career		Global Village Living-Learning		Pĥilosophy	PHIL
Services	ASCS	Center	GLLC	Physics	PHYS
Astronomy and Astrophysics	AST	Health, Physical Education,		Political Science	POLS
Biology	BIOL	and Recreation (all majors)	HPER	Portuguese	HISP
Business (all majors)	BUS	History	HIST	Psychological and Brain Sciences	PSY
Central Eurasian Studies	CEUS	History and Philosophy of		Public and Environmental	
Chemistry	CHEM	Science	HPSC	Affairs	SPEA
Classical Studies	CLAS	Human Biology	HUBI	Religious Studies	REL
Cognitive Science	COGS	India Studies	INST	ROTC Military Science	MIL
College of Arts and Sciences		Informatics	INFO	Aerospace Studies	AERO
Topics	COLL	International Studies	INTL	Slavic Languages/Literatures	SLAV
Collins Living-Learning Center	CLLC	Italian	FRIT	Social Work	SWK
Communication and Culture	CMCL	Jewish Studies	JSTU	Sociology	SOC
Comparative Literature	CMLT	Journalism	JOUR	Spanish	HISP
Computer Science	CSCI	Labor Studies	LSTU	Speech and Hearing Sciences	SPHS
Criminal Justice	CJUS	Latin American and Caribbean		Statistics	STAT
East Asian Languages and		Studies	LTAM	Student Academic Center	EDUC
Cultures	EALC	Latino Studies	LATS	Telecommunications	TEL
Economics	ECON	Leadership, Ethics, and Social		Theatre and Drama	THTR
Education	EDUC	Action	LESA	Traditions and Cultures at	
English	ENG	Liberal Arts and Management		Indiana University	COLL
Fine Arts	FINA	Program	LAMP		

#### **Academic Planning Worksheet (APW)**

You must complete this form before meeting with an advisor. ID Number Name (Please print: Last Preferred first name or nickname \_ I. DO YOU HAVE ANY COLLEGE CREDIT? Make a check (✓) in the appropriate space(s) below if you have received (or will receive) college credit in any of the following ways: \_\_ While in high school \_\_\_\_\_ From another IU campus \_\_\_\_\_ From another college or university Are you currently enrolled in any college courses? Yes No How many total college credit hours will you have completed by the time IUB classes begin? \_\_\_ Have you taken any exams for college placement or credit, e.g., Advanced Placement, SAT II Subject Tests, or International Baccalaureate exams? Yes No If yes, which exam(s)? \_\_\_ Have you registered for a Freshman Interest Group (FIG) or an Intensive Freshman Seminar? If yes, list FIG courses or seminar class: II. MAJOR/CONCENTRATION (See pp. 9–11) Make a check  $(\checkmark)$  in the box next to the statement below that applies to you; then list your major interest(s) on the lines provided: You have chosen a major. List this major on line 1. It is wise to consider a second area of interest in case you change your mind. List an alternate major on line 2. You are exploratory (considering several majors). List two or three majors that interest you. Course III. ENGLISH COMPOSITION (See pp. 12–13) Department Number **Course Title** Are you exempt from this requirement? W 131 ex: ENG Elementary Composition \_Yes \_\_\_\_No If you are not exempt, list your first three 1. course choices from the options that will fulfill the basic English composition requirement. Be sure to select options that are acceptable for any major(s) you are considering. 2. 3.

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IV. MATHEMATICS (See pp. 13–14)	Department	Course Number	Course Title
List the introductory mathematics course(s) required for the major(s) you are considering	1.		
and/or any other mathematics course(s) you are interested in taking.	2.		

#### V. SCHOOL, MAJOR, AND GENERAL EDUCATION COURSES (see p. 15)

List 12 to 18 additional courses that interest you. Refer to the "Freshman Year Course Work" section(s) for the school(s)/major(s) you are considering.

Department	Course Number	Course Title	Department	Course Number	Course Title
1.			10.		
2.			11.		
3.			12.		
4.			13.		
5.			14.		
6.			15.		
7.			16.		
8.			17.		
9.			18.		
VI. ELECTIVES (See p. 16)  List additional courses that you are interested		1.			
		2.			
in taking	List additional courses that you are interested in taking as electives.		3.		

List questions for	your advisor here.			

#### Part II—Schools and Majors

## College of Arts and Sciences (COLL)

www.indiana.edu/~college/

The education offered by the College of Arts and Sciences is based on a tradition established when Indiana University was founded in 1820. Today the College continues its central role in the mission of IU, providing the general education for all undergraduate students. The College provides the means for undergraduates to acquire a liberal arts education: an education that broadens students' awareness in the major areas of human knowledge, significantly deepens that awareness in one or two fields, and prepares the foundation for a lifetime of continual learning.

#### **ADMISSION REQUIREMENTS**

The College of Arts and Sciences requires that students seeking any major in the College complete the following:

- 26 credit hours (that count toward graduation) with a 2.000 CGPA
- English composition (with a grade of C– or higher)

The Bachelor of Fine Arts (B.F.A.) degrees and the Individualized Major Program have additional program admission requirements—ask your advisor about these.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students pursuing a major in the College of Arts and Sciences *usually* complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

See pp. 12–13 for options.

#### ■ MATHEMATICS COURSES

Choose from (MATH-M 014, MATH-X 018, MATH-A 025, MATH-M 025, MATH-M 027,)\* MATH-A 118, MATH-M 118, MATH-S 118, (both MATH-D 116 and MATH-D 117 if eligible), MATH-M 119, MATH-M 211.

Students earning math test scores at or above 650 on the SAT exam or at or above 29 on the ACT exam are exempt from the fundamental skills math requirement. Some majors in the College, however, specifically require a mathematics course or courses. See your advisor.

Any of the above courses except MATH-M 014 and MATH-X 018 can be used to fulfill the fundamental skills math requirement (grade of C- or higher required). Your advisor will help you finalize your choice based on your major, your background, high school test scores and grades, and your IUB Mathematical Skills Assessment Test score.

\*Note: Some students may need to take MATH-M 014, MATH-M 025, MATH-A 025, and/or MATH-M 026, MATH-M 027, or MATH-X 018 as preparation for a higher-level course. No credit is awarded for any of these courses toward graduation. However, MATH-M 025, MATH-A 025, or MATH-M 027 may be used to fulfill the fundamental skills math requirement.

#### ■ FOREIGN LANGUAGE COURSE(S)

The IU College of Arts and Sciences teaches more foreign languages than almost any other college or university in the United States, including many of the languages of Central Eurasia and five African languages. Acquiring some proficiency in a foreign language broadens a student's outlook on the world and adds enormous value to a student's college degree. Overseas study is encouraged for students in every major. A student who studies one of the less-commonly taught languages can look forward to a wide range of options after graduation; students who study languages such as Russian, Japanese, or Arabic are highly sought-after for employment—whether in business, government, or foreign affairs.

Foreign language study through the fourth semester is required for most degrees in the College; requirements for the B.S. degree are usually less. You can choose to continue the language you began in high school or start a new language. A placement test will determine your course level if you choose to continue the language you studied in high school.

#### ■ ONE TOPICS REQUIREMENT COURSE

Choose from COLL-E 103, COLL-E 104, COLL-E 105, and departmental Topics courses. See pp. 6–10 in the *Planner Course Descriptions* booklet.

Hutton Honors College students may substitute an appropriate freshman honors seminar after consulting with an honors advisor.

Intensive Freshman Seminar (IFS) classes prefixed COLL-S 103, 104, or 105 fulfill the College's Topics requirement. Contact the IFS program office at (812) 855-3839 for information.

#### ■ ADDITIONAL GENERAL EDUCATION DISTRIBUTION COURSE(S)AND CULTURE STUDIES COURSE

Distribution courses: Choose from arts and humanities (A&H), social and historical studies (S&H), and natural and mathematical sciences (N&M). See the *Planner Course Descriptions* booklet for descriptions and distribution designation (A&H, S&H, N&M).

Culture studies courses: Two culture studies courses are required for graduation, many of which carry A&H or S&H distribution credit. Many students wait until after the first year to begin this requirement.

#### ■ ONE OR TWO MAJOR COURSES

See descriptions of majors on the following pages for recommended courses.

#### ■ ELECTIVE(S)

No more than two elective courses should be taken in the freshman year.

#### **COLLEGE MAJORS AND PROGRAMS**

At least 25 College credit hours must be taken in the major subject area (some departments require more) for graduation. Students may also have a double major or an interdepartmental major. See the College Bulletin for a complete description of major requirements. Following is a list of College majors, minors, interdepartmental majors, and certificate programs. At the end of each major description, you will find courses recommended for the first year for students considering a major.

African American and African Diaspora studies (AAAD) African American and African Diaspora studies/English African American and African Diaspora studies/History African American and African Diaspora studies/ Religious studies

African American and African Diaspora studies/ Sociology

African languages (minor only) (LING)

American studies (AMST)

African studies (certificate only) (AFRI)

Animal behavior (certificate and minor only) (ABEH)

Anthropology (ANTH)

Apparel merchandising (AMID)

Astronomy and astrophysics (AST)

Audiology and hearing (SPHS)

Biochemistry (CHEM)

Biology (BIOL)

Biotechnology (BIOL)

Central Eurasian studies (certificate only) (CEUS)

Chemistry (CHEM)

Classical civilization (CLAS)

(Art and archaeology, Culture and literature)

Classical studies (Latin and Greek) (CLAS)

Cognitive science (COGS)

Communication and culture (CMCL)

Comparative arts (minor only) (CMLT)

Comparative literature (CMLT)

Computer science (CSCI)<sup>1</sup>

Creative Writing (ENG)

Criminal justice (CJUS)

Dutch studies (minor only) (GER)

East Asian languages and cultures (EALC)

(Chinese, Japanese, and Korean)

East Asian studies (EALC)

Economics (ECON)

Economics/Mathematics

Economics/Political science

English (ENG)

English/African American and African Diaspora studies Environmental science (jointly administered with SPEA)

European Union studies (minor only) (WEUR)

Fashion design (certificate only) (AMID)

Fine Arts (FINA)

History of art

Studio art

Folklore and ethnomusicology (FOLK)

French (FRIT)

Game studies (certificate only) (TEL)

Gender studies (GNDR)

Geography (GEOG)

Geological sciences (GEOL)

Germanic studies (GER)

Global human diversity (certificate only) (ANTH)

Hebrew (minor only)

History (HIST)

History/African American and African Diaspora studies

History and philosophy of science (certificate and minor

only) (HPSC)

Human biology (HUBI)

India studies (double major only) (INST)

Individualized Major Program (has entrance

requirements) (IMP)

Interior design (AMID)

International studies (INTL)

Italian (FRIT)

Jewish studies (JSTU)

Latin American and Caribbean studies (certificate and

minor only) (LTAM)

Latino studies (minor only) (LATS)

Leadership, ethics, and social action (minor only) (LESA)

Liberal arts and management (certificate only) (LAMP)

Linguistics (LING)

Linguistics/Speech and hearing sciences

Mathematics (MATH)

Mathematics/Economics

Medieval studies (certificate and minor only) (MEST)

Microbiology (BIOL)

Musical theatre (has entrance requirements) (THTR)

Near Eastern languages and cultures (NELC)

(Arabic, Persian)

Neuroscience (PSY)

New media and interactive storytelling (certificate only)

Philosophy (PHIL)

Philosophy/Political science

Philosophy/Religious studies

Physics (PHYS)

Political science (POLS)

<sup>&</sup>lt;sup>1</sup> B.A. and minor only; other programs are in the School of Informatics. See p. 57.

Political science/Economics

Political science/Philosophy

Portuguese (HISP)

Psychology (PSY)

Psychology/Speech and hearing sciences

Religious studies (REL)

Religious studies/African American and African

Diaspora studies

Religious studies/Philosophy

Russian (SLAV)

Russian and East European studies (minor only) (REEI) Slavic languages and literatures (REEI) (SLAV)

Social science and medicine (minor only) (SOC)

Sociology (SOC)

Sociology/African American and African Diaspora studies Sociology of work and business (minor only)

Spanish (HISP)

Speech and hearing sciences (SPHS)

Speech and hearing sciences/Linguistics

Speech and hearing sciences/Psychology

Speech language pathology (SPHS)

Statistics (STAT)

Telecommunications (TEL)

Theatre and drama (THTR)

Urban studies (certificate only)

West European studies (minor only) (WEUR)

Yiddish studies (minor only) (GER)

## African American and African Diaspora Studies (AAAD)

African American and African Diaspora studies (AAAD) has evolved into a twenty-first century liberal arts field that utilizes numerous disciplines to examine the myriad of experiences of people of African descent in the United States and throughout the world. Areas of study include arts, literatures and writings, film, folklore, histories, institutions, communities, culture, stratification, movements, and identities.

Liberal arts skills stressed in AAAD include critical thinking and experiential learning skills, creative writing, reflective critical reading, ethical and moral reasoning, service learning, community service, intercultural competence and social justice as a civic duty of value, scholarship of engagement, and interdisciplinary analysis.

AAAD graduates are enjoying careers in medicine, theatre and drama, music composition, information technology, law, engineering, education, journalism, criminal justice, creative writing, fundraising, politics, social work, business, community organizing, and numerous academic fields.

For the major in African American and African Diaspora studies, a student must complete a minimum of 30 credit hours of undergraduate course work selected from concentration areas including 1) arts; 2) literatures and writings; 3) histories, cultures, and social issues; and 4) social and behavioral sciences.

Recommended first-year courses for a major: AAAD-A 100, 110, 120, 141, 142, 150, 154, 156, 201, 203, 210, 221, 249, 250, 264, 265, 278, 290.

Please check the department Web site, www.indiana.edu/~afroamer/

#### African Studies (AFRI)

The African Studies Program provides unique opportunities for students at Indiana University to study with a distinguished faculty, to meet with visiting Africanists from all over the world, and to use the outstanding facilities of the libraries, the Archives of Traditional Music, and the IU Art Museum.

The undergraduate Area Certificate in African Studies was established to satisfy the academic needs of undergraduate students interested in African studies. The certificate provides background for careers in government, business, and the academic world.

To obtain an Area Certificate in African Studies, candidates for the B.A. degree in a major field must complete AFRI-L 231 African Civilization, AFRI-L 232 Contemporary Africa, and four additional 3 credit hour courses with African content from specified disciplines. Those interested in the certificate should talk with the associate director in Woodburn Hall 221.

Demonstrated proficiency or completion of two semesters in a language used on the African continent (other than English)—French, German, Portuguese, Spanish, or any African language, e.g., Arabic, Hausa, or Swahili—is also required.

#### **American Studies (AMST)**

The American Studies Program now offers a Bachelor of Arts degree, which sets the United States—its cultures, social dynamics, and histories—in a hemispheric "pan-American" context and prepares students for the extraordinary complexities of life in the globalizing United States and for the challenges of national citizenship in an increasingly interconnected world. We plan to prepare students for a variety of careers, including those in education, the social sciences, law, medicine, and politics, and for graduate study in a wide range of fields and professions. Students will emerge from the major with the ability to communicate, collaborate, and work across national, cultural, and socioeconomic boundaries, with strong foreign language training, and with an informed understanding of the place of the United States in the Americas and in the world.

Students must complete 30 credit hours in American Studies. 15 credit hours must come from core courses, which include AMST-A 100, A 200, A 350, A 351, and

A 450. In consultation with the director, students design an individual concentration (minimum of 15 credit hours) that provides focus and purpose to their remaining course work in the major and that provides solid background for their senior seminar topic. The concentration will be built from concentration courses offered through American Studies and from pertinent joint-listed and cross-listed course offerings in other programs, departments, and units.

Foreign Language: Students pursuing a B.A. in American studies must demonstrate advanced language competency in a single foreign language—equivalent to a third year of study.

Recommended first-year courses for a major: AMST-A 100, A 200, A 201, and A 202.

#### **Anthropology (ANTH)**

Anthropology is the interpretive, scientific, and comparative study of humankind. The Department of Anthropology offers courses in the history of the discipline, museum studies, general anthropology, and the four subfields: anthropological linguistics, archaeology, bioanthropology, and social/cultural anthropology.

Anthropological linguistics concentrates on human communication through language, the structure of languages, and the history of their development and interrelationship. Archaeology deals with prehistoric origins and development of humankind, as well as past societies and their material remains. Bioanthropology emphasizes primate origins, evolution, and present-day biological/genetic variation and adaptation of human populations. Social/cultural anthropology studies contemporary and historical cultures and societies of every scale around the world, organized by geographical areas and interpretive themes.

Entering freshmen who are contemplating anthropology as a major and who have adequate background preparation are encouraged to enroll in one or more of the 200-level courses: ANTH-B 200 (Bioanthropology), ANTH-E 200 (Social and Cultural Anthropology), ANTH-L 200 (Language and Culture), and ANTH-P 200 (Introduction to Archaeology).

Recommended first-year courses for a major: Two courses from ANTH-B 200, ANTH-E 200, ANTH-L 200, ANTH-P 200.

## Apparel Merchandising and Interior Design (AMID)

The apparel merchandising and interior design (AMID) B.S. degree programs provide two options. The apparel merchandising option prepares the student for a variety of career positions in business, such as retail store

manager, buyer, and product developer. The interior design curriculum emphasizes research and analysis in preparing students to integrate the client's spatial, functional, technical, regulatory, and aesthetic goals. Career opportunities are available in firms focused on commercial and residential interior design, architecture, and manufacturing.

Apparel merchandising majors must complete a total of 32 AMID credits including AMID-H 100, 203, 204 or 207, 209, and others. They must also complete selected courses outside AMID including ECON-E 201 and 202; SOC-S 100; PSY-P 101; CSCI-A 110 or BUS-K 201; and other upper-level business courses. Students should complete AMID-H 100, 203, and 209 as early as possible.

Recommended courses for the first year for students considering an apparel merchandising major: AMID-H 100 (fall), 209 (spring), SOC-S 100, PSY-P 101, one year of foreign language.

Interior design majors must complete a total of 42 AMID credit hours including H 168, H 271, H 272, H 277, and others; plus selected courses outside AMID including FINA-A 102; and any two of the three FINA-F fundamental studies courses 100, 101, or 102.

Recommended first-year courses for an interior design major: AMID-H 168; at least one course from FINA-F 100, F 101, F 102, or FINA-A 102; one year of foreign language; total of five distribution courses.

#### **Astronomy and Astrophysics (AST)**

The Department of Astronomy and Astrophysics offers courses toward the B.S. degree in astronomy and astrophysics as well as 100-level courses for non-astronomy majors. The degree program prepares students for graduate study and a subsequent career in astronomy and astrophysics. The program also serves the needs of students preparing for careers in related technical fields. Students enrolled in this program use the telescopes on the rooftop of Swain Hall, the Morgan-Monroe State Forest Observatory, Wisconsin-Indiana-Yale NOAO Observatory, and the computing facilities in Swain Hall.

The prospective major should begin the mathematics and physics sequence in the freshman year to help complete the program in four years. Prospective majors should meet with the Department of Astronomy undergraduate advisor as soon as possible to plan a four-year course schedule. Prospective majors with strong preparation are encouraged to take AST-A 221 and 222 in the first year.

Recommended first-year courses for a major: MATH-M 211 and 212; PHYS-P 221 and 222, courses fulfilling distribution or Topics requirement(s).

#### **Biology (BIOL)**

Biology is the study of living things—plants, animals, and microbes—at a variety of levels and from different perspectives. The B.S. degree emphasizes science more—biology, math, chemistry, and physics—while the B.A. degree includes more general education courses.

Biology majors should expect to take biology, chemistry, and math as soon as possible. Students should be aware that if they plan to take chemistry during the first semester, they will need to take the CPE (chemistry placement exam). This exam may be taken only once to determine placement level. It is *strongly suggested* that students prepare for the exam before coming to orientation. For information on the placement exam, please visit the Department of Chemistry Web site. B.S. candidates are encouraged to take MATH-M 211; the two semester sequence of MATH-M 119-M 120 may be substituted. Biology course work will begin with BIOL-L 111 and 112. BIOL-L 113 may not be taken in the first semester of residence, unless you have credit for BIOL-L 111 and BIOL-L 112 or E 111 and E 112.

Microbiology majors are not required to take BIOL-L 111. The math requirement for the microbiology B.S. is MATH-M 211 (recommended) or 119 and 120; for the microbiology B.A., 119.

Recommended first-year courses for a major:

B.A. in biology: BIOL-L 111; CHEM-C 117; one year of foreign language.

B.S. in biology: BIOL-L 111 and 112; CHEM-C 117, one year of foreign language; Topics COLL-E 103 or 104 (not 105).

B.A. in microbiology: BIOL-L 112; CHEM-C 117; one year of foreign language.

B.S. in microbiology: BIOL-L 112; BIOL-L 113 (second term); CHEM-C 117; one year of foreign language; one College Topics requirement: COLL-E 103, COLL-E 104 (not COLL-E 105).

The B.S. in Biotechnology is designed for students who wish to pursue careers in biotechnology or the biomedical sciences. It is also a basis for further graduate training. B.S. in biotechnology: BIOL-L 112; CHEM-C 117; MATH-M 211 or M 119; one year of foreign language; one College Topics requirement: COLL-E 103, COLL-E 104 (not COLL-E 105).

#### **Central Eurasian Studies (CEUS)**

The Department of Central Eurasian Studies offers an area certificate. This field embraces the languages, history, and civilization of a vast geographical expanse across central Eurasia. Within this territory, Central Eurasian peoples form or belong to the cultural areas of

Balto-Scandinavia, Central Europe, Eastern Europe, the Middle East, the Far East, Central Asia, and Inner Asia.

The Undergraduate Certificate in Central Eurasian Studies requires two semesters in one of the department languages and 15 credit hours of history, civilization, and other culture courses in the department, of which

6 credits must be at the 400 level. A minimum GPA of at least 3.0 (B) is required in all certificate courses.

Freshmen are encouraged to take CEUS-U 284 Civilization of Tibet (3 cr.).

#### **Chemistry (CHEM)**

The Department of Chemistry offers four degree programs: the B.A. and B.S. in chemistry and the B.A. and B.S. in biochemistry, and also a minor in chemistry.

The B.S. degree programs in chemistry and biochemistry are designed for students preparing for graduate work or other research work in industry or government laboratories, as well as for medical, dental, and other professional schools. Although these B.S. degree programs are challenging, they provide serious and talented students with the depth and breadth in chemistry and biochemistry, as well as in other sciences, needed for careers in scientific research. The B.S. degrees provide preparation for a wider range of career choices, including research, but also those described below under the B.A. programs.

The B.A. degree programs in chemistry and biochemistry are primarily intended for students planning to enter professional schools such as medicine, dentistry, or law, but are also great preparation for careers in business, scientific writing, or teaching. The B.A. programs offer a greater flexibility, making it possible to combine the study of chemistry or biochemistry with course work in other fields or additional majors, ultimately providing a more diverse background.

Students desiring basic courses that fulfill requirements for either degree in chemistry or biochemistry and that provide a foundation for advanced work in other scientific fields should take: C 117 (or C 103 and then C 117 as advised) and C 341, or the corresponding honors sequence, S 117 and S 341.

Recommended first-year courses for a major:

B.A. in Chemistry: CHEM-C 117 and C 341, MATH-M 119 or M 211; one year of foreign language; topics requirement COLL-E 103, or E 104, are recommended (not E 105).

B.A. in Biochemistry: CHEM-C 117 and C 341, MATH-M 119 or M 211; BIOL-L 112; one year of foreign language, topics requirement COLL-E 103 or E 104 are recommended (not E 105).

B.S. in Chemistry: CHEM-C 117 and C 341, MATH-M 211 and M 212; one year of foreign language; topics requirement COLL-E 103 or E 104 are recommended (not E 105).

B.S. in Biochemistry: CHEM-C 117 and C 341, MATH-M 119 or M 211; BIOL-L 112; one year of foreign language, topics requirement COLL-E 103 or E 104 are recommended (not E 105).

#### **Classical Studies (CLAS)**

Classical studies includes the study of Latin and Greek as well as the study of Greek and Roman culture. The study of Latin or Greek provides rigorous intellectual discipline while offering the student better comprehension of English vocabulary and grammar. Students majoring or minoring in the languages pursue a wide variety of careers, including law, medicine, and teaching at the high school or university level. Modern education in classics covers a variety of historical records that encompass artistic monuments and works of literature and philosophy. Students interested in classical studies can major in Greek, Latin, or classical civilization, which includes ancient culture, art and archaeology, literature in translation, and history; minors are also available in Greek, Latin, and classical civilization.

Recommended first-year courses for a major:

Classical civilization: one course from CLAS-C 101, C 102, C 205, C 206.

Latin: CLAS-L 100 and L 150 (or equivalent proficiency).

Greek: CLAS-G 100 and G 150 (or equivalent proficiency), see advisor; one year foreign language.

#### **Cognitive Science (COGS)**

Cognitive science explores the nature of intelligent systems. At its core, the program focuses on theories of mind and action. The field is inherently interdisciplinary, with contributions from computer science, psychology, philosophy, neuroscience, linguistics, biology, anthropology, and other fields. Both natural intelligence in humans and artificial intelligence fall within the scope of inquiry. The field deals with aspects of complex cognition, computational models of thought processing, knowledge representation, dynamics of real-world engagement, and emergent behavior of large-scale interacting systems.

Goals of the Cognitive Science Program include a better understanding of mind and cognitive skills, and the development of intelligent systems designed to augment human capacities in constructive ways. The program is structured to give students fundamental skills applicable in a wide variety of information-related

careers: psychology, neuroscience, artificial intelligence, telecommunications, information processing, medical analysis, data representation and information retrieval, education, scientific research, human-computer interaction, multimedia, knowledge management, and information policy. The skills also have wide applicability in technical and expository writing, mathematical analysis, experimental techniques, and computer programming.

The Cognitive Science Program offers both a B.A. and a B.S. degree. Students considering a major in cognitive science should consult with the program advisor during the freshman year. See the Cognitive Science Undergraduate Program Web page: www.cogs.indiana.edu/~underg

Recommended first-year courses for a major: COGS-Q 240, CSCI-C 211, LING-L 103, PHIL-P 105, PHIL-P 150, PSY-P 101 (or P 155 or P 106).

#### Communication and Culture (CMCL)

The Department of Communication and Culture advances the study of communication as a cultural practice and teaches an array of perspectives that enable students to prepare broadly for a variety of careers. Requirements for the major and minor are flexible in order to promote individualized programs of study that draw on departmental foci in rhetoric and public culture, film and media, and performance and ethnography.

Rhetorical studies orient students to the strategic dimension of human communication associated with deliberation, advocacy, and persuasion in a variety of social, political, and professional settings. Studies of media focus primarily on film and television, with additional emphasis on topics such as radio, recorded music, and interactive digital technologies. Performance and ethnographic studies explore an array of communicative practices, from the conversations and disputes of everyday life to artful performances at cultural events, which are the competencies essential for participation in social life. They also bring intercultural and transnational considerations into focus by examining how diversity and differences of various kinds are negotiated across boundaries. Together, these three dimensions examine communicative practices across the corporate, social, political, visual, and ideological dimensions of culture. They provide a strong grounding in the history, theory, production, and critique of communication, whether in the form of interpersonal dialogue, storytelling, political discourse, film, or television.

Recommended first-year courses for a major: CMCL-C 190, C 205.

#### **Comparative Literature (CMLT)**

This major introduces students to the study of literature in different ages and across national, linguistic, and cultural boundaries. Students learn about texts, themes, literary types, and intercultural relations as well as the methods and theories of comparative literary study. Courses explore relationships between literature and the visual arts, film, music, and other performance arts as well as other disciplines, such as philosophy, history, and religious studies. All readings are in English. Majors may choose from our course offerings according to their particular interests.

Recommended first-year courses for a major: CMLT-C 145 and C 146 in conjunction with ENG-W 143 to fulfill the English composition requirement. Students who have already fulfilled this requirement should take CMLT-C 205 and any other comparative literature course at either the 100 or 200 level. Freshmen should also take two courses in foreign language or literature in their first year because the comparative literature major requires at least one 300-level literature course in a foreign language.

#### **Computer Science (CSCI)**

Computer science forms the conceptual foundation of the information revolution and spans a broad spectrum of fields, ranging from mathematical foundations to user applications. A high level of computer literacy is an essential component of any well-rounded education and is increasingly an indispensable part of all professional careers.

CSCI-C 102 Great Ideas in Computing is recommended for students who are interested in computer science and who would like a broad introduction to the most exciting concepts in the field.

Students may pursue a B.A. in computer science through the College, or a B.S. through the School of Informatics (see p. 57). For students interested in a B.A. program, the starting point is CSCI-C 211 followed by CSCI-C 212, or their honors versions. First-year students interested in majoring in computer science should take MATH-M 211 (or the preparatory course, MATH-M 027) at the same time they take either CSCI-C 102 or CSCI-C 211.

The College offers a minor in computer science. To earn a minor in computer science, a student must take CSCI-C 211, CSCI-C 212, CSCI-C 241, and either CSCI-C 335 or CSCI-C 343.

#### **Criminal Justice (CJUS)**

The department provides students with a liberal arts education to assist them in understanding problems of crime, law, and social control systems. A major in

criminal justice provides an excellent foundation for careers and graduate work in law, social work, journalism, government, research, or community service. Working with our multidisciplinary faculty, students also may prepare for positions in law enforcement, criminal justice management and administration, and corrections.

Recommended first-year courses for a major: CJUS-P 100 and P 200.

## East Asian Languages and Cultures (EALC)

The Department of East Asian Languages and Cultures is a multidisciplinary and multicultural department that aims to provide students with an enhanced understanding of Chinese, Japanese, and Korean languages and cultures. The department offers a wide range of culture courses, open to nonmajors, that deal with virtually every facet of the cultures of East Asia. Language courses in Chinese, Japanese, and Korean are offered from beginning to advanced levels.

Two majors and two minors are offered. The majors differ in the amount of language required and in the specificity and range of culture courses allowed. There is a language minor in Japanese, Chinese, or Korean, and a minor in East Asian studies, which requires no language training. As part of the baccalaureate training, we encourage students to study abroad in China, Japan, or Korea on one of IU's overseas study programs.

Students who have mastered the languages of China, Japan, or Korea and have a corresponding understanding of their cultures are in high demand in both business (especially international communications and finance) and government and diplomacy, not to mention a variety of nonprofit organizations. In addition, there are more opportunities each year for teaching the East Asian languages in high schools.

Recommended first-year courses for a major:

Language and culture: language course determined by placement exam, or C 101 (Chinese), J 101 (Japanese), or K 101 (Korean) for absolute beginners.

East Asian studies: Any 200-level "E" course, or language course listed above.

#### **Economics (ECON)**

Economics is the study of how individuals and societies manage their scarce resources—people must decide how much they work, what they buy, how much they save, and how they use their leisure time. Most societies use decentralized markets as the primary means of allocating resources, so economics gives students insight into how markets function in coordinating the

activities of many and diverse buyers and sellers. Economics also analyzes the trends and forces that affect the economy as a whole, including growth in average income, the portion of the labor force that cannot find work, and the rate at which prices are rising. A major in economics provides excellent preparation for graduate and professional school and for rewarding careers in consulting, finance, and other private and public sector employment.

The department offers course work in several areas of economics, including financial economics, money and banking, public finance, international economics, economic development, industrial organization, game theory, and economic history.

Students interested in economics should begin their study with E 201. Discuss your readiness for this course with your advisor.

Recommended first-year courses for a major: MATH-M 118; MATH-M 119 (or MATH-M 211).

## INTERDEPARTMENTAL MAJOR IN ECONOMICS AND POLITICAL SCIENCE OR IN ECONOMICS AND MATHEMATICS

Students interested in combining political science and economics study, or mathematics and economics study, can select an interdepartmental major including courses in both areas.

#### **English (ENG)**

The Department of English offers courses in all periods of English and American literary history, in major authors, in writing, in language, in film, in creative writing (fiction, poetry, and creative nonfiction), and in relationships between literature and such other disciplines as psychology, philosophy, and history. Courses are also offered in the areas of women and literature, Jewish literature, and Native American literature.

The English program is flexible, allowing students to concentrate in areas of their choice. The department offers several ways for students to satisfy the composition requirement. W 170 or L 141-L 142 are two particularly appropriate avenues for students to follow if they are considering English as a major. The department also offers a wide variety of courses open to first-year students who have completed their English composition requirement. To count toward major requirements, English course work must be at the 200 level or above. ENG-L 202 Literary Interpretation, which majors usually take in their sophomore year, can be taken by well-prepared freshmen in their second semester. A variety of other 200-level courses can also be considered, including W 270, a sophomore-level course that focuses on writing argumentative essays.

Recommended first-year courses for a major: ENG-W 170, one 200-level literature course, or a creative writing course.

#### **Environmental Science**

The B.S. in Environmental Science (B.S.E.S.) stresses a strong background in scientific and mathematical skills to prepare students to work toward solutions to the world's complex environmental problems. Students interested in an applied science degree with the potential for significant impact should consider this degree. A joint degree from the College of Arts and Sciences and the School of Public and Environmental Affairs, it is the only undergraduate degree with this administrative system, and one that takes advantage of the strengths of both academic units.

A specific B.S.E.S. area of concentration is usually declared after the first year of study. This decision is made in consultation with the program director. One of the following areas of concentration may be selected: atmospheric science, ecosystem science, general environmental science, hydrology and water resources, mathematical modeling, pollution control technology and remediation, and surficial processes.

Some recommended courses for the first year for students considering the B.S.E.S. major: BIOL-L 111, CHEM-C 117 (consult advisor for proper placement), MATH-M 211, and one course in the physical sciences such as GEOG-G 107, GEOL-G 105 or GEOL-G 171.

#### Fine Arts (FINA)

Three undergraduate degrees are offered by the Henry Radford Hope School of Fine Arts: The Bachelor of Arts (B.A.) in art history, the Bachelor of Arts (B.A.) in studio art, and the Bachelor of Fine Arts (B.F.A.) in studio art.

Students may also complete a Bachelor of Arts (B.A.) with a double major in art history and studio or a major in one area and a minor in the other.

The B.A. in art history is designed 1) to introduce students to the significant developments in the history of art, examining the major artistic achievements within the context of the period and culture in which they were produced, and 2) to train students in the discipline and methods of art history.

Both the B.A. and B.F.A. degrees in studio art enable students to develop visual perception; to gain a command of tools, techniques, and materials; to analyze, organize, and interpret elements of concepts; and to create visual expressions that are integrated and complete. The B.F.A. degree, designed to meet the needs of students with demonstrated superior ability and motivation, requires twice as many credit hours of studio courses as the B.A. The requirements for the B.A.

and B.F.A. studio degrees are identical for the freshman and sophomore years, however.

Recommended first-year courses for a major in art history: FINA-A 101 and/or A 102.

Recommended first-year courses for a major in studio art: Two courses from FINA-F 100, F 101, F 102; A 101 and/or A 102.

#### Folklore and Ethnomusicology (FOLK)

Folklore and ethnomusicology explore the dynamics of tradition and creativity in society, past and present. Folklore investigates expressive communication in cultures throughout the world to explain how people use traditional knowledge and practices to participate in new, often challenging, situations of contemporary life. Ethnomusicology analyzes the role of music in human life and the cross-cultural study of music.

Folklore and ethnomusicology are combined into one truly interdisciplinary department. Students use the tools of anthropology, literature, history, political science, international studies, and the performing arts. Our students focus on urban, rural, foreign, and domestic topics, often utilizing field work.

While many of the department's graduates are accepted into nationally recognized postgraduate programs, others move on better prepared for careers in the arts, education, historic preservation, cross-cultural business, and multimedia communications.

Recommended first-year course for a major: F 101, F 111, or F 131.

#### French (FRIT)

A major in French provides excellent academic preparation for many professions in various fields, including education, business, travel, and publishing.

The department offers a broad selection of courses in French literature, language, and civilization. Majors may give special emphasis to any one of these areas, or combine all of them in a more balanced program.

FRIT-F 200 Second Year French I is the first course that counts toward the French major. Students with at least third-year proficiency in French by the junior year should consider foreign study with the IU Overseas Study programs in Aix-en-Provence or Paris. Interested students should begin to consider this option during the freshman year to arrange their schedule for their junior year abroad or for a future summer in France.

Recommended first-year courses for a major: FRIT-F 100 and F 150, or placement-level course.

#### **Gender Studies (GNDR)**

The Gender Studies Program offers exciting, interdisciplinary, and rigorous courses that concentrate on the position of women and men across many cultures. Masculinity and femininity, often referred to as gender, have evolved throughout history and are still evolving. Gender is a feature of all known cultures and is subject to continual reinterpretation and wide cross-cultural variation.

Gender studies courses explore issues related to gender across academic subjects. They examine sexuality, the body, race and class, business and politics, health, developing societies, artistic movements, academic institutions and knowledge, sports and leisure, law, the media, and many other areas.

The major or minor complements and enhances the content of other courses and majors.

Graduates find occupations in human resources management, public relations, advertising, or the media. Others may become lawyers, doctors, journalists, social workers, or psychologists. Still others will work in law enforcement, education, welfare, the arts, public administration, and international aid organizations. Graduates will also be prepared to enter the full range of graduate and professional education. Visit the IU Gender Studies Web page: www.indiana.edu/~gender.

Recommended first-year course for a major: G 101.

#### Geography (GEOG)

Courses offered by the Department of Geography form an important component of liberal education and also provide skills and knowledge necessary for careers in both the private and public sector. The undergraduate program reflects the breadth of geography and its linkages to other social and physical sciences. Courses are in atmospheric science, environmental studies, international studies, geoinformatics, human geography, and sustainable systems. The B.A. degree program provides a strong liberal arts education focusing on the major subject areas of geography, while maintaining a great deal of flexibility. The flexibility allows students to focus on particular concentration areas and/or to choose a second major. The B.S. degree provides additional science requirements that prepare science-oriented students for graduate school and science-related jobs at the bachelor's degree level. Students pursuing a B.S. degree focus on either the atmospheric science or the geoinformatics concentration.

Visit the program's Web page: www.indiana.edu/~geog.

Recommended first-year courses for a major: GEOG-G 107 or G 109; GEOG-G 110 or G 120.

#### **Geological Sciences (GEOL)**

The Department of Geological Sciences offers a large number of courses that serve as excellent introductions to earth processes that directly affect humanity with application to such problems as pollution of the environment, groundwater flow, and natural hazard assessment and preparedness (earthquakes, volcanoes, etc.). Many pressing environmental issues are related to basic processes best explored and understood through the geological sciences. Other courses emphasize the earth as a member of the solar system, the origin of life, and earth materials. Interested students may pursue these themes further on a topical basis or consider a minor or major in geological sciences.

Students interested in a degree in geological sciences may elect either a B.A. or B.S. degree option. The B.S. degree provides a broad and solid science platform for professional employment or advanced study. The B.A. degree provides more program flexibility than the B.S. and preserves the broad liberal arts education. Therefore, it allows students to complete a double major (for example, with anthropology or economics) for those wishing to use geology in a wide variety of careers in business, industry, government, and teaching. In addition to a broad general education, the B.A. degree with additional science and mathematics courses (or the B.S. degree) provides an adequate background for advanced study and greater possibilities for employment.

Recommended first-year courses for a major:

B.A. in geological sciences: either GEOL-G 111 or G 112; or GEOL-G 103, G 104, G 105; CHEM-C 101-C 121 or C 103.

B.S. in Geological Sciences: either GEOL-G 111 or G 112; or GEOL-G 103, G 104; MATH-M 211 and M 212; C 117 (preceded by C 103 if necessary); one year foreign language; one College Topics requirement: E 103 or E 104 (not E 105).

#### **Germanic Studies (GER)**

The department offers courses in Dutch, German, Norwegian, and Yiddish language, literature, and culture—including several courses taught in English.

Requirements are flexible, allowing students to emphasize language, linguistics, literature, or culture. German majors often complete a double major, adding study of another field to that in German.

There are opportunities to study abroad including a full-year or spring term program in Freiburg, Germany, and a summer program in Graz, Austria.

Recommended first-year courses for a major: GER-G 100, G 105, or placement-level course.

#### **History (HIST)**

Studying history gives students the opportunity to discover the origins of today's issues, events, and ideas. History provides an understanding of how change takes place and why some things stay the same. History welcomes different approaches to the past, including the study of individuals, populations, cultures, and social movements. Among liberal arts majors, history graduates stand out as experts in recognizing and analyzing patterns of information. History majors become skilled in formulating significant questions, finding and evaluating evidence, and analyzing a problem from multiple perspectives and methods. Training in history gives students important skills such as critical analysis, research, and clear and persuasive writing that are applicable across all disciplines and in many professions. The major allows students to concentrate on their particular interests while giving them a context in which to understand them.

The department offers courses on nearly every area of the world—from the United States and Western Europe to Africa and the Near East and East Asia. Freshmen may begin with introductory courses in American History (H 105-H 106), European History (H 103-H 104), or with H 101-H 102 The World in the Twentieth Century.

Region and time are only two distinguishing features of the department's course offerings. At both the 100 and 200 levels, students will find courses that approach the past from the perspective of a special group (for example, H 205 Ancient Civilizations), a special problem (such as H 213 The Black Death), or a special theme (as in A 200 Gender and Sexuality in U.S. History).

Students who graduate with a degree in history have a world of opportunity awaiting them. Many go on to graduate programs in law, education, history, business, journalism, and public relations. Others decide to go directly into either private or public sector careers. History majors receive a broad-based, yet practical, liberal arts education.

Recommended first-year courses for a major: 3-6 cr. in 100- and/or 200-level history courses. For additional information about major requirements visit, the Department of History Undergraduate Web page at: www.indiana.edu/~histweb/ugrad/.

## History and Philosophy of Science (HPSC)

History of science describes the origins and evolution of scientific ideas within a cultural context. It deals with where new scientific ideas come from; how the development of scientific theories is influenced by metaphysics, religion, technology, and social institutions; and how scientific discoveries have

changed humanity's conception of its place in nature. Philosophy of science analyzes the structure of scientific theories and describes scientific methods.

At present there is no major, but students can receive an area certificate (Culture of Science and Medicine) or earn a minor. Those wishing to pursue study specifically in this area can do so through the Individualized Major Program.

The area certificate involves several different tracks: 1) medicine and health; 2) science writing, literature, and literacy; 3) science, technology, and the environment; 4) science, computation, and information; 5) science and pseudoscience. Students interested in the certificate should begin with the core course, X 102.

Recommended courses for students interested in this field: HPSC-X 100, X 102, X 110, X 123, X 126, and X 200. There are other 200-level courses that might be appropriate for freshmen—check with your advisor.

# **Human Biology (HUBI)**

Students studying Human Biology explore the social, cultural, and ethical consequences of biological issues to gain an appreciation for the complexity of humanity. Students work collaboratively in a problem-based curriculum and are considering careers in medicine or other health professions, the life science industries, government, public policy, law, journalism, education, and research.

Human Biology offers two degrees, the B.A. and the B.S., and an area certificate. Visit the Human Biology website for more info: www.indiana.edu/~humbio.

Recommended first-year courses for a major: HUBI B 101 and HUBI B 102; for students considering the certificate, MSCI M 131.

# **India Studies Program (INST)**

Modern India represents a cluster of cultures and civilizations whose 1 billion inhabitants make up nearly 20 percent of the total population of the world. As a modern nation-state, India has the third largest military in the world, stands about twelfth among nations of the world in gross national product, and is about fifteenth in industrial production. It is also the cradle of many of the world's religions (Hindu, Buddhist, Jain, Sikh) as well as many of the great cultural-historical periods in the development of civilization (including the Hindu-Brahmanical, Buddhist, Muslim, Sikh, and modern Indo-British). The Indian community is the fourth wealthiest community in the United States, with several thousand members living in Indiana.

This program offers undergraduates the options of a major, minor, and certificate.

The core introductory course is I 310. Students majoring in India studies will be required to complete 28 credit hours in the area and pursue a second major within the College or a second degree from one of the professional schools. The minor requires a total of 15 credit hours and offers specializations in three areas: literary and performance studies; philosophical and religious studies; or social, political, and historical studies. See advisor for certificate requirements.

# Individualized Major Program (IMP)

Formal requirements for admission to the Individualized Major Program (IMP) are the same as those for the College of Arts and Sciences, except that the IMP requires a minimum cumulative GPA of 2.5. Students who do not meet this requirement but who can present persuasive evidence in their favor may request permission from the IMP director to formally present a case to the IMP admission committee, which makes the final decision on admission.

The IMP enables independent, highly motivated students who have well-developed interests to pursue a Bachelor of Arts (B.A.) degree in the College of Arts and Sciences through a course of study that, while meeting all College requirements and conforming to general university standards of breadth and rigor, is tailored to individual interests and goals. IMP students, working closely with their faculty sponsors, pursue interests that cut across usual departmental and disciplinary boundaries.

Examples of recent majors include medical illustration, arts management, film/video production, fashion design, paleobiology, environmental studies, screenwriting, Latin American culture, photography, multimedia studies, public relations, and animal psychology.

The Individualized Major Program is administered by a faculty committee that is responsible for granting admission to the program, for reviewing student programs under way, for evaluating a thesis or project, and for the final oral review.

Students wishing detailed information concerning the IMP should consult with the assistant director at Ballantine Hall 129, (812) 855-9588.

## **International Studies (INTL)**

This major is an excellent choice for students who are interested in meeting the unprecedented global challenges of the twenty-first century, challenges that require all of us to have greater knowledge of the languages and cultures of the world. Students wishing to acquire additional expertise and fluency in a particular discipline or area study would be able to

couple the international studies major with a second major, or with minors and certificates. With careful planning, students choosing degrees from a professional school (such as Journalism, Kelley School of Business, Jacobs School of Music, Education, Public and Environmental Affairs, and Health, Physical Education, and Recreation) can add international studies as a second degree program.

Major requirements are broadly constructed to allow flexibility as well as depth. Courses for the major are organized in five parts—core courses, electives in thematic concentrations (see below for the concentrations offering freshman courses), electives in one regional concentration, a language requirement (two semesters in addition to the College's foreign language requirement but not necessarily in the same language), and a senior capstone seminar. Overseas study or an internship with an international dimension is also required. The freshman year is a good time for students to begin taking a language that is spoken in the country where they might later choose to study overseas.

Recommended first-year courses for the major: INTL-I 100: Introduction to International Studies and courses depending upon your interests from the following thematic concentrations: Culture and the Arts (INTL-I 201 and CMCL-C 202; FINA-A 290; GNDR-G 225), Global Environment (INTL-I 202, GEOG-G 208, REL-R 236), Global Markets and Governance (INTL-I 203 and ECON-E 201, E 202 are recommended as prerequisites for upper-division courses), Human Rights and Social Movements (INTL-I 204), International Communications (INTL-I 205 and CMCL-C 202), Nations, States, and Boundaries (INTL-I 206 and GEOG-G 210). Also, 100- and 200-level courses from the various area studies and departments are recommended as preparation for the upper-level courses that are required for the major. See advisor.

For more information on a major or a minor in International Studies, see www.indiana.edu/~intlweb.

# Italian (FRIT)

A wide variety of language, literature, and culture courses in Italian are open to University Division students. Freshmen may begin their language study with M 100-M 150; those students with previous work in Italian may place into courses above this level. Students may also elect Italian courses on such topics as the Italian cinema, Italian literature in translation, and various aspects of Italian culture to fulfill culture studies requirements.

A major in Italian or a double major in Italian and another area provides excellent academic preparation for work in the humanities, in the social sciences, and in music and the fine arts. Students with an interest in the Italian major should contact the undergraduate advisor

in the Department of French and Italian as soon as possible in their academic studies. Study abroad through the IU overseas study programs in Bologna or at the summer campus in Florence is recommended not only for Italian majors but also for those in other fields. Interested students should begin to consider this option during the first year of study to arrange their schedule for their junior year abroad or for a future summer in Italy.

M 200 Second-Year Italian I is the first course that counts toward this major.

Recommended first-year courses for a major: FRIT-M 115, or FRIT-M 100 and M 150 or 3-6 credits at the 200 level (M 200 and M 250).

## **Jewish Studies (JSTU)**

Jewish studies is the study of the Jews and Judaism. It is open to students from all backgrounds. Because Jewish culture is multilingual and multicultural, its study is an excellent way to obtain a good liberal arts education. Students can pursue either a major or an area certificate and/or a Hebrew minor in Jewish studies. Students interested in Jewish studies should see the departmental program during the freshman year. Call (812) 855-0453.

Note: The area certificate is particularly appropriate for students in the Kelley School of Business who can fulfill the Arts and Social Services or Global Studies and Languages Field Specialization by completing the area certificate. Music students may complete the area certificate along with a Bachelor of Music or complete a B.S. in music with Jewish studies as an outside field. Students in the School of Journalism can complete their second concentration by completing the requirements for the Jewish studies major or area certificate.

Students interested in a career in Jewish education should pursue the major in Jewish studies rather than a degree in education. Only students who primarily want to teach in a public school should become education majors. Jewish studies majors are encouraged to pursue a second major.

The major requires at least two semesters of modern Hebrew, biblical Hebrew, or Yiddish; REL-R 245 Introduction to Judaism or HIST-H 251 Introduction to Jewish History: From the Bible to the Spanish Expulsion; HIST-H 252 Introduction to Jewish History: From the Spanish Expulsion to the Present; four courses in one of the following three areas: a) language and literature, b) history and society, c) religion and thought; and two additional courses outside a student's area of specialization (listed above).

The area certificate, more significant than a minor, requires eight courses from the three major areas of Jewish studies. There is no minor in Jewish studies, but there is a minor in Hebrew.

Recommended first-year courses for a major: Modern Hebrew (fall) JSTU-H 100/H 200/H 300/H 480 and (spring) JSTU-H 150/H 250/H 350/H (level depends upon language placement exam) or Biblical Hebrew (fall) JSTU-B 100 and (spring) JSTU-B 150, or Yiddish (fall) GER-Y 100 and (spring) GER-Y 150; HIST-H 251 (fall) or REL-R 245 (spring), HIST-H 252 (spring), COLL-E 103 The Bible and Its Interpreters, or COLL-E 104 What Makes It Jewish? (fall).

For more information, see the Web: www.indiana.edu/~jsp/Freshman.htm.

# Leadership, Ethics, and Social Action Program (LESA)

Do you want to make a difference in the world? Find out what civic skills can do for your education and future. With an interdisciplinary minor in leadership, ethics, and social action through the College of Arts and Sciences, you can explore the concept of leadership through the lens of community action and can acquire practical political skills that will be of enormous value to you. You can deepen your academic curriculum in any field as you develop your career and citizenship skills.

There are five components to this 16 credit minor: the foundations course, the ethics requirement, the social organizations requirement, a civic engagement seminar, and the capstone seminar and project. The foundations course, LESA-L 105 Beyond the Sample Gates, satisfies the Topics requirement for the College and distributes as a Social and Historical (S&H) general education course. This course offers a chance to contribute to the community and to reflect upon your own motivations and the structures of society.

Choose from courses in various departments and from different perspectives for the ethics requirement (PHIL-P 140 Introduction to Ethics; POLS-Y 105, Introduction to Political Theory; REL-R 170 Religion, Ethics, and Public Life); and the social organizations requirement (ANTH-E 105 Culture and Society; SOC-S 215 Social Change; SOC-S 217 Social Inequality).

The capstone seminar and project involve a semester of planning and a semester of carrying out an individual project, designed in consultation with a faculty mentor and a community partner. Speak with the LESA advisor about sequencing.

Explore this program by taking the foundations course, LESA-L 105, in your first year. Consult with the LESA advisor early in your degree for more information, lesa@indiana.edu. The program is housed in the Department of Political Science, Woodburn 210, (812) 855-6308. More details are available on the Web site: www.indiana.edu/~lesa.

# Liberal Arts and Management Program (LAMP)

For students in the Liberal Arts and Management Program, one perspective is never enough. No matter what field you plan to enter—from advertising to foreign service to the practice of medicine—an understanding of management is crucial for success. You, too, can combine your passion for the arts and sciences with courses in management. LAMP will connect you with students and faculty from different disciplines—bringing many perspectives—and offer you a dynamic, deeply thought-provoking, and realistic preparation for life's work.

An interdisciplinary certificate program offered by the College of Arts and Sciences in cooperation with the Kelley School of Business, LAMP allows you to integrate any major in the College with specialized training in management. LAMP students take courses in business law, accounting, management, and computer applications in the Kelley School of Business, as well as economics courses in the College. Through interdisciplinary LAMP seminars, students integrate their course work to solve real-world problems and analyze relationships between business and society.

If you have a strong academic background, wide interests, and leadership potential, we invite you to apply to this honors-level program in the spring of your freshman year. Approximately 100 students are admitted to LAMP each year. Admission requires a minimum cumulative GPA of 3.0, and students in the program must maintain a cumulative GPA of at least 3.3. LAMP can be your ticket to a dynamic university experience that provides crucial skills that you'll need to succeed in work and life.

Students interested in LAMP are advised to take the freshman seminar, LAMP-S 104 Understanding a Local Economy. In the freshman year, students are encouraged (but not required) to take ECON-E 201 and E 202, and BUS-A 100 in addition to taking English composition, mathematics, and a foreign language.

Contact the academic advisor at the Liberal Arts and Management Program, Wylie Hall 245, (812) 856-4966 or at LAMP@indiana.edu, or consult the LAMP Web site at www.indiana.edu/~lamp.

# Linguistics (LING)

Linguistics is the scientific study of language in communication and of human beings' ability to assign meaning to sounds and symbols. Introductory courses in language and linguistics are offered, as well as advanced courses leading to a major. The introductory courses give the student an understanding of both language structure and meaning. Varieties of speaking, such as regional dialects, social dialects, gender

differences, and the languages of politics and religion, are also examined. Other courses deal with the acquisition of language by children, the nature of language change, and the properties of some of the world's major languages. The department also offers courses in African languages and, periodically, in Haitian Creole.

Of interest to University Division students are L 103 Introduction to the Study of Language, any of the L 100-L 300 series courses, and beginning African languages.

International students should receive information about T 101 English Language Improvement. Placement in T 101 is determined by results of the Indiana English Proficiency Test, administered upon students' arrival in Bloomington. For more information about English for non-native speakers, contact the Department of Second Language Studies, Memorial Hall 313, (812) 855-0033.

Recommended first-year courses for a major: LING-L 103, L 111, L 112, L 113, L 114, L 210, L 303, L 367.

### **Mathematics (MATH)**

Mathematics is fundamental for science, business, engineering, and computers. The study of mathematics develops problem-solving skills that can be applied to many situations. Math classes include students majoring in other subjects, students with a mathematics minor, and students majoring in mathematics.

The department offers a B.A. and two kinds of B.S. degrees. Within the B.A. program, it is possible for a student to have a double major with an additional liberal arts area. Graduates with a B.A. degree pursue a wide variety of career opportunities, including business, industry, education, and government; they also earn advanced professional degrees such as medicine, business, and law. The B.S. degree provides more extensive training in mathematics and is often earned by students interested in pursuing graduate degrees in mathematics (Program I) or in related areas such as astronomy, chemistry, computer science, economics, geology, physics, or psychology (Program II).

The calculus sequence M 211-M 212 is the normal starting point for all majors and minors. With departmental consent, students with superior ability may choose to take Honors Calculus, S 212, while well-prepared students may take Accelerated Calculus, M 213.

#### INTERDEPARTMENTAL MAJOR IN MATHEMATICS AND ECONOMICS

Students interested in combining mathematics and economics study can select an interdepartmental major including courses in both areas.

#### ACTUARIAL STUDIES WITHIN A MATHEMATICS DEGREE

Actuaries use mathematics and financial theory to determine the financial effect that uncertain events such

as birth, death, fire, accident, and illness have on insurance and benefit plans. It is possible to design a program within the B.A. or B.S. degree—including courses in economics, computer science, and business—that will prepare a student for entry into the actuarial profession, but the B.S. in statistics is usually recommended for students interested in actuarial science. See statistics on p. 41.

Recommended first-year courses for a major:

B.A. in Mathematics: MATH-M 211 and MATH-M 212.

B.S. in Mathematics: MATH-M 211 and M 212, or MATH-M 212 and M 303, or MATH-S 212 and S 303.

# Near Eastern Languages and Cultures (NELC)

The department offers courses in Middle Eastern literature and civilization. Majors take three years of their major language, and five additional courses chosen with the consent of the undergraduate advisor or two years of a language and seven additional courses. Students may also use the culture background provided by courses in this department to complement programs in history, folklore, fine arts, political science, religious studies, and other areas.

The department also offers an undergraduate minor. Students can choose to minor in Arabic, Hebrew, Persian, Turkish, or in Near Eastern civilization. Each minor requires 15 credit hours, passed with a grade point average of C+ or higher. For more details, contact the undergraduate advisor at (812) 856-7039.

Recommended courses for the first year for students considering a major: one year of major language.

# Philosophy (PHIL)

Philosophy is a reasoned pursuit of fundamental truths, a quest for understanding, and a study of principles of conduct. Philosophy seeks to establish standards of evidence, to provide rational methods for resolving conflicts, and to create techniques for evaluating ideas and arguments.

P 100 is a general course emphasizing philosophical problems. Many other courses in philosophy are open to first-year students. Several are in the history of philosophy and focus on the writings of important philosophic figures. Others explore logic, scientific and everyday reasoning, ethics, social and political philosophy, or phenomenology and existentialism.

The department encourages majors to take one 100-level course other than P 105 or P 150 during the first year, and at least one 200-level course in philosophy during the second year.

#### INTERDEPARTMENTAL MAJOR WITH POLITICAL SCIENCE

These fields enjoy significant overlap in the history of ideas, political and applied philosophy, and public affairs. This flexible major enables students to pursue an integrated course of study covering the intersection between these fields. Enhancing preparation for law and graduate school, it promotes integration of social sciences and humanities in a way likely to be useful for many other career choices as well. Contact either department for details.

#### INTERDEPARTMENTAL MAJOR WITH RELIGIOUS STUDIES

Many students are interested in topics at the borderline between these disciplines. This major produces graduates who are culturally informed and skilled at close reading, careful writing, and critical thinking. It is sound preparation for various careers and for graduate or professional education. Either department may be contacted for details.

Recommended first-year courses for a major: One course from PHIL-P 100, P 103, P 135, P 140, P 145, P 240, or P 270.

## Physics (PHYS)

The Department of Physics offers a wide variety of courses for freshmen. In particular, there are several exciting courses designed especially for liberal arts or non-science students. These courses include P 101 Physics in the Modern World, P 105 Basic Physics of Sound (with modern electronic applications), P 110 Energy, P 114 The Invisible Universe, P 120 Energy and Technology, P 125 Energy in the Next Century, and P 150 How Things Work.

The physics department offers a B.A. and a B.S. degree in physics and a B.S. degree in applied physics. Special requirements for the B.S. degree are detailed in the College of Arts and Sciences Bulletin.

The beginning sequence for physics majors is P 221-P 222. MATH-M 211 and M 212 are co-requisites for P 221 and P 222 respectively. There is a special, highly interactive honors section of P 221-P 222 for freshmen particularly interested in majoring in physics or pursuing research careers in another area of science. Prospective physics majors are strongly encouraged to consult with the Department of Physics undergraduate advisor, Scott Wissink, (812) 855-5192, e-mail: wissink@indiana.edu; and to start the P 221-P 222 sequence in their freshman year.

Recommended first-year courses for a major:

B.A. in Physics: PHYS-P 221 and P 222; MATH-M 211 and M 212.

B.S. in Physics or Applied Physics: PHYS-P 221 and P 222; MATH-M 211 and M 212.

## **Political Science (POLS)**

Are you interested in American politics? International affairs? Critical issues such as welfare reform, the environment, wars, and health policy? How we get the kinds of leaders we do, and why? If you are, you should take political science courses. Political science is the study of government and public policy and the political behavior of individuals and groups. Political science uses both humanistic and scientific perspectives and skills to examine the United States, all countries and regions of the world, and international relations.

Political science majors qualify for careers in the private and public sectors. The most frequent types of careers chosen by majors are in the fields of law, education, business, public service (including elective and appointed office), and communications.

A variety of 100- and 200-level courses with no prerequisites are offered for entry-level students. Students with unusually strong preparation in American government and politics are eligible to take a special credit examination for Y 103 American Politics, which is given each semester.

Recommended courses for the first year for students considering a major: One course from Y 103, Y 105, Y 107, Y 109, Y 200, Y 202, or Y 205. Y 205 is a required course for all students majoring in political science who matriculate after spring 2006.

# INTERDEPARTMENTAL MAJOR IN POLITICAL SCIENCE AND ECONOMICS OR IN POLITICAL SCIENCE AND PHILOSOPHY

Students interested in combining political science and economics study or political science and philosophy study can select an interdepartmental major.

Political science/economics majors who are qualified to take ECON-E 201/E 202 as freshmen should do so and begin their study of political science with Y 204, Y 205, Y 210, or Y 200 as their schedules allow. Those who need to take E 201/E 202 as sophomores may take POLS-Y 200 as freshmen. Y 204 is inappropriate for most freshmen.

Political science/philosophy majors should take both POLS-Y 105 and one PHIL course at the 100/200 level during their freshman year. Only one 100-level PHIL course counts in this major.

# **Psychological and Brain Sciences (PSY)**

The department offers majors in psychology leading to the B.A. or B.S. degree and provides course work for undergraduates who wish to satisfy distribution requirements. As a science, psychology seeks to understand the basic principles by which living organisms adapt their behavior to the changing physical and social environments in which they live. The breadth of the discipline, with its links to the humanities, mathematics, and other social and natural sciences, encourages the development of broad problem-solving skills through exposure to experimental methodology and statistical analysis, and contributes to the development of communicative skills. Psychological knowledge, techniques, and skills are applied in many careers and provide background for students entering graduate work in psychology and related areas, as well as the professions of medicine, dentistry, law, and business.

The B.A. program provides broad coverage of modern scientific psychology and the strategies and tactics by which knowledge is acquired in this field. It also requires sufficient background in science and psychology to enable good students to qualify for demanding graduate programs.

The B.S. program in psychology is designed for career-oriented and highly motivated students. The program emphasizes a broad preparation in science and the development of math and computer skills, and it requires more advanced courses and laboratory work in psychology than the B.A. program.

Recommended first-year course for either a B.A. or B.S. major: PSY-P 155. (B.S. majors should not take Topics E 105 unless the topic is Neural Basis of Human Behavior.)

The department also now offers a B.S. degree in neuroscience. It is designed for students who have an interest in the interdisciplinary field of neuroscience, and who are interested in pursuing graduate training in neuroscience, applying to medical school, or obtaining a research-related position in biotechnology, the life sciences, or the pharmaceutical industry. The major provides interdisciplinary training in basic scientific principles in the life and physical sciences that are necessary for an understanding of nervous system function, as well as training in the fundamental principles of neuroscience, and opportunities for more advanced training in specific topics in the field. Thus, students will gain a depth of understanding in neuroscience, from the cellular and molecular bases of nervous system function to a systems-level approach to the study of brain-behavior relationships.

Recommended first-year courses for a B.S. degree in neuroscience: PSY P 101 or P 106, or P 155.

# **Religious Studies (REL)**

Religion is a major force in human experience. Religious studies provides an opportunity for students to explore the ways people have struggled to make sense of the world and their place in it. Religious studies does not aim to promote or undermine any particular religion or worldview; the academic study of religion seeks to examine religion analytically.

Religious studies explores a wide range of phenomena, including the myths, symbols, values, beliefs, writings, and rituals of individuals and communities in many different times and places. Religious studies brings together perspectives and approaches from anthropology, history, philosophy, art, sociology, and literature to gain a more comprehensive view of religious behavior. Majoring in religious studies provides students with the critical thinking and writing skills and general knowledge of the world necessary to perform a tremendous variety of professional tasks. Undergraduate majors in religious studies have long been valued by law schools, business schools, medical schools, public policy programs, and a wide variety of graduate and professional programs and employers.

INTERDEPARTMENTAL MAJOR IN RELIGIOUS STUDIES AND AFRICAN AMERICAN AND AFRICAN DIASPORA STUDIES

Students interested in combining religious studies and African American and African Diaspora studies can select an interdepartmental major including courses from both areas.

INTERDEPARTMENTAL MAJOR IN RELIGIOUS STUDIES AND PHILOSOPHY

Students interested in combining religious studies and philosophy select an interdepartmental major including courses in both areas.

Visit the department's Web site: www.indiana.edu/~relstud/

Recommended first-year courses for a major: One or more 100- or 200-level introductory courses. (*Note*: Only one 100-level course may be counted in the major, unless out of two one is R 152 or R 153, then both can count.)

# Slavic Languages and Literatures (Russian) (SLAV)

The department offers courses designed to meet a wide range of special needs and interests. Slavic language courses are designed not only for Slavic majors but also for students specializing in other disciplines, particularly in the social sciences, natural sciences, and other languages and literatures. The department offers literature and culture courses that require no knowledge of Slavic languages and most of them satisfy College requirements.

Freshmen who enter the university with some previous knowledge of a Slavic language are required to take a placement test to determine which course is most appropriate for them. Such students should contact the department at (812) 855-2608 before registration and several weeks before the start of the semester.

Students contemplating a possible Slavic major, a double major, or a minor should make an appointment to see the departmental undergraduate advisor.

All students are encouraged to consider the Summer Workshop in Slavic and East European Languages (SWSEEL), which will enable them to advance in Russian or another Slavic or East European language by two semesters during the eight-week second summer session.

Courses of interest to freshmen include the following:

For Russian: R 123 Russian Short Fiction (fall and spring), R 223 Introduction to Russian Culture (fall and spring), R 263 Russian Literature from Pushkin to Dostoevsky (fall), R 264 Russian Literature from Tolstoy to Solzhenitsyn (spring)

For Croatian and Serbian: S 223 Introduction to Balkan and South Slavic Cultures, S 363-S 364 Literature and Culture of the Southern Slavs I-II (fall, spring), R 353 Central European Cinema (fall)

For Czech: C 363 History of Czech Literature and Culture (fall), C 364 Modern Czech Literature and Culture (spring), R 353 Central European Cinema (fall)

For Polish: P 363-P 364 Survey of Polish Literature and Culture I-II (fall, spring), P 365 Topics in Polish Literature and Culture, R 353 Central European Cinema (fall)

# Sociology (SOC)

Sociology is the study of the social structures and social forces that influence human behavior. Sociologists look beyond individual and unique events to the patterns in people's attitudes and activities and how these patterns vary across time, cultures, and social groups.

The department offers courses in such areas as social problems, social psychology, deviance, race and ethnic relations, population, family, and social change. A major in sociology provides an excellent foundation for many professional careers in law, business, journalism, government, community service, corrections, and social work, or for graduate work in sociology. Many sociology students have double majors.

Recommended first-year courses for a major: SOC-S 100 and one course from S 101, S 105, S 110, S 201, S 210, S 215, S 217, S 220, S 230.

# Spanish and Portuguese (HISP)

The department offers a four-year program in course work leading to the major and minor in Spanish and Portuguese, with advanced specialization in culture, literature, and linguistics. Students may also study two semesters of language work in Catalan. The department

actively participates in IU Overseas Study programs (academic year or semester study in Lima, Peru; Buenos Aires, Argentina; Madrid, Barcelona, Alicante, Seville, and Salamanca, Spain; Quito, Ecuador; Santiago and Valaparaíso, Chile; Salvador, Bahía, and São Paulo, Brazil; Monteverde, Costa Rica; and Santiago, Dominican Republic; as well as summer programs in Cuernavaca and Guanajuato, Mexico; and Salamanca, Spain) and encourages all students to live and study in a Spanish- or Portuguese-speaking country. With careful planning from the beginning, foreign study is compatible with any course of study.

Students who plan to major in either language are strongly encouraged to consider a second major. A minor or second major is required.

S 250 Second-Year Spanish II and P 200 Second-Year Portuguese I are the first courses that count in majors.

Recommended first-year courses for a major:

Spanish: Level at which student places.

Portuguese: See your advisor regarding placement.

# Speech and Hearing Sciences (SPHS)

Speech and hearing sciences encompass the study of our ability to use speech, language, and hearing and the disorders that affect this ability. Practitioners in the field—audiologists; speech-language pathologists; and speech, language, and hearing scientists—evaluate, treat, and conduct research in human communication, and its disorders, in settings such as schools, hospitals, businesses, private practice, universities, research laboratories, and government agencies.

The B.A. degrees provide an overview of the processes of speech, language, and hearing. The B.S. degrees focus more on the processes underlying speech, language, and hearing, while providing the option for more in-depth study in the sciences. Both degrees offer concentrations in either speech language pathology or audiology and afford the opportunity to go on to graduate studies within these fields. They also provide a strong science background that would be useful for entering directly into business, education, and the health professions.

Recommended first-year courses for a major: SPHS-S 110; S 111; PSY-P 101 or P 155; one of the two required mathematics courses from M 118, S 118, M 119, M 120, any 200-level or higher MATH "M" course; one Topics requirement course; one additional A&H distribution course; first year of foreign language.

# **Statistics (STAT)**

Statistics is the science of data. Data are numbers with a context; the particular context that gave rise to the numbers is important. In addition to a knowledge of

mathematics, statisticians must learn about the scientific disciplines that generate data of interest to understand and explain the observational studies or the statistical experiments in question. For example, statisticians calculate probabilities for DNA paternity tests; design clinical trials to study the effectiveness of new medications; study economic time series data, such as gross domestic product from developing countries in Africa; and develop statistical models of responses from fMRI psychological experiments.

The B.S. in Statistics provides excellent preparation for graduate and professional school as well as successful careers in academia, government, business and actuarial science.

Students interested in the major should consider taking MATH-M 211 and MATH-M 212 in their first year. For students who are interested in understanding the way statistics is used in popular media and/or scholarly articles, STAT-S 100 is an excellent choice.

## **Telecommunications (TEL)**

Telecommunications majors study a broad range of electronic media including radio, television, cable, satellite services, telephone, multimedia, and the Internet. There are three major course concentrations:

1) the electronic media's influences on audiences and users; 2) the design and production of video, audio, and multimedia messages, programs, and products; and

3) the business, legal, and managerial aspects of telecommunications. WFIU (FM) and WTIU (TV), university broadcast stations, instructional teleconferencing media, and state-of-the-art departmental production facilities are located in the Radio-TV Center and provide opportunities for student involvement.

*Note:* If you are interested in broadcast journalism, please read about the School of Journalism, p. 58. If interested in Sport Communication, see HPER, p. 53.

Recommended courses for the first year for students considering a major: TEL-T 101 and one of T 205, T 206, or T 207. T 101 is recommended to be taken before taking T 205, T 206, or T 207. Students also should consider taking SLIS-L 150 Resources in Telecommunications.

Those with design and production interests should take TEL-T 206 during the first year.

## Theatre and Drama (THTR)

The Department of Theatre and Drama offers two degrees and one certification program: the Bachelor of Arts (B.A.) in theatre and drama, the Bachelor of Fine Arts (B.F.A.) in musical theatre, and certification for teaching theatre in secondary schools (in cooperation with the School of Education).

The B.A. in theatre and drama is a flexible program. Communication and critical thinking skills are foundation experiences for most theatre study and practice.

The B.F.A. in musical theatre is a preprofessional program. Combining general studies of the liberal arts program with theatre and musical theatre performance skills, the degree work is concentrated and demanding. Students enter this selective program only by audition and through direct admission to the College of Arts and Sciences. Audition may also be possible during the freshman year.

The certification program for teaching theatre in the secondary schools is also demanding. Combining requirements of the B.A. degree with professional courses from the School of Education, this program recommends additional work in another teaching area, such as English.

Basic departmental requirements for all three programs are the same: T 100 Introduction to Theatre, T 101 Script Analysis for the Theatre, T 121 Acting I for Majors: Introduction to Acting, and T 125 Introduction to Theatrical Production. Much or all of this work can be done in the freshman year.

Students wishing to explore courses in the Department of Theatre and Drama may elect from T 100 Introduction to Theatre, T 101 Script Analysis for the Theatre, T 120 Acting I: Fundamentals of Acting, and T 125 Introduction to Theatrical Production.

# West European Studies (WEUR)

West European Studies is an interdisciplinary program in the College of Arts and Sciences that combines courses in the social sciences, humanities, and languages to give students a broad understanding of the countries of Western Europe and the European Union (EU). The program is structured by combining core courses and seminars with elective courses from other departments and schools that address topics concerning Western Europe and the EU. West European studies offers two minors. Students take one core course in political science, and four additional courses selected from the social sciences and humanities, along with a language, to complete a minor in West European studies. For a European Union studies minor, students take one course from each of three areas of concentration: Politics/Public Policy, Economics/Business, and Culture/Identity. These core courses are complemented with 9 credits chosen from additional core or area studies courses and study of a European language. West European studies and EU studies minors are easily paired with majors in English, foreign languages, fine arts, history, political science, international studies, education, journalism, business, music, and others.

# **Kelley School of Business (BUS)**

www.kelley.iu.edu/ugrad

The Kelley School of Business has been an innovator in business education for more than 85 years. The Undergraduate Program remains consistently ranked among top undergraduate business programs and across all major disciplines. It offers an outstanding curriculum of skill-based courses, featuring the Integrative Core (I-Core), where students experience the multidimensional aspects of business in a supportive, hands-on, team-based environment.

Kelley School students can study abroad, complete an internship, network with our distinguished alumni, and learn from some of the best and brightest business faculty and business leaders. Check out our Web site for more information about the Kelley School B.S. in Business.

## **BUSINESS MAJORS**

For a detailed description of the 14 business majors, go to www.kelley.iu.edu/ugrad/degrees.

# Accounting

The accounting major prepares students for careers in auditing, corporate accounting, management consulting, governmental and not-for-profit organizations, and taxation. It provides an excellent background for students who want to pursue graduate work in business, public administration, or law.

# **Economic Consulting**

The economic consulting major is intended to serve both the in-house economist and the economist in the more competitive consulting and financial services markets.

# **Public Policy Analysis**

The public policy major is aimed at students who want a liberal arts major to prepare for graduate/professional school or for a public-sector position.

# **Legal Studies**

The legal studies major gives students an opportunity to study, in depth, current legal issues and trends affecting business and society. Students gain an understanding of the critical role that legal considerations play in sound business decision-making.

#### **Finance**

Finance, a critical business function, offers career opportunities in many areas including corporate

finance, investments, banking, and international finance. Financial analyst, investment banker, portfolio manager, credit analyst, and international finance advisor are among several career paths in finance.

#### Finance—Real Estate

This major prepares students to be real estate brokers, representing buyers, sellers and owners in real estate transactions; corporate real estate professionals who manage properties used by a corporation in terms of purchasing, selling and leasing; property managers who net revenues by managing rental flows, tenant retention and operations.

# **Computer Information Systems (CIS)**

Nearly every industry relies heavily on information system professionals to design, develop, use, manage, and study information systems in organizations. Unlike degrees in computer science or informatics, the CIS program integrates knowledge and skills in technology, systems, and business areas.

# **Business Information Systems (BIS)**

Second major only. The BIS co-major is designed for students whose primary major is in another area, and yet who want to complement their core skill set with information systems skills and knowledge. It helps students understand how to leverage technology in their primary functional area (e.g., marketing, finance) of interest.

# Management

The management major is intended for students interested in managing organizations such as businesses, governments, hospitals, and universities. The courses teach students the broad aspects of management and organizations, and to develop skills



for handling issues such as motivation and human resource allocations in today's society.

# Entrepreneurship

Entrepreneurship targets students with interests in new entrepreneurial ventures; it also teaches the roles of entrepreneurial management inside a larger organization. It involves the study of the special skills and knowledge needed by entrepreneurs and managers of small to medium-sized firms.

#### **International Business**

Second major only. The multidisciplinary international business co-major, with its focus on mastering international business fundamentals, proficiency in foreign language, and cross-cultural skills acquired during a required overseas study experience, prepares students for the global workplace.

# Marketing

This marketing major pertains to all activities related to the marketing and distribution of goods and services, from producers to consumers. Areas of study include buyer behavior, the development of new products, pricing policies, institutions and channels of distribution (including retailing and wholesaling), advertising, professional selling, marketing research, and the management of marketing.

# **Business Process Management (BPM)**

BPM comprises enterprise technologies, decision support systems, e-business, process operations and reengineering, technology consulting, and analytical modeling. Process analysts must be capable of using current technology effectively and be knowledgeable about the integrated flow of materials and paperwork in manufacturing and service operations and the traditional business.

# Production/Operations Management

The production/operations management major provides a systematic way of looking at organizational processes using readily available and practical analytical tools, and is intended for students who are interested in managing the operations of complex, computer-integrated firms, such as manufacturing companies, multibranch banks, retail chains, international assembly plants, and distribution centers.

# **Supply Chain Management**

Supply Chain Management covers the functional business processes, starting with the procurement of raw materials and proceeding through the final

distribution of product to customers. Understanding and optimizing business processes is a cornerstone of success in the fast-changing global economy. The current proliferation in supply chain management in business is mirrored by scholars who seek to understand and educate the next generation of practitioners, business leaders and policy makers.

## **ADMISSION REQUIREMENTS**

Admission to the Kelley School is selective and requires students to do the following:

- complete English composition (with a grade of C or higher)
- complete at least three out of the following four courses: MATH-M 118 Finite Mathematics, MATH-M 119 Brief Survey of Calculus (or M 211 Calculus I), BUS-K 201 The Computer in Business (all with a grade of C or higher), and optional courses BUS-X 100 Business Administration: Introduction or BUS-G 100 Business in the Information Age. The three highest grades of these courses will be used to compute the admission GPA, which is one of the factors used when considering a student's admission.
- complete 26 credit hours of college course work that counts toward graduation
- be in academic good standing and meet the standard of the Kelley School of Business for academic good standing
- submit an application. Application deadlines are April 1 for fall semester and November 1 for spring semester. (Grades for prerequisite course work must appear on the student's university transcript by July 10 to be used for fall admission.)

The Kelley School Admissions Committee reviews each application, looking for evidence of strong and consistent academic performance at the B level or higher. The committee evaluates the following academic factors for each applicant: 1) IU grade trends and patterns, 2) cumulative GPA, 3) application semester GPA, and 4) admission course GPA. Factors such as extracurricular activities, community service, work experience, and optional letters of recommendation are also considered but are less important than academic performance factors.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students pursuing a major in the Kelley School of Business usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 Elementary Composition (or alternative; see pp. 12–13) with a grade of C or higher

#### ■ TWO MATHEMATICS COURSES

MATH-M 118 Finite Mathematics and M 119 Brief Survey of Calculus (M 211 Calculus I may be substituted for M 119 Brief Survey of Calculus) with a grade of C or higher.

Your advisor will help you finalize your choice based on your background, high school test scores and grades, and IUB Mathematical Skills Assessment Test score.

Note: Some students may need to take MATH-M 014 Basic Algebra, M 025 Precalculus Mathematics, and/or M 026 Trigonometric Functions as preparation for a higher-level course. No credit is awarded for any of these courses toward graduation.

#### **■** BUSINESS COURSES

BUS-K 201 The Computer in Business (no alternate) with a grade of C or higher

BUS-A 100 Basic Accounting Skills with a grade of C or higher

BUS-X 100 Business Administration: Introduction or BUS-G 100 Business in the Information Age is a good option for students who are exploring their interest in business (although they are not required, either course may be used as one of the course options for admission to the school).

Note: Some students take additional courses that are required for all business majors, such as ECON-E 201 Introduction to Microeconomics, BUS-A 201 Introduction to Financial Accounting (students must take A 100 Basic Accounting Skills first), BUS-A 202 Introduction to Managerial Accounting (students must take A 100 Basic Accounting Skills first), or BUS-X 201 Technology (students must take K 201 The Computer in Business first). If you are interested in doing this, consult with an advisor about whether this is a good idea for you.

#### ■ SPEECH COMMUNICATION COURSE

BUS-X 104 Business Presentations or CMCL-C 121 Public Speaking (or alternate) with a grade of C or higher

#### ■ GENERAL EDUCATION COURSES

The General Education core requirement includes a minimum of 27 credit hours and two options for fulfilling the requirement:

1. Distribution option, which includes courses across these three areas:

Arts and Humanities Social and Historical Studies (excluding economics)

Natural and Mathematical Sciences

or

 Field Specialization option, which includes courses that focus on one of the five following areas: Communication Environmental Global Studies and Languages Arts and Social Service Science and Technology

Students must also complete the International Dimension requirement, which can be fulfilled by any one of four options:

- Foreign language: 6 credits at the 200 level or above
- IU or other approved Overseas Study Program: minimum 6 credits
- International Business and Economics courses: 6 credits
- Area studies courses: 6 credits

#### **■** ELECTIVE COURSE(S)

The business major that a student chooses to pursue will determine the number of elective credit hours allowed. See your advisor.

# COURSES NORMALLY COMPLETED DURING FIRST TWO YEARS

Regardless of major, business students usually complete the courses listed below during the first two years. Each course must be completed with a grade of C or higher.

BUS-A 100 Basic Accounting Skills

BUS-A 201 Introduction to Financial Accounting

BUS-A 202 Introduction to Managerial Accounting

BUS-K 201 The Computer in Business

BUS-L 201 The Legal Environment of Business

BUS-X 201 Technology

**BUS-X 204 Business Communications** 

BUS-X 220/230 Career Perspectives

BUS-G 202 Corporate Social Strategy

BUS-X 104 Business Presentations (or equivalent)

ENG-W 131 Elementary Composition (or equivalent)

ECON-E 201 Introduction to Microeconomics

ECON-E 202 Introduction to Macroeconomics

ECON-E 370 Statistical Analysis for Business and Economics

MATH-M 118 Finite Mathematics

MATH-M 119 Brief Survey of Calculus (or M 211 Calculus I)

Please see your advisor regarding necessary prerequisites for some courses.

# School of Continuing Studies (SCS)

www.continue.indiana.edu

The School of Continuing Studies was created in 1975, reflecting the commitment of Indiana University and the state government to meeting the educational needs of adult citizens. It offers the Associate of Arts and Bachelor of General Studies degrees. Degree requirements can be completed in a variety of ways, enabling students to design a flexible program of study tailored to their interests and goals. Credits toward the degrees can be earned in courses completed at an IU campus, distance courses, independent study by correspondence, credit by examination, military service credit, and credit for prior learning.

# THE ASSOCIATE OF ARTS AND BACHELOR OF GENERAL STUDIES DEGREES

The Associate of Arts in General Studies (A.A.G.S.) and Bachelor of General Studies (B.G.S.) degrees are composed of two parts: 1) course work that must be done in broad categories called "required areas of learning," and 2) course work called "elective credit" that may be done in any school, division, or program of the university. To fulfill the requirements, students may choose from a wide variety of subject fields. In each plan of study, a student must demonstrate competency in each of the following areas: written communication, intermediate writing, oral communication, quantitative reasoning, computer literacy, and cultural diversity. There is a maximum number of credit hours allowed from a single department/school. Students should discuss with their academic advisors the appropriate ways to establish competency, e.g., specific courses, credit by examination, and self-acquired competencies.

# **ADMISSION REQUIREMENTS**

Although there are no specific courses required for admission, students must complete a School of Continuing Studies admission application. Additional information and application forms are available from Bloomington Continuing Studies, 790 E. Kirkwood Avenue, Bloomington, IN 47405-7101, (812) 855-4991 and online at www.continue.indiana.edu.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students usually complete the following courses:

#### ■ ENGLISH COMPOSITION COURSE(S)

See pp. 12–13 for options.

#### ■ QUANTITATIVE REASONING COURSE(S)

Students must demonstrate competency in quantitative reasoning through course work or exemption.

Choose from MATH-A 025, M 025, M 026, M 027, A 118, M 118 (D 116-D 117 if eligible), M 119, and M 211.

Check with your advisor for non-math courses that fulfill the quantitative reasoning requirement.

Students having earned a math SAT score of 650 or higher or a math ACT score of 29 or higher are exempt from the quantitative reasoning requirement.

Your advisor will help you finalize your choice based on your background, high school test scores and grades, and IUB Mathematical Skills Assessment Test score.

Note: Some students may need to take MATH-M 014 as preparation for a higher-level course. M 014, M 025, M 026, and M 027 do not count for graduation credit.

#### **■** COMPUTER COURSE

Choose from any computer science course or any other approved computer course. The most common choices are CSCI-A 110, BUS-K 201, EDUC-W 200, GEOG-G 237, HPER-P 200, and SPEA-V 261. See advisor for other options.

#### ■ ORAL COMMUNICATION COURSE

Students must demonstrate competency or take CMCL-C 121, C 122, THTR-T 115, or T 120. See your advisor for other options.

#### **■** GENERAL EDUCATION COURSES

Choose from:

Arts and humanities: any foreign language course or courses designated A&H by the College of Arts and Sciences. See the *Planner Course Descriptions* booklet for A&H courses.

Social and behavioral sciences: courses designated S&H by the College of Arts and Sciences. See the *Planner Course Descriptions* booklet for S&H courses.

Science and mathematics: courses designated N&M by the College of Arts and Sciences. See the *Planner Course Descriptions* booklet for N&M courses.

#### ■ ELECTIVE COURSE(S)

Choose elective courses that interest you.

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# **School of Education (EDUC)**

www.education.indiana.edu/

Indiana University has been educating teachers since 1851. The School of Education is one of America's most respected institutions for the preparation of teachers, administrators, and specialists in education. On the Bloomington campus, the school is housed in the Wendell W. Wright Education Building, a facility designed to meet the demands of the Information Age and support teaching and research with the latest instructional technology.

The School of Education offers a variety of programs that culminate in several bachelor of science degrees and certification areas:

Early Childhood Education (pre-Kindergarten and K-3)

Elementary Education (grades K-6)

Teaching All Learners: Elementary Education and Special Education (grades K–6)

Secondary Education (Senior High, Junior High, Middle School, grades 6–12; Anchor and Community of Teachers [COT]—see subject list on p. 49)

Special Education/Secondary through COT (grades 6–12)

All-Grade Education (grades K–12) in Visual Arts

*Note:* Undergraduate teacher certification is also available for selected areas through joint programs between the School of Education and other IU degree-granting units:

Health and safety education secondary program (HPER) Chinese secondary program (College of Arts and Sciences) Japanese secondary program (College of Arts and Sciences) Music all-grade education (Jacobs School of Music) Physical education all-grade education (HPER) Theatre secondary program (College of Arts and Sciences)



School of Education, Wright Education Building, Rose Avenue and Seventh Street

#### **ADMISSION REQUIREMENTS**

Students must complete prerequisite courses, obtain passing scores on the PRAXIS I, meet content, professional education and area of concentration requirements with a C or higher grade for each course, maintain a minimum 2.5 program and university GPA, and apply to be admitted to the Teacher Education Program. See advisor for details.

# FRESHMAN YEAR COURSE WORK Early Childhood Education

During the freshman year students interested in Kindergarten-Primary and Early Childhood Education usually complete the following:

■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 or W 170 See advisor for additional options.

■ ORAL EXPRESSION COURSE

CMCL-C 121, CMCL-C 122, CMCL-C 223, or EDUC-G 203

■ SCIENCE AND TECHNOLOGY COURSE(S)

EDUC-W 200 (3 credits) and EDUC-Q 200 See advisor for elective options.

■ ADDITIONAL GENERAL EDUCATION COURSES

Choose from the following requirements:

Literature (one course): AAAD-A 141, A 142; CMLT-C 145, C 146; ENG-L 141, L 142. See your advisor for other options.

**Fine Arts:** MUS-E 241. See advisor for additional options.

**Social Studies (3 credits):** HIST-H 101, H 102, H 105, H 106. See advisor for social studies elective options.

**Mathematics:** MATH-T 101, T 102, T 103. (T 101 is a prerequisite for T 102 and T 103.) See advisor for additional options.

#### ■ ELECTIVE COURSE(S)

The number of electives is very limited. Electives are not recommended for the freshman year. See your advisor.

## Elementary (K–6) and Teaching All Learners: Elementary and Special Education (K–6)

During the freshman year students interested in elementary education or special education elementary usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 or W 170 See advisor for additional options.

#### ■ ORAL EXPRESSION COURSE

CMCL-C 121 or CMCL-C 122 or EDUC-G 203 See advisor for additional options.

#### **■** MATHEMATICS COURSE(S)

MATH-T 101, EDUC-N 102 or T 102, EDUC-N 103 or T 103

T 101 is a prerequisite for N 102, T 102, N 103, or T 103.

#### ■ COMPUTER COURSE

EDUC-W 200 (3 credits) for Teaching All Learners EDUC-W 201 (1 credit) for Elementary

#### ■ ADDITIONAL GENERAL EDUCATION COURSES

Choose from the following:

**World literature (one course):** AAAD-A 141, A 142; CMLT-C 145, C 146; ENG-L 141, L 142, L 202, L 203, L 204, or L 205

Fine Arts: MUS-E 241; FINA-N 110

**United States History (one course):** HIST-H 105 or H 106 (See your advisor for other options.)

**World Civilization (one course):** HIST-H 101, H 102, H 103, H 104, GEOG-G 110, G 120

Social studies elective from any of the following (one course): African American and African Diaspora Studies (history only), Anthropology, Criminal Justice, Economics, Gender Studies, Geography (nonphysical), History, Political Science, Psychological and Brain Sciences, Religious Studies, Sociology, SPEA

**Science:** EDUC-Q 200; GEOL-G 103 or G 104 or G 105

#### Area of Concentration

Elementary education students choose an area of concentration. Your advisor will explain this requirement to you and help you choose courses if you are interested in beginning your concentration during the freshman year.

#### ■ ELECTIVE COURSES

The number of electives is very limited.

## Secondary (Middle School, Junior High, or High School) and All-Grade Education

During the freshman year students interested in secondary or all-grade education (including Special Education through COT) usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

See pp. 12–13 for information about options. ENG-W 131 or W 170 is preferred.

#### ■ ORAL EXPRESSION COURSE

CMCL-C 121 or CMCL-C 122 or EDUC-G 203

#### **■** COMPUTER COURSE

EDUC-W 201 (1 credit) for Secondary Anchor majors EDUC-W 200 (3 credits) for All Grade

(*Note:* The Community of Teachers Program does not require a computer class.)

#### ■ ADDITIONAL GENERAL EDUCATION COURSES

Choose a few courses from the following:

Remaining Arts and Humanities: Any course identified as Arts and Humanities (A&H) by the College of Arts and Sciences (6 credit hours required for degree).

Natural and Mathematical Sciences: Any course identified as Natural and Mathematical Sciences by the College of Arts and Sciences (9 credit hours required for degree).

**Social and Historical Studies:** Any course identified as Social and Historical Studies by the College of Arts and Sciences (9 credit hours required for degree).

Multicultural Studies: Any course listed as "Culture Studies" by the College of Arts and Sciences (3 credit hours required for degree). Careful selection may allow course work to be double-counted in some majors.

#### ■ MAJOR COURSE(S)

Two to four courses from the major area. See your advisor.

#### ■ ELECTIVE COURSE(S)

The number of elective credits varies with each major. See your advisor.

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## MAJORS AVAILABLE FOR SECONDARY/ ALL-GRADE EDUCATION

# **Secondary (Anchor and Community of Teachers Program)**

English/Language Arts

Journalism

Languages:

Chinese

French

German

Japanese

Japanes

Latin

Russian

Spanish

Mathematics

Science:

Chemistry

Earth-space science

Life science—biology

Physical science

Physics

Social Studies—select three subjects:

**Economics** 

Geographical perspectives

Government and citizenship

Historical perspectives

Psychology

Sociology

#### All-Grade

Visual arts

For music education, see pp. 60 and 62. For physical education teacher education, see p. 53.



# School of Health, Physical Education, and Recreation (HPER)

www.hper.indiana.edu

The school's first graduates in physical and health education received degrees in 1926. The current organizational structure was established in 1946. Throughout its history, the school has enjoyed a significant national reputation. The school is now composed of the Department of Applied Health Science; the Department of Kinesiology; the Department of Recreation, Park, and Tourism Studies; and the Division of Recreational Sports. A close relationship is also maintained with the Department of Athletics, to assure excellent preparation of athletic coaches and trainers.

# APPLIED HEALTH SCIENCE MAJORS

**Dietetics** 

Health education—secondary teacher preparation Human development and family studies Nutrition science Public health Safety science

# APPLIED HEALTH SCIENCE ADMISSION REQUIREMENTS

All majors require students to complete 26 credits before admission. The minimum overall entrance GPAs for the majors are as follows: GPA of 2.5 for dietetics, nutrition science, human development and family studies, public health, and health education—secondary teacher preparation; GPA of 2.3 for safety science.

#### FRESHMAN YEAR COURSE WORK

# Applied Health Science

During the freshman year students usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE

ENG-W 131

#### **■** MATHEMATICS COURSE

See major description below. Choose course from list. Not required for the health—secondary teacher preparation major or for the Associate of Science degree and Certificate in Safety Management.

#### ■ VERBAL COMMUNICATIONS COURSE

CMCL-C 121 (Majors in dietetics may substitute C 223; majors in nutrition science may substitute C 122 or C 223.)

#### **■** COMPUTER COURSE

Choose a course from computer course(s) listed under the individual majors below.

*Exception*: Public health and dietetics majors do not require a computer course; however, students who need computer literacy skills should take a computer course as an elective.

#### **■** GENERAL EDUCATION COURSE

See major descriptions for course recommendations.

#### ■ MAJOR COURSE(S)

See the following major descriptions for course recommendations.

#### **■** ELECTIVE COURSE(S)

See your advisor.

## **Dietetics Major**

This four-year program leads to the degree Bachelor of Science in Applied Health Science with an emphasis on the role of nutrition in health promotion and disease prevention and treatment in clinical and community settings. Students learn to apply principles of nutrition, food science, and food management in advancing health promotion. There is a 2.5 cumulative GPA entrance requirement. The curriculum meets American Dietetic Association (ADA) Didactic Program in Dietetics standards.

Recommended courses for the first year for students considering a major: CHEM-C 117 or C 103 (fall term advised), CMCL-C 121, PSY-P 101, SOC-S 100, and MATH-M 118 or MATH-A 118 (or D 116-D 117 for eligible students) or MATH M 119, HPER-N 231 (spring term advised if chemistry prerequisite met).

# Health Education—Secondary Teacher Preparation Major

This four-year program leads to a provisional teaching certificate and the degree Bachelor of Science in Applied Health Science with an emphasis in secondary health education. There is a 2.5 cumulative GPA entrance requirement.

Recommended courses for the first year for students considering a major: HPER-H 160, HPER-H 205, HPER-H 263, HPER-F 255, HPER-H 174, EDUC-W 201 (1 cr.), EDUC-G 203, any SOC course, a humanities course. (See advisor.)

# Human Development and Family Studies Major

This four-year program leads to the degree Bachelor of Science in Applied Health Science with an emphasis in the study of the growth and development of human beings throughout the life span, including how family members interact and the roles they assume. There is a 2.5 cumulative GPA entrance requirement.

Recommended courses for the first year for students considering a major: HPER-F 150, HPER-F 255, HPER-F 258, BIOL-L 104, MATH-M 118 (*or* D 116-D 117 if eligible) *or* M 119, PSY-P 101, PSY-P 102, SOC-S 100, one computer course from HPER-P 200, HPER-R 237, CSCI-A 110, BUS-K 201, EDUC-W 200, a humanities or social and behavioral science course. (See p. 55.)

## **Nutrition Science Major**

This four-year program leads to the degree Bachelor of Science in Applied Health Science with an integration of the basic and applied principles of nutrition and related sciences. The curriculum can serve as a route toward medical or dental school. There is a 2.5 cumulative GPA entrance requirement.

Recommended courses for the first year for students considering a major: CHEM-C 117 or C 103 (fall term advised), CMCL-C 121 or C 122, MATH-M 119 or M 211, PSY-P 101, CSCI-A 110, a social and behavioral science course (see p. 55), HPER-N 231 (spring term advised if chemistry prerequisite met).

# Public Health Major

This four-year program leads to the degree Bachelor of Science in Applied Health Science with emphasis in promoting the health of the general public. With this background, students can learn to direct and implement programs in community, occupational, and clinical settings. The curriculum can serve as a route to medical or dental school. There is a 2.5 cumulative GPA entrance requirement.

Recommended courses for the first year for students considering a major: HPER-H 263, BIOL-L 100, L 104, or L 112, CHEM-C 101, C 103, or C 117, one math course from MATH-M 118 or MATH-A 118 (or D 116-D 117 if eligible) or M 119. Students may also choose courses from anthropology, economics, human geography, history, political science, psychology, sociology, or health electives.

# **Safety Science Major**

This four-year program leads to the degree Bachelor of Science in Applied Health Science with an emphasis in safety science. Focus includes courses in safety, industrial hygiene, and program management. There is a 2.3 cumulative GPA entrance requirement.

Recommended courses for the first year for students considering a major: HPER-S 101, HPER-S 151, CHEM-C 101/C 121 (fall term advised), one math course from MATH-M 118 (or D 116-D 117 if eligible) or

M 119, PSY-P 101, one computer course from HPER-P 200, HPER-R 237, CSCI-A 110, BUS-K 201, EDUC-W 200 (K 201 recommended for students who want a business minor), a social and behavioral science course. (See p. 55.)

## **Safety Management Programs**

CERTIFICATE IN SAFETY MANAGEMENT This one-year certificate is designed for students interested in safety and hazard control in business and industry. Students may earn this certificate while completing another major at IU or independently.

See your advisor for course recommendations.

# ASSOCIATE OF SCIENCE DEGREE IN SAFETY MANAGEMENT

This two-year program to prepare entry-level specialists builds on the one-year certificate program and provides a professional background for students interested in pursuing a baccalaureate degree in safety.

Recommended courses for the first year: HPER-S 101, HPER-S 151, CHEM-C 101-C 121 or C 103 or C 117, PSY-P 101.

## KINESIOLOGY MAJORS

Athletic training—teaching and nonteaching Dance

Exercise science

Fitness specialist

Physical education teacher education (PETE) Sport communication—broadcast and print Sport marketing and management

See your advisor for information about the following kinesiology minors and the Martial Arts Certificate Program: aquatics, dance, coaching, exercise science, fitness, kinesiology, and sport marketing and management.

# KINESIOLOGY ADMISSION REQUIREMENTS

See below for the entrance GPA and course requirements for entrance to majors.

#### FRESHMAN YEAR COURSE WORK

# Kinesiology

**■ ENGLISH COMPOSITION COURSE** 

ENG-W 131 or W 170

■ VERBAL COMMUNICATIONS COURSE

CMCL-C 121 (Sport communication majors may substitute C 122. Both C 121 and C 122 are required for sport marketing and management majors.)

#### ■ MATHEMATICS COURSE

See each major description for course recommendations.

#### **■** COMPUTER COURSE

See each major description for recommendations.

#### ■ GENERAL EDUCATION

See each major description for course recommendations.

#### **■** MAJOR COURSES

See each major description for course recommendations.

#### **■** ELECTIVE COURSES

See your advisor.

## **Athletic Training Major**

The four- and five-year programs lead to the Bachelor of Science in Kinesiology with a major in athletic training. The five-year program incorporates a teaching degree in physical education combined with the athletic training major. The athletic training curriculum prepares the student to sit for the National Athletic Trainers' Association Board of Certification (NATABOC) examination. Additionally, the program is accredited by the Commission on Accreditation of Allied Health Education Programs (CAAHEP).

The number of admissions to the professional athletic training program is necessarily limited to the number of practicum spaces available. A student desiring entrance into the program is eligible for consideration under the following conditions:

- 1. Formal application by April 1 including a) three letters of recommendation; b) biographical sketch; c) completion of Athletic Training Application (available in HPER 115); and d) current transcripts (transfer students only; e) completion of Technical Standards for Admission to the Athletic Training Program form. See Technical Standards for Admission form at www.indiana.edu./~kines/ under\_training.html; f) completion of Athletic Training Observation Experience–Hour Verification and Basic Athletic Training Proficiency Skills. See Observation Experience Forms A and B at www.indiana.edu./~kines/under\_training.html; g) completion of limited criminal history background check from state police (in state of permanent residence). A small fee may be associated with this as determined by state police policies.
- 2. Interview with the Athletic Training Admissions Committee.
- 3. Completion of HPER-H 160 and P 280 with a B or higher.

- 4. Completion of ANAT-A 215 with a C or higher.
- 5. Minimum university CGPA of 2.50 or higher.

The five-year program requires admission to the Physical Education Teacher Education Program (PETE). See description of that program (p. 53) for PETE admission requirements.

Admission to the undergraduate Athletic Training Program is determined by the following criteria: overall GPA and grade in the three required courses (35 percent), letters of recommendation (20 percent) and interview (45 percent). A selection committee that includes at least one NATABOC-certified member determines admission to the program. Students satisfying the conditions stated above are not guaranteed positions in the program.

*Note*: All major core and professional education courses must be completed with a minimum full C grade.

Teaching option—recommended courses for the first year for students considering a major: HPER-H 160, HPER-P 140-P 141, HPER-P 200, HPER-P 219, HPER-P 224, HPER-P 280, ANAT-A 215, PSY-P 101, courses chosen from humanities or social and behavioral sciences.

Nonteaching option—recommended courses for the first year for students considering a major: HPER-H 160, HPER-P 212, HPER-P 219, HPER-P 224, HPER-P 280, CHEM-C 101-C 121, SOC-S 100, ANAT-A 215, a computer course (HPER-P 200 or CSCI-A 110 or BUS-K 201), a humanities or social and behavioral sciences course. (See p. 55.)

# **Dance Major**

The four-year dance curriculum combines a rigorous general-education component with technical training and professional experience. An application and audition are required for admission to the major in dance at Indiana University. The application packet may be obtained from the Department of Kinesiology, HPER 115, 1025 E. Seventh Street, Bloomington, IN 47405, Phone: (812) 855-6172, or apply online: www.indiana.edu/~kines/undergraduate/dance.shtml. *Note:* All students must officially apply and be accepted to Indiana University Bloomington before being admitted to the Department of Kinesiology dance major. Students may audition for the major before official admission to IU. Students who pass the audition process and are admitted to Indiana University Bloomington must complete 26 credit hours with a minimum grade point average of 2.0 in order to be officially accepted into the dance major.

Recommended courses for the first year for students considering the major: CMCL-C 121, ENG-W 131, HPER-D 111, HPER-D 121, HPER-E 155 *or* E 255, MATH-M 118 *or* M 119, PSY-P 101, SOC-S 100 *or* S 101.

## **Exercise Science Major**

This four-year program leads to the Bachelor of Science in Kinesiology. Students may enter the major after completing 26 credit hours with a 2.5 or higher cumulative grade point average.

The exercise science major is for students interested in pursuing a graduate degree in some area related to human movement or exercise science. It offers students excellent preparation for graduate work in adapted physical education, biomechanics, ergonomics, exercise physiology, motor control, and sports medicine. In addition, the exercise science curriculum allows for preparation for professional education in chiropractic, dentistry, medicine, physical and occupational therapy, optometry, osteopathy, podiatry, and in physician's assistant programs and other health fields.

Recommended courses for the first year for students considering a major: HPER-E 119, HPER-P 212, HPER-P 280, CHEM-C 101-C 121 or C 117, MATH-M 118 and M 119, ANAT-A 215 or HPER-P 205, ANTH-A 105 or E 105, PSY-P 101, SOC-S 100 or S 101; one computer course from CSCI-A 110, HPER-P 200, BUS-K 201.

# **Fitness Specialist Major**

The fitness specialist major prepares students for entry-level employment with corporate and community fitness programs, health clubs, YMCAs, and similar fitness-related organizations. This major helps students prepare to complete various fitness certifications including the American College of Sports Medicine (ACSM) Health Fitness Instructor (HFI) Certification Exam.

This four-year program leads to the Bachelor of Science in Kinesiology. Students may enter the major after completing 26 credit hours with a 2.5 or higher cumulative grade point average.

Recommended courses for the first year for students considering a major: HPER-P 105, P 205, P 212, P 216, P 280, T 142, CHEM-C 101-C 121 or C 117, MATH-M 118 or M 119, PSY-P 101, SOC-S 100 or SOC-S 101; one computer course from CSCI-A 110, HPER-P 200, BUS-K 201.

# Physical Education Teacher Education (PETE) Major

This four-year program leads to a provisional teaching certificate and the Bachelor of Science in Kinesiology. Certification is for grades K–12. Students seeking an undergraduate degree in Physical Education Teacher Education (All-Grade Teaching License) must be admitted to both the Department of Kinesiology Physical Education Teacher Education program and to the School of Education Teacher Education Program.

Usually, students apply for admission to the PETE program during the spring of the freshman year and to the School of Education Teacher Education Program before the end of the sophomore year.

Students seeking admission to the Physical Education Teacher Education (PETE) Program in the Department of Kinesiology are eligible for consideration under the following conditions:

- 1. Completion of 26 credit hours of college course work that counts toward graduation.
- 2. Cumulative GPA of 2.5 or higher at the time of application.
- 3. Completion of the following prerequisite courses with a minimum grade of C (2.0) in each course:
  - a. HPER-P 140 Foundations of Physical Education
  - b. HPER-P 141 Fundamentals of Human Movement
- 4. Formal application to the program, including:
  - a. Submission of a completed application form to the dean's office by March 1 for summer/fall admission and by November 1 for spring admission
  - b. Successful completion of HPER-P 140 and P 141
  - c. Three letters of recommendation
  - d. Personal interview

*Note*: All major core and professional education courses must be completed with a minimum full C grade.

Recommended courses for students considering a major: HPER-P 140-P 141, HPER-P 200, HPER-P 205, HPER-P 216, HPER-P 219, HPER-P 280, MATH-M 118 (or option). You may also choose humanities and social and behavioral science courses. (See advisor.)

# **Sport Communication Major**

Students may complete a four-year program with either a broadcast or a print emphasis in conjunction with the Department of Telecommunications or the School of Journalism, respectively.

A minimum of 26 credit hours and a cumulative entrance grade point average of 2.5 are required for admission to the Sport Communication—Broadcast and Print emphases. For the print emphasis, application to the School of Journalism should be completed during the freshman year in order to be eligible to register for advanced journalism courses.

Recommended courses for students considering a major: HPER-P 212, P 213, P 280 or H 160, MATH-M 118 (D 116-D 117 if eligible) or M 119, SOC-S 100 or S 101, PSY-P 101, humanities courses, one social and behavioral science course, a computer course (CSCI-A 110 or HPER-P 200), JOUR-J 110 (print emphasis) or TEL-T 101 (broadcast emphasis). See your advisor for other options. Students seeking the print emphasis need to complete one semester of foreign language (or establish proficiency) and complete all journalism admission prerequisite courses.

# Sport Marketing and Management Major

This four-year interdisciplinary program focuses on interest in marketing and management as applied to the sport enterprise and leads to the degree Bachelor of Science in Kinesiology. Admission is competitive, and the number of admissions to the sport marketing and management program is limited. Between 40 and 60 students per year will be accepted.

Students seeking admission are eligible for consideration under the following conditions:

- Completion of 40 credit hours of college course work that counts toward graduation. This course work may be completed at Indiana University or at another accredited institution offering comparable course work. Generally, students apply mid-sophomore year.
- Successful completion of the following five prerequisite courses:
   BUS-A 201 or A 202 (P: A 100)<sup>1</sup>
   BUS-L 201 (P: Sophomore standing)
   ECON-E 201 or E 202
   HPER-P 211
   MATH-M 118 (or both D 116-D 117) or M 119

For purposes of admission, the *average* of the grades earned in the prerequisite courses will be used to compute the GPA. For repeated courses, the highest grade will be used in the computation of the prerequisite average GPA.

- 3. Submission of an application by the required deadline. Undergraduates are admitted to the Sport Marketing and Management Program *twice* each year. The application deadline for admission is December 1 for spring semester and May 1 for fall semester admission. Students will be notified of admission status no later than February 15 and June 1. Grades for all prerequisite course work must be on the student's university transcript by the end of fall or spring semester. Applications are available at the School of Health, Physical Education, and Recreation, Records Office, Room 115.
- 4. Participation in the Sport Marketing and Management Orientation Program. After receiving an offer of admission, students are required to attend an orientation program at a time specified in the offer. Failure to attend this orientation program may cause the offer of admission to be withdrawn.

Applications are reviewed on an individual basis. Admission will be based upon the applicant's GPA (both prerequisite course and cumulative GPA), but other factors will be considered, such as trend in

<sup>1</sup> Transfer students who transfer both BUS-A 201 and 202 do not need to take the IU prerequisite, BUS-A 100.

grades, experience in sport activities, sport-related work or volunteer experience, and other relevant skills and experiences.

Recommended courses for students considering the major: HPER-P 211, HPER-P 212, HPER-P 392, MATH-M 118 or M 119, PSY-P 101, SOC-S 100 or alternate, BUS-A 100, BUS-A 201 (P: A 100), humanities course, social and behavioral science course. (See p. 56.) ECON-E 201 is taken by some students in the freshman year. See your advisor for other suggested course work.

## **RECREATION MAJORS**

Outdoor recreation and resource management Park and recreation management Recreational sport management Therapeutic recreation Tourism management

See your advisor for information about recreation minors and the Underwater Resource Management Certificate Program.

## RECREATION ADMISSION REQUIREMENTS

Applicants to the department are eligible for consideration under the following conditions:

- 1. All applicants must have successfully completed at least 26 credit hours of college work.
- 2. A minimum cumulative GPA of 2.0 for students majoring in Park and Recreation Management, Recreational Sport Management, and Tourism Management. A minimum cumulative GPA of 2.3 for students majoring in Outdoor Recreation and Resource Management and Therapeutic Recreation.

# FRESHMAN YEAR COURSE WORK Recreation Majors

During the freshman year students usually complete the following:

■ ENGLISH COMPOSITION COURSE

**ENG-W 131** 

■ VERBAL COMMUNICATION COURSE

CMCL-C 121 or C 122

**■** MATHEMATICS COURSE

Your advisor will help you decide whether you need a mathematics course in order to prepare for the statistics course you will take later.

■ ADDITIONAL GENERAL EDUCATION COURSES

**Social and behavioral sciences:** SOC-S 100, PSY-P 101, PSY-P 102 (*P: P 101*), and possibly courses from history or political science.

**Humanities:** One course (See below.)

**Life and physical sciences (5 credit hours)** (See below.)

**■** MAJOR COURSE

HPER-R 160

**■** ELECTIVE COURSE(S)

Electives vary by program. See your advisor.

# **RECREATION MAJORS**

# Outdoor Recreation and Resource Management Major

The focus of the outdoor recreation and resource management major is to educate the student about outdoor recreation resources and their users, as well as to provide knowledge and skills required for the profession. Topical areas covered include outdoor recreation, environmental ethics, interpretive techniques, outdoor adventure education, outdoor leadership, nature study, recreational resource management, and organized camping.

Competencies are developed for career positions such as park naturalist, outdoor education coordinator, outdoor program developer, camp program planner, and adventure leader.

# Park and Recreation Management Major

The park and recreation management option prepares students for management, supervisory, and leadership positions in park and recreation programs operating at the private, commercial, municipal, county, regional, state, and federal levels. Typical job responsibilities include management of fees and other finances, hiring of personnel, long-range planning, promotion, and operation of park and recreation facilities.

# **Recreational Sport Management Major**

The recreational sport management option prepares students to assume direct leadership, supervision, and management positions in participatory sports. The focus is on the management of people and resources in the recreational sport rather than the athletic sport context. Graduates with this option assume sport specialist positions in city recreation and park agencies, business and industrial corporations, YMCAs, colleges and universities, sport and fitness centers, the armed forces, youth-serving agencies, and other facilities.

# Therapeutic Recreation Major

Therapeutic recreation is an allied health profession concerned with the treatment of disabling conditions as well as the promotion of health and the facilitation of an optimal quality of life. It uses recreation and leisure experiences as means of intervention with persons of all ages who experience emotional, mental, or physical problems. Completion of the program enables graduates to be eligible to sit for the certification examination of the National Council for Therapeutic Recreation Certification.

# **Tourism Management Major**

The tourism management option prepares students to enter one of the world's most diverse and largest industries. Tourism is the business of attracting and catering to the needs and expectations of visitors. Although the tourism industry includes transportation, travel brokers, and food and housing, students in this program focus on the marketing and management of tourist attractions and destinations. These include government tourism divisions, resort areas, convention centers, theme parks, visitor centers, and conference hotels.

## HUMANITIES, SOCIAL AND BEHAVIORAL SCIENCES, AND LIFE AND PHYSICAL SCIENCES

All HPER majors whose general education requirements allow course work from humanities, social and behavioral science, or life and physical sciences may select courses from the following schools, departments, or programs:

Humanities: African American and African Diaspora Studies, American Sign Language, Central Eurasian Studies, Classical Studies, College of Arts and Sciences Topics E 103 courses (credit allowed for only one topic), Communication and Culture, Comparative Literature, East Asian Languages and Cultures, English, Fine Arts, Folklore, French and Italian, Germanic Studies, HPER—R 160 only, India Studies, Jewish Studies, Journalism, Linguistics, Music (no applied courses), Near Eastern Languages and Cultures, Philosophy, Religious Studies, Slavic Languages and Literatures, Spanish and Portuguese, Telecommunications, Theatre and Drama

**Social and Behavioral Sciences:** Anthropology, College of Arts and Sciences Topics E 104 courses (credit allowed for only one topic), Criminal Justice, Economics, Geography (human and regional), History, Political Science, Psychological and Brain Sciences, Sociology

Life and Physical Sciences: Anatomy and Physiology, Astronomy, Biology, Chemistry, College of Arts and Sciences Topics E 105 courses (credit allowed for only one topic), Computer Science, Geography (physical), Geological Sciences, Mathematics, Physics

Also allowed in "Life and Physical Sciences": HPER-H 263 Personal Health, HPER-P 391 Biomechanics, HPER-P 409 Basic Physiology of Exercise, MATH-J 113 Introduction to College Mathematics III.

# **School of Informatics (INFO)**

www.informatics.indiana.edu

The School of Informatics is Indiana University's newest school and among the first in the nation to combine the technical and human aspects of information technology. The school offers two undergraduate majors, one in computer science and the other in informatics. The computer science major gives students deep knowledge of the core technologies underpinning the "IT revolution." The informatics major gives students a more general education in those technologies together with the knowledge of a specific subject area chosen by the student. Both majors give students the concepts and skills they need to fill the continuing need for IT professionals. The School of Informatics has a highly successful Career Center to help students find jobs and internships.

# ADMISSION REQUIREMENTS

To be considered for admission, students must declare an intended major in informatics or the computer science B.S. major and pass 26 credit hours of course work with a minimum cumulative GPA of 2.0. The 26 credit hours must include ENG-W 131 Elementary Composition or equivalent (with a minimum grade of C) or exemption from the English composition requirement. Students seeking admission to the Informatics B.S. degree program must in addition complete MATH-M 118 Finite Mathematics or equivalent (with a minimum grade of C); and INFO-I 101 Introduction to Informatics (with a minimum grade of C).

# BACHELOR OF SCIENCE IN INFORMATICS

The Informatics major blends technical knowledge with traditional areas of study. Majors not only gain a general knowledge of fundamental notions involving information and computation, but they also learn how digital technologies relate to their chosen area of interest. All Informatics majors choose an area of special focus, called the cognate area. There are many cognate areas to choose from including biology, business, chemistry, fine arts, telecommunications, and many more. The cognate allows majors to follow their own personal interests while developing a strong set of technology skills. The students also study the human, social, and organizational issues surrounding technology. As seniors, informatics majors fulfill a capstone requirement, usually by working in teams on real projects for real clients.

The student majoring in informatics is required to take 33 credit hours of informatics core courses, 6 credit hours of informatics electives, and 15-21 credit hours in

an informatics-related subject area, referred to as a cognate area. Students must complete specific general education requirements and successfully complete a senior capstone project.

### FRESHMAN YEAR COURSE WORK

During the freshman year, students who are pursuing an informatics major usually take the following courses:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 (or alternative; see pp. 12–13) with a grade of C or higher

#### ■ MATHEMATICS COURSE

MATH-M 118, MATH-D 116-MATH-D 117, MATH-A 118, or MATH-S 118 with a grade of C or higher. Some students may need to take MATH-M 014 or MATH-X 018 as preparation for their mathematics course. No credit toward graduation is awarded for MATH-M 014 or MATH-X 018.

#### ■ Speech Communication Course

CMCL-C 121, or approved substitute, with a grade of C– or higher.

#### **■** GENERAL EDUCATION COURSES

Choose arts and humanities, social and historical studies, or natural science courses. See the *Planner Course Descriptions* booklet for courses designated A&H or S&H. See the School of Informatics Bulletin for a list of natural science courses.

#### ■ MAJOR COURSES

INFO-I 101 Introduction to Informatics INFO-I 202 (P: I 101) Social Informatics INFO-I 210 Information Infrastructure (P or concurrent: I 101, recommended for students with a strong computing background)

#### ■ COGNATE AREA COURSE(S)

Students generally wait until after the freshman year to determine the cognate area. If you have chosen an area already, discuss this with your advisor.

#### ■ GENERAL ELECTIVE COURSE(S)

Students should take no more than two elective courses in their freshman year.

# **Cognate Areas**

Sometime during the sophomore year, majors usually choose a cognate area to reflect a special area of interest. Students should plan to take most cognate area courses in the junior and senior year. For up-to-date information about available cognate areas, please consult the Web (www.informatics.indiana.edu/academics/cognates.asp) or speak to the Informatics advisor.

SCHOOL OF INFORMATICS 57

# **Capstone Experience**

In their senior year, all informatics majors participate in a "capstone experience," where they complete a hands-on project in the design and development of an information system. Examples of capstone projects include the design and development of a database, Web site, or simulated environment ("virtual reality"). For detailed examples see informatics.indiana.edu/capstone/. The capstone requirement may also be fulfilled by performing an approved project-oriented internship that provides experiences similar to the capstone course.

# BACHELOR OF SCIENCE IN COMPUTER SCIENCE

Computer science forms the conceptual foundation of the information revolution and spans a broad spectrum of fields, ranging from mathematical foundations to user applications. A high level of computer literacy is an essential component of any well-rounded education and is increasingly an indispensable part of all professional careers. Because computer science and its uses and the economy are so diverse, majoring in the field can also be usefully combined with very different skills—technical, conceptual, and social.

The department offers many options to suit a variety of needs. The nonmajor courses, labeled "A," include introductory courses. Five of these courses combine to form the minor in information technology. A 110, A 111, and A 201 are the starting points for students with no prior computing experience. For those with basic computer literacy (the material covered in A 110 or A 111), A 112 provides a simple introduction to programming, A 113 covers data analysis, A 114 consists of database design, and A 216 is an in-depth look at mixed media hardware and software.

For students interested in computer science who would like a broad introduction to the most exciting concepts in the field, the school offers CSCI-C 102 Great Ideas in Computing. For students interested in pursuing a B.S. in computer science (a B.A. is offered through the College of Arts and Sciences), a suite of six courses, labeled "C," form the core of the computer science major programs. In addition to those six core courses, students earning a B.S. in computer science must complete seven advanced computer science elective courses. The school offers a strong honors variant of the B.S., which includes honors

versions of all of the core courses. The department also offers a professional master's degree, which is a program of study leading to both a B.S. and a master's degree in computer science in five years of study.

The starting point for all major programs is CSCI-C 211 followed by CSCI-C 212, or their honors versions. First year students interested in majoring in computer science should take MATH-M 211, or the preparatory course, MATH-M 027, at the same time they take either CSCI-C 102 or CSCI-C 211.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students who are pursuing a Computer Science B.S. degree usually take the following courses:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 (or alternative; see pp. 12–13) with a grade of C or higher

#### ■ MATHEMATICS COURSE(S)

MATH-M 211 and M 212 (some students may need to take the preparatory course M 027 before M 211). See your advisor.

#### ■ INTERNATIONAL DIMENSION COURSE(S)

If you wish to study foreign language and plan to continue a language you have studied in high school, the level will be determined by placement exam. Your advisor will help you interpret your score. See your advisor for other options if you do not want to use foreign language to fulfill the international dimension requirement.

#### ■ GENERAL EDUCATION COURSES

Choose from courses designated arts and humanities (A&H) or social and historical studies (S&H) in the *Planner Course Descriptions* booklet, or natural science courses (see advisor).

#### ■ MAJOR COURSES

CSCI-C 211 and CSCI-C 212 (take CSCI-C 102 before C 211 if needed). See advisor.

#### ■ ELECTIVE(S)

No more than two electives should be taken in the freshman year.

# School of Journalism (JOUR)

www.journalism.indiana.edu

As you prepare for orientation, visit the Web site (www.journalism.indiana.edu) and select "Academics," then "Undergraduate Advising." On the bottom of that page, see "Fall 2007 Freshman Course Selection Guidelines" for a list of courses that meet requirements.

Indiana University was one of the first state universities to teach journalism, beginning in 1893. A department was established in 1911 and the School of Journalism in 1974. The mission of the baccalaureate program is to help students explore the institutions, procedures, professional skills, and audiences of journalism and mass communication. The school is committed to liberal education in the arts and sciences as well as to professional training in the skills of journalism and mass communication. The school believes that both breadth and depth of learning must characterize the undergraduate experience.

# BACHELOR OF ARTS IN JOURNALISM (B.A.J.)

In almost every journalism class, students are taught a combination of knowledge, skills, values, and ethics. The goals of the curriculum are:

- to develop skills in thinking and judgment, in gathering, organizing, and presenting information in words, images, and numbers on paper, on the air, and online;
- to graduate students with both visual and verbal literacy and the flexibility to respond to changing media environments; and
- to promote the professional values of truth, accuracy, and fairness.

Exploration of multiple media skills is a key goal of core courses J 200 and J 210. In sophomore, junior, and senior years, students take classes from a wide selection of specialized journalism electives, from areas such as advertising, broadcast news, graphic and online communication, magazines, newspapers, photojournalism, public relations, and journalism education.

Graduates begin with jobs as copywriters, reporters, advertising and public relations account managers, editors, and Web and graphic designers. Some go on to careers as TV news anchors, attorneys, publishers, and upper-level managers in business. Alumni have been associated with media such as CNN, Seventeen, the Chicago Tribune, The Miami Herald, The Washington Post, and National Geographic.

The online newsletter, *Career Matters*, contains information on internships and jobs. In addition, all students should subscribe to iujournalismcareers.com.

#### **ADMISSION REQUIREMENTS**

To be considered for admission, students must pass 26 credit hours with at least a 2.20 cumulative GPA. The 26 credits must include one from the following three journalism courses (J 110, J 200, J 210) with a grade of C or higher; English composition (C or higher), fundamental mathematics (C- or higher; see below), and one semester of a foreign language. The School of Journalism requires that you complete an application for admission. Applications are reviewed May 15, August 20, and December 15.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students who are pursuing a journalism major usually complete the following:

■ ENGLISH COMPOSITION COURSE(S)

See pp. 12–13 for options.

#### **■** MATHEMATICS COURSE

Choose from MATH-A 025,\* M 025,\* M 027,\* M 118/ S 118 (D 116-D 117 if eligible), A 118, M 119, M 211

Students earning math test scores at or above 650 on the SAT exam or at or above 29 on the ACT exam are exempt from the fundamental skills math requirement.

Any of the above courses may be used to fulfill the fundamental skills math requirement. Your advisor will help you finalize your choice based on your major, your background, high school test scores and grades, and your IUB Mathematical Skills Assessment Test score.

Some students may need to take MATH-M 014 (or X 018) as preparation for the fundamental skills math course. No credit toward graduation is awarded for either of these two courses.

\*Note: A 025, M 025, and M 027 may be used to fulfill the fundamental skills math requirement, but no credit toward graduation is awarded for any of these courses.

#### ■ FOREIGN LANGUAGE COURSE(S)

If you previously studied the language, the level will be determined by placement exam. Your advisor will help you interpret your score. See the *Planner Course Descriptions* booklet for list of foreign language areas.

*Note:* Study of a foreign language is required through the fourth term of college-level course for the B.A.J. degree.

#### ■ GENERAL EDUCATION DISTRIBUTION COURSES

Choose from:

- United States history (HIST-H 105 or H 106; see your advisor for other options)
- American political science (POLS-Y 100 or Y 103; see your advisor for other options)
- Literature or history of art
- Other arts and humanities (A&H)
- Social and historical studies (S&H)
- Natural and mathematical sciences (N&M)
- Culture studies (see your advisor for lists)

See the *Planner Course Descriptions* booklet for distribution designation of arts and humanities (A&H), social and historical studies (S&H), and natural and mathematical sciences (N&M) courses.

Visit our Web site (www.journalism.indiana.edu) and select "Academics," then "Undergraduate Advising" for a list of these courses.

#### ■ MAJOR COURSE

JOUR-J 110, J 155, J 200, J 210

#### **■ SECOND CONCENTRATION**

Choose one or two courses if you have chosen an area. Some students wait until after the freshman year to determine the second concentration.

The second concentration is required in addition to the journalism major. Students are required to study in another subject, earning 24 credit hours, or about eight courses, in a College of Arts and Sciences department or another school at IUB.

Telecommunications cannot be used for this second concentration. If you know what subject you want for this requirement, you may begin courses your freshman year. See your advisor for further explanation.

#### **■** ELECTIVE COURSE(S)

The School of Journalism allows a limited number of electives in your program and recommends that you limit electives taken during the freshman year. If you plan to take electives, you may want to consider some 1 or 2 credit hour courses to help "round out" your schedule.

# **Division of Labor Studies**

www.labor.iu.edu

The Division of Labor Studies is being reorganized. Consult with your advisor.



Students develop computer skills.

# **Jacobs School of Music (MUS)**

www.music.indiana.edu

The Jacobs School of Music is one of the leading institutions of its kind. Performance majors have the unique opportunity to combine a high-quality conservatory experience with a college education. Students in all majors have access to an outstanding faculty and a wide choice of majors related to the field of music. The mission of the Jacobs School of Music is to provide distinguished instruction and outstanding opportunities for performance, research, and teacher training for music majors and non–music majors.

## **MAJORS**

The Jacobs School of Music offers majors in performance (historical or modern instrument or voice), composition, and jazz studies leading to the Bachelor of Music (B.M.) degree. It also offers a Bachelor of Music Education (B.M.E.) degree. For this degree, you can be a choral, general, or instrumental major. You can then be certified to teach band, orchestra, chorus, or general music in public schools. Bachelor of Science (B.S.) degrees are offered in ballet, recording arts, and music with an outside field. This last option provides an opportunity to study music plus another field at the major level (27 credit hours). Associate degrees are offered in recording arts and string instrument technology.

# ADMISSION TO THE SCHOOL OF MUSIC

Most music majors pursuing B.S., B.M., and B.M.E. degrees are accepted directly into the Jacobs School of Music, not the University Division. This admission follows formal application to the school, a successful audition in a performance area, and completion of orientation and first-semester registration. Students should refer to the Music Undergraduate Office for all academic matters.

Exceptions to this type of admission include students pursuing the string instrument technology degree.

Some students apply for admission and are accepted to the B.S., B.M., B.M.E., or the A.S. (Recording Arts) while in University Division. Refer to the section with information for students *not accepted* into the School of Music on p. 62.

# INFORMATION FOR STUDENTS ACCEPTED INTO THE JACOBS SCHOOL OF MUSIC

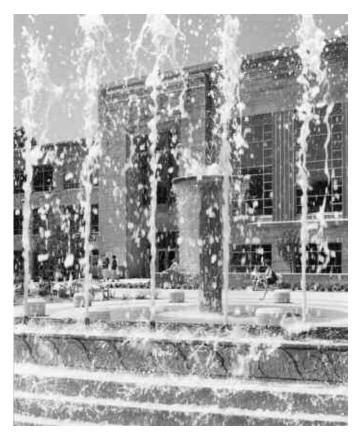
Students accepted into the Jacobs School of Music meet with advisors on a special day during the regular advising and registration program in the summer, or

during the week preceding the beginning of classes in the fall or spring term.

During the music orientation, students will have a required informational meeting with the Music Undergraduate Studies advisor, followed by individual advising appointments. Students will take required music placement tests in music theory and secondary piano and also have the opportunity to take university placement tests in mathematics, foreign languages, and other subjects in which they seek to earn advanced placement and credit. During the summer advising and registration program these examinations are given on the day before advising and registration.

Students interested in earning advanced credit in music theory may do so in a series of examinations given only Thursday and Friday before the first week of classes of the fall and spring terms. Schedules for these examinations are posted outside the Music Theory Office (Simon 225) or online at theory.music.indiana.edu.

Credits in music theory earned through the Advanced Placement Program or transferred from other universities must be validated by examinations before they can be used to meet degree requirements.



Music Library, North Jordan Avenue

# FRESHMAN YEAR COURSE WORK FOR ACCEPTED MUSIC MAJORS

Accepted music majors usually complete courses from the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 170 (3 cr.) recommended; ENG-W 131 (3 cr.) or other option acceptable. Exemption: see pp. 12–13.

#### **■ FOREIGN LANGUAGE**

All music majors except B.M.E. and A.S. students are required to complete two terms (or one term of accelerated study) in a foreign language. Voice students must complete two terms each of French, German, and Italian. This requirement may also be met through an exemption/credit exam or AP credit.

#### **■** ENSEMBLE

All music majors must enroll in ensemble each semester. Ensembles meet for one or two periods daily between 2:30 p.m. and 6:00 p.m. Assignments will be posted during the first week of classes. All instrumental ensembles are X 040 (2 cr.); all choral ensembles (for voice, piano, and guitar students) are X 070 (2 cr.); ballet is X 030 (2 cr.); early music is X 060 (2 cr.).

#### ■ PERFORMANCE STUDY

All music majors except those in ballet, recording arts, and A.S. degrees should enroll for performance (private applied music lessons). Credit hours of performance study depend on your degree: B.M.—performance—6 cr.; B.M.E., B.S., B.M.—composition—2 cr.; B.M.—voice or B.M.—jazz—3 cr.

#### ■ MUSIC THEORY

If you have passed the Basic Musicianship Test (BMT) (70 percent), enroll in T 151. If you did not pass the test, but achieved a score between 50 and 68, register for both T 109 and T 151. If you had a score below 50, take T 109 only.

#### ■ SECONDARY PIANO

All students except those whose primary instrument is piano, guitar, organ, or harp, or whose majors are in early music or B.S. programs must take class piano until the keyboard proficiency is passed.

#### ■ GENERAL EDUCATION

Choose from courses designated N&M, S&H, or A&H in the *Planner Course Descriptions* booklet.

B.S. with an Outside Field: If you would like to explore some possible areas for your outside field, you can do this through your general education courses

# ■ MUSIC EDUCATION COURSE (FOR B.M.E. STUDENTS ONLY)

You may enroll in MUS-E 131 Introduction to Music Education (2 cr.). Consult your advisor regarding appropriate courses.

# POSSIBLE FIRST-TERM PLANS FOR ACCEPTED MUSIC MAJORS

#### B.M.—PERFORMANCE—INSTRUMENT OR VOICE

Instrumental ensemble MUS-X 040 (2 cr.) *or* Choral ensemble MUS-X 070 (2 cr.)

Performance lessons, instrumental (6 cr.), *or* voice (3 cr.) Music theory (3-6 cr.)

Class piano MUS-P 111 (2 cr.)—except guitar, organ, harp, piano, and early music majors

English composition (3 cr.)

Foreign language or additional general education course if space permits

TOTAL 16-19 cr.

#### **COMPOSITION**

B.M. composition students take only 2 credit hours of performance lessons and should take MUS-K 400 Composition Lessons and K 133 Notation and Calligraphy.

#### **JAZZ STUDIES**

B.M. jazz studies students take only 3 credit hours of performance lessons and should take M 395 Jazz.

#### B.M.E.—INSTRUMENTAL OR CHORAL/GENERAL

Instrumental ensemble MUS-X 040 (2 cr.) *or* Choral ensemble MUS-X 070 (2 cr.)

Performance lessons (2 cr.)

Music theory (3-6 cr.)

Class piano MUS-P 111 (2 cr.)

E 131 Introduction to Music Education (2 cr.)

English composition (3 cr.)

General education course if space permits (3 cr.)

TOTAL 18 cr.

#### B.S.—OUTSIDE FIELD—VOICE OR INSTRUMENT

Instrumental ensemble MUS-X 040 (2 cr.) *or* Choral ensemble MUS-X 070 (2 cr.)

Performance lessons (2 cr.)

Music theory (3-6 cr.)

Class piano MUS-P 111 (2 cr.)—except for guitar, piano, harpsichord, and organ majors

English composition (3 cr.)

Foreign language or course to explore outside field (3-4 cr.)

TOTAL 16-19 cr.

#### **B.S.—RECORDING ARTS**

MUS-X 090, MUS-A 101, A 111, A 150 English Composition (3 cr.) Minor Course

#### **B.S.—BALLET**

Ballet ensemble MUS-X 030 (2 cr.) Ballet major MUS-J 400 (6 cr.) Class piano MUS-P 110 (2 cr.) Theatre elective (3 cr.) Foreign language (4 cr.)

#### TOTAL 17 cr.

*Note:* Music theory course numbers and credit hours will be determined by performance on the Basic Musicianship Test given before advising.

# INFORMATION FOR STUDENTS NOT ACCEPTED INTO THE JACOBS SCHOOL OF MUSIC

Most B.M., B.M.E., and B.S. (nontechnical) students who are interested in a music major but have not yet been accepted may begin course work for the major while in the University Division.

# ADMISSION TO THE JACOBS SCHOOL OF MUSIC FROM THE UNIVERSITY DIVISION

Admission is very competitive. Students must apply to the Jacobs School of Music and arrange for a fall audition for spring semester admission. Auditions scheduled for January are too late for spring admission. For more information concerning admission and the application, contact the Music Admissions Office, Merrill Hall 101, (812) 855-7998.

#### FRESHMAN YEAR COURSE WORK

#### **Non-Admitted Music Interest**

During the freshman year, students who plan to apply for the B.M., B.M.E., or B.S. (not audio recording) should choose from the following:

#### **■ ENGLISH COMPOSITION**

See pp. 12–13 for options.

#### **■ FOREIGN LANGUAGE**

All music majors except B.M.E. and A.S. students are required to complete two terms of foreign language. Voice students must complete two terms each of French, German, and Italian. This requirement may also be met through an exemption/credit exam or AP credit.

#### **■ SPEECH COMMUNICATION**

Required only for B.M.E. students. Choose CMCL-C 121 or C 122.

#### **■** ENSEMBLE

Consult the *Planner Course Descriptions* booklet regarding ensemble choices and auditions.

Choral Ensemble Music X 070 Instrumental Ensemble X 040 Ballet Ensemble X 030 Marching Hundred X 050

#### **■ PERFORMANCE STUDY**

Select the MUS-Z 110 music performance course corresponding to your interest from the Private Performance Lessons listed under "Music" in the *Planner Course Descriptions* booklet.

#### **■ MUSIC THEORY**

Music theory course selections should match students' backgrounds:

- a. If you have an excellent background in music theory, register for T 151 (3 cr.), the first core music theory course.
- b. If you have an average background in music theory, register for both T 151 and T 109 Rudiments of Music (3-3 cr.).
- c. If you have a deficient background in music theory, register for T 109 (3 cr.).
- d. Take the Basic Musicianship Test during the week preceding the start of classes. If your test score does not place you into the music theory course that you have chosen, you will then adjust your schedule to include the music theory course(s) appropriate to your background.

Test scores: 70 or above: You are exempt from T 109; take T 151. 50-68: Take both T 109 and T 151. Below 50: Take only T 109.

Note: MUS-T 151 is offered only in the fall semester.

#### **■** PIANO

If you are a non–music major, and your main instrument is something other than piano, organ, or guitar, you should register for MUS-P 110. This is a beginning class. If you wish to investigate more advanced classes, take the secondary piano placement examination during the orientation preceding the fall or spring semester. The schedule is available from the secondary piano coordinator, Music Annex 283.

#### ■ GENERAL EDUCATION

Choose from courses designated S&H, N&M, or A&H in the *Planner Course Descriptions* booklet.

#### ■ MUSIC EDUCATION (FOR B.M.E. STUDENTS ONLY)

Students interested in music education may take MUS-E 131 Introduction to Music Education (2 cr.) during the first or second semester.

# INFORMATION FOR STUDENTS INTERESTED IN THE B.S. OR THE A.S. IN RECORDING ARTS

# Admission to the B.S. or A.S. Degree Program

Admission for University Division students into the A.S. or B.S. Degree Program in the Recording Arts is very competitive. Students seeking admission from University Division should follow the Jacobs School of Music admission procedures, submit applications by December 1, and interview on audition weekends in the spring. Admitted students will begin the program in the following fall semester. For more information, see www.music.indiana.edu/department/audio/admission.shtml.

# FRESHMAN YEAR COURSE WORK Recording Arts

During the first year, students who are interested in being admitted to the Audio Recording Program (B.S. or A.S.) usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

See pp. 12–13 for options. Students choosing ENG-W 131 or W 170 may decide to postpone this course until the second semester.

#### **■ FOREIGN LANGUAGE COURSE**

Required only for B.S. students who need two semesters for graduation (or one semester of accelerated study).

#### ■ CORE MUSIC COURSES

MUS-Z 101 and Z 111 (MUS-T 151 may be substituted for the two courses.)

See information about T 109 in music theory section on p. 61. Some students will need to take T 109 before or with T 151.

#### ■ AUDIO COURSE

MUS-A 101

#### **■** GENERAL EDUCATION COURSES

Choose from PHYS-P 105, some other course for an area of interest in an outside concentration (B.S.) or a bachelor's degree in another area (A.S.), or a distribution area course (A&H, S&H, or N&M).

### **OTHER TECHNICAL MUSIC DEGREES**

For information regarding admission and degree requirements for String Instrument Technology, contact the Jacobs School of Music.



Summer band concert at the Jacobs School of Music.

# School of Nursing (NURS)

www.indiana.edu/~iubnurse Nursing appointment phone: 812-855-1736

#### **BACCALAUREATE CURRICULUM**

Founded in 1914, the Indiana University School of Nursing is among the largest nursing schools in the United States and offers bachelor's through doctorate degrees. The nursing programs at IUB and at IUPUI have equivalent prerequisites and nursing courses. Students can apply to both programs, listing one as their first choice and the other as their second choice. Incoming freshmen and others interested in the four-year B.S.N. degree programs (all pre-nursing majors) will find these programs divided into two areas—general education and the nursing core. The general education category is further divided into five distinct "clusters" (criticalanalytical-science, communications, social competence, cultural diversity, humanistic appreciation) plus electives. To complete the B.S.N., students normally take one year of general education courses, and once admitted to the School of Nursing, they take three years of nursing core courses along with the remaining general education, totaling up to at least 125 credits.

## ADMISSION REQUIREMENTS

Admission to the School of Nursing at IU Bloomington and IUPUI (Indianapolis) is extremely competitive. All courses counting toward admission must have a grade of C or higher. While the minimum GPA required to apply is 2.7, the actual GPA for admitted students is considerably higher. The School of Nursing allows applicants to repeat no more than three required courses (only two can be required science courses). Criteria other than grades are considered in the application process.

Admission to the School of Nursing is based upon the following criteria:

#### Cumulative GPA (15%)

**Critical-Analytical-Science GPA (20%)** which includes anatomy, finite math, and a 3 credit critical-analytical-science course;

Nursing GPA (30%)—29-31 credits must be listed on the application. The courses/credits include anatomy (5 cr.); finite math (3 cr.); additional 3 cr. critical-analytical-science course; English composition (2-3 cr.); introductory psychology (3 cr.); introductory sociology (3 cr.). The remaining credits will be selected by the student from the approved list of cluster courses for communication (one course), social competence (one course), cultural diversity (two courses) and/or humanistic appreciation (one course).

*Note:* To be considered for admission, student must have completed two semesters (or one year) of high school chemistry with a grade of C or above in both semesters or a college introductory chemistry course (lecture and discussion only).

**Interview with Faculty, Alumni, and Community Nursing Partners (30%)**—20-30-minute interview with eligible applicants

A written essay (500 words maximum) will also be required as part of the application

Service Experience (5%)—Service experience can be earned by work experience in health care or service agencies, volunteer experience in health care or service agencies with direct client contact/interaction, completion of pre-nursing course and service experience (NURS-B 106 at IUB or NURS-B 104 at IUPUI), performance-based programs, or scholarship-based programs.

Note: More detailed information is available in the 2007–2008 Pre Nursing Handbook, which is available on the Indiana University School of Nursing's Bloomington Web site: www.indiana.edu/~iubnurse and as a handout. The Indiana University School of Nursing reserves the right to make changes in these admission criteria. If students have questions about the admission criteria, they should see their assigned advisor or the School of Nursing advisor.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students pursuing a major in nursing usually complete the following:

- English composition: Students are strongly encouraged to take ENG-W 131 or ENG-W 170.
- Anatomy, physiology, or microbiology: ANAT-A 215 is required. If the course is full, students must waitlist the course in fall and spring. A student who is unable to register for anatomy may use physiology PHSL-P 215 or microbiology (BIOL-M 200 and M 215).
- Finite math: MATH-M 118, MATH-A 118 or MATH-D 116 + D 117
- At least one additional critical-analytical-science course (selected from cluster list)
- Introductory psychology: PSY-P 101, PSY- P102, PSY-P 106, or PSY-P 155.
- Introductory sociology: SOC-S 100 or SOC-S 101
- Cluster courses: Additional courses to total with the above to 29-31 credits must be selected from critical-analytical-science (one course); communication (one course), social competence (one course), cultural diversity (up to two courses) or humanistic appreciation (one course).

#### **NURSING CORE**

Only students admitted to the B.S.N. major are eligible to take the 19 courses within the nursing core.

SCHOOL OF OPTOMETRY 65

# **School of Optometry (OPT)**

www.opt.indiana.edu

The Indiana University School of Optometry has achieved national recognition for its preeminence in optometric education. The school provides space for classrooms, laboratories, clinics, a library, offices, and supporting research and development activities.

Students seeking admission to the School of Optometry in order to pursue a Doctor of Optometry degree (O.D.) may be admitted upon receipt of a baccalaureate degree or at the end of 90 college credit hours. For additional information on the preprofessional requirements for admission, see the "Preprofessional Studies" section, p. 71-72.

#### **OPTICIAN/TECHNICIAN PROGRAM**

The IU School of Optometry also offers a two-year program in optometric technology leading to the Associate of Science degree. Students completing the program are qualified to begin careers as optometric technicians or opticians. This study offers an excellent entry point into one of the most interesting areas in the health care field.

This program takes four semesters to complete if the student has not taken any college courses. The general nontechnical courses, such as English composition, may be completed either before or after the technical courses. An additional option allows a student to become a laboratory optician by completing courses in lens surfacing and fabrication (Optician's Laboratory Concentration).

For additional information, visit the Optician/ Technician Program Web page: www.opt.indiana.edu/ programs/opttech/opttech.htm

Or contact the School of Optometry:

800 E. Atwater Avenue Bloomington, IN 47405 E-mail: iubopt@indiana.edu

Phone: (812) 855-1917 Fax: (812) 855-4389

# CAREER INFORMATION FOR THE OPTICIAN AND THE OPTOMETRIC TECHNICIAN

Opticians fill eyewear prescriptions. Their training includes dispensing eyewear, selecting frames, taking facial measurements, and choosing the best lens style for the patient. They take the order written by an eye doctor, produce the lenses with the correct prescription, and shape the lenses to fit the frame.

Optometric technicians must know how to select, adjust, and dispense eyewear. They learn business procedures and may be responsible for managing an office. Generally, they work closely with an eye doctor as part of an eye care team. Tasks include testing and measuring visual acuity, color vision, depth perception, field of vision, and pressures within the eye. Optometric technicians assist in various contact lens procedures, and also teach contact lens patients to insert, remove, and care for their contact lenses.

#### **ADMISSION REQUIREMENTS**

In addition to applying for admission to IUB, you need to complete a separate application to the Optician/ Technician Program. There are no prerequisites other than a high school diploma. Many entrants into the program have already taken college courses and may be able to count them toward the requirements of the Optician/Technician Program. The application process is not difficult. You can obtain an application from the Office of Student Administration in the School of Optometry or download and print a copy of the application from the School of Optometry Web page, www.opt.indiana.edu, under "Admissions."

# Curriculum for Students Already Accepted into the Program

First Semester (16 credit hours)

TOPT-V 111 Basic Optics (5 cr.)

TOPT-V 151 Ophthalmic Procedures 1 (4 cr.)

TOPT-V 174 Office Procedures (4 cr.)

TOPT-V 201 Anatomy and Physiology of the Eye (3 cr.)

Second Semester (16 credit hours)

TOPT-V 121 Ophthalmic Lens Finishing (4 cr.)

TOPT-V 131 Ophthalmic Optics (5 cr.)

TOPT-V 153 Ophthalmic Dispensing (4 cr.)

TOPT-V 251 Ophthalmic Procedures 2 (3 cr.)

# Courses That Can Be Taken Before Admission That Meet Requirements for the Program

ENG-W 131 Elementary Composition (3 cr.) HPER-H 160 First Aid and Emergency Care (3 cr.) TOPT-V 153 Ophthalmic Dispensing (4 cr.) TOPT-V 201 Anatomy and Physiology of the Eye (3 cr.)

# School of Public and Environmental Affairs (SPEA)

www.indiana.edu/~speaweb

SPEA is among the top three schools of public affairs in the United States and is number one in public affairs among public universities. It is widely known for innovative educational programs, research, and public service.

A Bachelor of Science in Arts Management (B.S.A.M.), a Bachelor of Science in Public Affairs (B.S.P.A.), a Bachelor of Science in Public Health (B.S.P.H.), or a Bachelor of Science in Environmental Science (B.S.E.S.) equips students with the concepts and skills to understand, and have an impact on, complex social and environmental issues.

SPEA provides students with a wide range of services, such as academic advising, career planning, internships in public, non-profit, and business organizations (including a program in Washington, D.C.), and opportunities for overseas study.

# ADMISSION REQUIREMENTS (B.S.P.A. OR B.S.P.H.)

Admission to the School of Public and Environmental Affairs is competitive. To be considered for admission, students must complete at least 26 credit hours, but no more than 75 credit hours. Applicants must complete an introductory SPEA course (V 160, V 161, E 162, or E 272) with a grade of C or higher. Admissions decisions are based on several factors, including the student's cumulative GPA, grade trends, and SPEA course GPA. Application deadlines are May 1 for fall admission and December 1 for spring admission.



School of Public and Environmental Affairs, Tenth Street

# FRESHMAN YEAR COURSE WORK Public Affairs or Public Health

During the freshman year, students usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

C- or higher required. See pp. 12–13 for options.

#### ■ MATHEMATICS COURSE(S)

Choose one course from MATH-M 118, D 116 and D 117, A 118, M 119, or M 211. The policy analyses major requires both M 118 and M 119.

Some students may need preparatory course(s) before taking the above required math courses(s). Your advisor will help you choose a class based on your major, SAT/ACT scores, high school grades, and IUB Mathematical Skills Assessment score. See pp. 13–14 for more information.

#### **■** COMPUTER COURSE

Choose from SPEA-V 261, BUS-K 201, CSCI-A 110, or CSCI-A 201. Credit given for only **ONE** of these courses.

#### ■ SPEECH COMMUNICATION COURSE

Choose from CMCL-C 121, C 122, C 205, C 223, C 225, C 228, C 229, or THTR T 115, T 120, or Bus-X 104.

#### ■ ADDITIONAL GENERAL EDUCATION COURSES

**Public Affairs:** One course from HIST-H 105, HIST-H 106, or POLS-Y 103. Courses from arts and humanities, social and historical studies, and natural sciences.

**Public Health:** Courses from humanities, social sciences, and natural sciences.

#### ■ MAJOR COURSE(S)

**Public Affairs:** SPEA-V 160, SPEA-V 161, E 162, or E 272. Environmental management majors must take E 272, not E 162.

Public Health: SPEA-V 160

#### ■ ELECTIVE COURSE(S)

Both the public affairs and public health degree programs allow approximately 24-27 elective credit hours for graduation.

## **Public Affairs**

The B.S. in Public Affairs degree combines courses in finance (how are public roads, schools, and prisons paid for?), management (how can we increase efficiency in public and business organizations?), public law (who makes the rules and regulations, and what is the process?), policy analysis (how are public policy decisions made?), environmental management (what can individuals and society do to protect and improve the environment?), and public and nonprofit management (what does it mean to work for a nonprofit organization?).

Students interested in public affairs choose from the following majors: management, public financial management, environmental management, legal studies, policy analysis, or public or nonprofit management.

#### **PUBLIC AFFAIRS COURSE WORK**

**Arts and Humanities:** Two approved courses, minimum 6 credits, are needed for graduation. Choose courses from the following departments only and ask your advisor how SPEA counts the courses that interest you.

African American and African Diaspora Studies African Studies American Studies

Central Eurasian Studies

Classical Studies

College of Arts and Sciences Topics E 103

Communication and Culture

Comparative Literature

English

Fine Arts

Folklore and Ethnomusicology

Foreign languages and literatures

History and Philosophy of Science

Musicology and music history

Philosophy

Religious Studies

Theatre and Drama

Social and Historical Studies: Five courses, minimum 15 credits, are needed for graduation.

ECON-E 201 and E 202

One of HIST-H 105, H 106, or POLS-Y 103

Two additional approved courses. Choose courses from the following departments only and ask your advisor how SPEA counts the courses that interest you.

Anthropology College of Arts and Sciences Topics E 104 Criminal Justice Gender Studies Geography (G 110, G 120)

History

Journalism

Linguistics

Political Science

Psychological and Brain Sciences (not P 101 or P 155)

Sociology

Telecommunications

Natural Sciences: Two courses, minimum 6 credits, are needed for graduation. Choose from the following only:

Astronomy: AST-A 100, A 105, or A 110

Biology: BIOL-L 100, L 104, L 111, L 112, L 113, L 212, L 350, L 369

Chemistry: CHEM-C 101/C 121, C 102/C 122, C 103, C 117, C 118

College of Arts and Sciences Topics E 105 (approved sections only)

Earth sciences: GEOG-G 107, G 109, G 185, G 208, GEOL-G 103, G 104, G 105, G 111, G 112, G 114, G 116, G 121, G171

Physics: PHYS-P 101, P 110 or P 120, P 201, P 202, P 221,

Psychological and Brain Sciences: P 101 or P 155

**Public Affairs Core** (five courses)

SPEA-V 160 National and International Policy SPEA-V 161 Urban Problems and Solutions SPEA-E 162 Environment and People or E 272 Introduction to Environmental Sciences (environmental management majors are required to take SPEA-E 272, not E 162).

SPEA-V 372 Government Finance and Budgets SPEA-V 376 Law and Public Policy

#### **Public Health**

The B.S. in Public Health degree explores much of the same subject matter as the public affairs program, and also enables the student to focus specifically on concepts and skills of management and policy in the health sector. The Bloomington campus offers the health administration major. After consulting with an advisor, freshman students may take some of the following

Humanities: One course, minimum 3 credits, is needed for graduation.

Social Sciences: Four courses, minimum 12 credits, are needed for graduation.

ECON-E 201, E 202, and POLS-Y 103

Choose one approved course from anthropology, geography, journalism, linguistics, political science, psychology, or sociology.

Natural Sciences: Two courses, 6-10 credits, are needed for graduation (chemistry lecture and lab count as one course.

Choose from the following only: ANAT-A 215, BIOL-L 100, L 104, L 112, L 212, L 302, CHEM-C 101/C 121, C 102/C 122, C 103, C 117, C 118, MSCI-M 131, or PHSL-P 215

#### Public Health Core (six courses)

SPEA-V 160 National and International Policy SPEA-H 316 Environmental Health SPEA-H 320 Health Systems Administration SPEA-V 366 Managing Behavior in Public Organizations SPEA-H 322 Principles of Epidemiology or HPER-H 311 Human Diseases and Epidemiology SPEA-H 342 Community Health Education or HPER-C 403 Techniques in Public Health Education

Additional credit hours in major—refer to SPEA Bulletin.

#### ARTS MANAGEMENT

The arts industry is in a period of rapid change, and arts organizations are in need of well-trained managers and leaders. IU Bloomington has a wealth of cultural opportunities for students with an interest in the performing and visual arts.

SPEA currently offers a certificate in arts administration and will implement a new bachelor's degree program in the 2007-2008 school year. Both programs are designed for students with strong arts backgrounds who wish to prepare for careers in arts management. The certificate is primarily for students majoring in an area of music or visual arts, such as fine arts, theatre, dance, art history, anthropology, archeology, folklore and ethnomusicology.

The arts administration bachelor's degree program is currently under development. Interested freshman students should follow the same course guidelines as public affairs majors. It is important for interested students to meet with a SPEA advisor in their freshman year.

## FRESHMAN YEAR COURSE WORK FOR THE B.S. IN ENVIRONMENTAL SCIENCE

The B.S. in Environmental Science (B.S.E.S.) demands a strong background in scientific and mathematical skills to prepare students to comprehend and solve complex environmental problems. Students interested in an applied science program with the potential for significant impact should consider this degree. The degree is jointly awarded by the College of Arts and Sciences and the School of Public and Environmental Affairs, which takes advantage of the strengths of both academic units.

A specific B.S.E.S. area of concentration is usually declared after the first year of study. This decision is done in consultation with the program director. One of the following areas of concentration may be selected:

Atmospheric science
Ecosystem science
General environmental science
Hydrology and water resources
Mathematical modeling
Pollution control technology and remediation
Surficial processes

While course requirements vary among concentrations, all students should consider taking the following during the first year: English composition, College of Arts and Sciences Topics E 103, BIOL-L 111, CHEM-C 117 (See an advisor to determine the proper course based on chemistry background), MATH-M 211 or appropriate preparatory course, one course in the physical sciences such as GEOG-G 107, GEOL-G 105, or GEOL-G 171.

# School of Social Work (SWK)

socialwork.iu.edu

Indiana University has a long history of providing preparation for social work practice. The first courses in this area were offered in 1911. The organizational status changed many times until 1977, when the School of Social Work was organized to reflect identification with the profession more clearly. Although the school's main location is in Indianapolis, courses or programs are offered on other IU campuses. Graduates move into a broad variety of social service settings, including those concerned with aging, family and child welfare, corrections, mental and physical health, and adjustment in schools. In addition, persons receiving the bachelor's degree who are admitted to the master's program may be given advanced standing in that program. Both the Bachelor of Social Work and the Master of Social Work are accredited by the Council on Social Work Education (CSWE).

The School of Social Work offers a major leading to the Bachelor of Social Work degree (B.S.W.). All four years of the Bachelor of Social Work program are available on the Bloomington campus.

## **ADMISSION REQUIREMENTS**

To be considered for admission, students need to have completed Social Work S 141 with a grade of C or higher and 12 credit hours of course work with a minimum cumulative GPA of 2.5. Meeting the minimum GPA requirement does not guarantee admission into the B.S.W. program. The average GPA of admitted students is substantially higher.

The school requires evidence of characteristics or potential required for competent social work practice as defined in the mission statement of the school. Such evidence may be derived from application materials, letters of reference, pertinent work experience, and performance in S 141.

Students submit an application by April 1 for priority consideration for the following fall admission. Applications are available at the School of Social Work office (1127 Atwater Avenue). To increase the cultural diversity in the student body, the school particularly encourages applications from members of ethnic minorities.

#### FRESHMAN YEAR COURSE WORK

During the freshman year, students who are pursuing a major in the School of Social Work usually complete the following:

#### ■ ENGLISH COMPOSITION COURSE(S)

ENG-W 131 is recommended for the first semester. If you strongly prefer to take another option, discuss this possibility with your advisor. You will need to ask for permission from the School of Social Work to have a different option fulfill the requirement. For exemption information, see pp. 12–13.

#### **■** MATHEMATICS COURSE(S)

The school recommends that you take a statistics course in your junior or senior year, as statistics is required for admission to most M.S.W. programs. You may want or need to take a mathematics course in preparation for statistics. If so, choose from MATH-M 014, M 025, M 118/S 118, M 119, M 211, or MATH-A 118. Most mathematics courses can be used to fulfill a mathematical and physical sciences requirement.

Your advisor will help you finalize your decision based on your high school background, high school test scores and grades, and the Mathematical Skills Assessment Test.

#### **■** COMPUTER COURSE

CSCI-A 110 or A 201

#### **■** GENERAL EDUCATION COURSES

Choose courses from: ANTH-E 105, POLS-Y 103, PSY-P 101, SOC-S 100, HIST-H 106.

Either SOC-S 100 or PSY-P 101 is usually taken first semester. You can also choose from foreign language, arts and humanities (see the *Planner Course Descriptions* booklet for A&H courses), and mathematics and physical sciences (see your advisor). If you plan to take statistics in the future, you are not required to complete another mathematics and physical sciences course.

#### **■** MAJOR COURSES

SWK-S 100 and S 141. S 141 is usually taken in the second semester since completion of English composition and either PSY-P 101 or SOC-S 100 is highly recommended before SWK-S 141.

#### **■** ELECTIVES

You may want to consider some 1 or 2 credit electives to help round out your schedule.

# Preprofessional Studies: Prepare for a Career in Law, Medicine, or Health

# THE HEALTH PROFESSIONS AND PRELAW CENTER

www.hpplc.indiana.edu

The mission of University Division's Health Professions and Prelaw Center (HPPLC) is to help Bloomington students become thoughtful, well-prepared, and successful in their pursuit of a professional career in health or law.

Professional practice as a dentist, doctor, lawyer, occupational therapist, optometrist, pharmacist, physical therapist, physician assistant, or veterinarian requires a graduate degree. Preparation for admission to these programs can be completed at the IUB campus. Bachelor's and associate degree programs are offered by the IU School of Medicine Health Professions Programs, the IUPUI School of Informatics Health Information Administration Program, and the School of Dentistry's IU Dental Hygiene Program. Students can begin preparation for these programs at Bloomington, but they must complete them at other IU campuses. For information on nursing or optician/technician programs, see those sections of the *Planner*.

While at IUB, you will need to prepare systematically to gain admission to these professional programs. HPPLC advisors will help you in this endeavor. Any undergraduate major would be acceptable to prepare for admission to graduate-level professional programs; when selecting a major, consider ones you'll enjoy and in which you can excel, and ones that might serve as a basis for further study or employment should you choose not to pursue a professional degree. Consult with your academic or HPPLC advisor if you have questions about choosing a major.

If you are interested in preparing for one of these professional careers, we encourage you to schedule an individual advising appointment at the Health Professions and Prelaw Center. The HPPLC office has information on specific admission requirements and statistics for every preprofessional school and program in the country. For more information, visit the HPPLC Web site at www.hpplc.indiana.edu. (Once there, click the "Mail Lists" icon to sign up for e-mail lists pertinent to your area of preprofessional study.) You may contact HPPLC at (812) 855-1873, hpplc@indiana.edu; or visit the office in Maxwell Hall 010. The center also maintains a recommendation service, through which letters of recommendation may be compiled and disseminated.

Specific course suggestions and requirements for these programs are listed below according to the type of degree they require. For specific requirements for other schools nationwide, consult a HPPLC advisor.

# PREPROFESSIONAL STUDIES LEADING TO GRADUATE DEGREES

# **Predental Study**

For admission to the IU School of Dentistry, a student must have earned a minimum of 90 credit hours. Students must have completed the following predental requirements:

- 1 semester of English composition (ENG-W 131)<sup>1</sup>
- 1 semester of introductory psychology (PSY-P 101)<sup>1</sup>
- 2 semesters of biology or zoology (BIOL-L 111, L 112, and L 113)<sup>1</sup>
- 2 semesters of general/inorganic chemistry (CHEM-C 117 and CHEM-N 330)
- 2 semesters of general physics (PHYS-P 201 and P 202)<sup>1</sup>
- 1 semester of organic chemistry (CHEM-C 341 and C 343)<sup>1</sup>
- 1 semester of anatomy (ANAT-A 215)
- 1 semester of physiology (PHSL-P 215 or BIOL-P 451)
- 1 semester of biochemistry lecture (BIOL-M 350 or CHEM-C 483 or CHEM-C 484)

Predental students must complete lecture and laboratory work in all required science areas except biochemistry and physiology, which do not require a lab. Courses in three-dimensional art (e.g., ceramics, jewelry, design), instrumental music, genetics, histology, molecular biology, cell biology, and introduction to business administration or personal finance are recommended, but not required, in the predental curriculum. Special credit by testing out of predental requirements will be accepted by the IU School of Dentistry if adequate documentation is provided.

Preferential consideration is given to those with overall and science grade point averages of 3.4 or higher and DAT scores of 19 or higher in every category.

# **Prelaw Study**

Law schools seek applicants who have gained, through their undergraduate experiences, precision in written and oral expression, an understanding of history, a familiarity with scientific method, and an appreciation

<sup>&</sup>lt;sup>1</sup> See an advisor for appropriate alternatives.

of social, political, and economic problems of society. No single course of prelegal study can supply these elements for all students, and they may be combined in varying proportions. Students are encouraged to meet with a prelaw advisor in HPPLC during the freshman year to discuss their interests.

Most law schools require a B.A., B.S., or equivalent degree from an accredited undergraduate institution, but do not require particular subjects or any special course of study in the undergraduate program. Admissions committees typically consider narrow collegiate specialization undesirable, particularly if the area of undergraduate study provides solely vocational training. There are no preferred majors.

# **Premedical Study**

The modern world is complex, and physicians care for people from a wide range of social, economic, and cultural backgrounds. The faculty of IU's School of Medicine, like many medical school faculties, requires applicants for admission to include in their undergraduate study a minimum number of science courses. It also expects successful applicants to complete a significant number of courses in the humanities and social and historical studies to gain a better understanding of contemporary society, human experience, and their future patients' backgrounds, problems, and illnesses.

Nearly all of the applicants admitted to the IU School of Medicine have at least a baccalaureate degree before beginning medical school.

Any major from the traditional arts and sciences curriculum is acceptable, as well as some others. Premedical students must complete lecture and laboratory work at the science major's level in the following areas:<sup>1</sup>

8-10 credit hours of general chemistry (CHEM-C 117 and CHEM-N 330)<sup>2</sup>

8-10 credit hours of organic chemistry (CHEM-C 341, C 342, and C 343)<sup>2</sup>

8-10 credit hours of physics (PHYS-P 201 and P 202)<sup>2</sup>

8-10 credit hours of biological sciences (BIOL-L 111, L 112, and L 113) $^2$ 

Medical school applicants are expected to speak and write the English language correctly. The IU Admissions Committee encourages highly qualified students to enroll in undergraduate honors courses in any area of study.

# **Pre-Occupational Therapy Study**

Occupational therapists help people with physical, cognitive, or psychosocial challenges to maximize their ability to participate in life independently. With occupational therapy (OT), children and adults facing such challenges can improve skills that help them perform daily tasks at home, school, work, and play. OT does not simply treat medical conditions. It helps people stay engaged in activities that give them pleasure and a sense of purpose.

The Indiana University School of Health and Rehabilitation Sciences (SHRS) offers a master's degree in OT on the IUPUI campus. Students may complete all of the pre-OT requirements on the Bloomington campus for admission to this and other OT programs. As of 2007, occupational therapy students must prepare at the master's level or higher. Students are eligible to apply for admission to the OT program once they have completed a bachelor's degree, along with the OT prerequisite courses and required observation hours.

The minimum cumulative and prerequisite GPA required to apply is 3.00, although admission is increasingly competitive.

Almost any undergraduate major is suitable for pre-OT students. Consult with your academic advisor for appropriate courses and semester sequencing in order to complete prerequisites for admission to the OT master's degree program.

First-year pre-OT courses can include PSY-P 101 and P 102 (currently, prerequisites for PSY-P 324, which is required for OT); HPER-F 150 or EDUC-P 314; ANAT-A 215; PHSL-P 215; PSY-K 300, MATH-K 300, or SPEA-K 300 (finite math is a recommended prerequisite for the latter statistics courses); CLAS-C 209. Other recommended (but not required) courses include additional humanities and social science courses, CMCL-C 122 or C 121, and courses required for the major(s) you are considering.

If you have specific questions regarding the master's degree in OT, contact an academic advisor in the Health Professions and Prelaw Center, or contact the School of Health and Rehabilitation Sciences enrollment coordinator at (317) 274-7238. Also refer to the SHRS Occupational Therapy Web site, www.shrs.iupui.edu/ot/.

# **Preoptometry Study**

The minimum preparation for admission to the IU School of Optometry is 90 credit hours of college courses. (Last year, approximately 93 percent of admitted students had earned a bachelor's degree.) Courses must include:

4-6 credit hours of calculus (MATH-M 211 or M 119-M 120)

<sup>&</sup>lt;sup>1</sup> Some medical schools require one year of college math or calculus and one year of English. Ask your advisor.

<sup>&</sup>lt;sup>2</sup> See an advisor for appropriate alternatives.

10 credit hours of inorganic chemistry (CHEM-C 117 and CHEM-N 330)<sup>1</sup>

10 credit hours of general physics (PHYS-P 201 and P 202)<sup>1</sup>

3 credit hours of psychological and brain sciences (including PSY-P 101)<sup>1</sup>

3 credit hours of statistical techniques (MATH-K 300 or PSY-K 300 or SPEA-K 300 or MATH-K 310 or PSY-K 310)<sup>1</sup>

6 credit hours of animal biology with lab (BIOL-L 112 and L 113)

6 credit hours of arts and humanities courses<sup>1</sup>

8 credit hours of foreign language or the equivalent<sup>2</sup>

3 credit hours of English composition<sup>1</sup>

5-6 credit hours of organic chemistry (CHEM-C 341 and C 342)  $^{\!1}$ 

3 credit hours of advanced biology<sup>3</sup>

6 credit hours of social and historical studies

5 credit hours of microbiology with lab (BIOL-M 250 and M 255)

3 credit hours: Intensive writing requirement

Please contact the school's Office of Student Administration at (812) 855-1917 for the most current information. Students are encouraged in their freshman year to begin meeting with a School of Optometry advisor.

# **Prepharmacy Study**

Pharmacists collaborate with other health care professionals to achieve outcomes from medication that improve patients' quality of life. Students may complete all of their pre-pharmacy requirements on the Bloomington campus for admission to the Purdue University School of Pharmacy and Pharmaceutical Sciences or another pharmacy program.

HPPLC can provide students with information on IU courses approved to meet admission requirements for the Purdue Doctor of Pharmacy (Pharm.D.) program. Purdue's requirements include specific courses in chemistry, math, English, anatomy, physiology, biology, physics, and economics. <sup>4</sup> Students planning to apply to

Purdue University's pharmacy program should consult with an advisor in HPPLC to obtain a list of the current required courses for admission. Students interested in other pharmacy schools should see a HPPLC advisor about their requirements.

Recommended courses for the first year for students considering pharmacy: CHEM-C 117; CHEM-C 341; MATH-M 119 and M 120;<sup>5</sup> ENG-W 131 or ENG-L 141 and L 142; BIOL-L 111, L 112, and L 113; ECON-E 201; and general education electives (obtain list from advisor).

# Pre-Physical Therapy Study

Physical therapists plan and administer treatment utilizing therapeutic exercise, assistive devices, and physical agents to restore function, relieve pain, and prevent disability following disease, injury, or loss of a part of the body.

The Indiana University School of Health and Rehabilitation Sciences offers a Doctor of Physical Therapy (D.P.T.) degree on the IUPUI campus. Prior to entering the D.P.T. program, students must have completed requirements for a bachelor's degree and the following prerequisite courses. Students should consult with their academic advisors for appropriate courses and semester sequence in order to complete prerequisites.

Humanities/Social Sciences<sup>6</sup> 6 cr.

Introductory Statistics: PSY-K 300 or SPEA-K 300<sup>7</sup> 3 cr.

Human Anatomy (one course with lab): <sup>8</sup>
ANAT-A 215 5 cr.

Human Physiology (one course with lab): <sup>8</sup> PHSL-P 215

5 cr.

Chemistry (two courses with lab):<sup>7,8</sup> (CHEM-C 117 and C 118) 10 cr.

Physics (two courses with lab): PHYS-P 201 and P 202 10 cr.

3 cr.

Introductory Psychology: PSY-P 101

0 01.

Human Lifespan Development: HPER-F 150<sup>7</sup> 3 cr.

<sup>&</sup>lt;sup>1</sup> See an advisor for appropriate alternatives.

<sup>&</sup>lt;sup>2</sup> Students not seeking a bachelor's degree who have completed two or more years of a single foreign language in high school with an average grade of C or higher are exempt from this requirement. Students seeking a degree in the College of Arts and Sciences must complete three or four semesters of foreign language, depending on the degree.

<sup>&</sup>lt;sup>3</sup> Recommended courses: ANAT-A 215, PHSL-P 215, or BIOL-M 350

<sup>&</sup>lt;sup>4</sup> Level of the anatomy, physiology, chemistry, and physics courses must be appropriate for science majors and must have been completed within seven years of application.

<sup>&</sup>lt;sup>5</sup> MATH-M 211 and M 212 may be substituted for MATH-M 119 and M 120.

<sup>&</sup>lt;sup>6</sup> Two courses such as sociology, anthropology, art, history, or philosophy.

<sup>&</sup>lt;sup>7</sup> See HPPLC advisor for appropriate alternatives.

<sup>&</sup>lt;sup>8</sup> Level of the anatomy, physiology, chemistry, and physics courses must be appropriate for science majors and must have been completed within seven years of application.

Students must demonstrate proficiency in medical terminology prior to entering the professional program. They will also need to be competent writers and demonstrate computer literacy including e-mail, the Internet, database searches, and spreadsheet and word processing capabilities.

Minimum GPA required to apply: 3.2 CGPA with a 3.2 GPA in the prerequisite anatomy, physiology, chemistry, physics, and statistics courses. For more information see www.dpt.indiana.edu and www.hpplc.indiana.edu.

# Pre-Physician Assistant Study

See www.aapa.org/pgmlist.php3 for a list of certified physician assistant (PA) programs.

Physician assistants conduct physicals, diagnose and treat illnesses, order and interpret tests, consult on preventative healthcare, assist in surgery, and, in most states, write prescriptions. PAs work under physician supervision and practice in all areas of medicine.

Students may complete all courses required for admission to PA programs on the Bloomington campus. Admission to PA programs usually requires completion of a bachelor's degree of the student's choosing, including prerequisite courses, which can be worked into most four-year undergraduate degrees/majors. Many PA programs favor applicants with extensive health care experience. Even prior to entering college, you could earn your first aid, EMT, or CNA certification and begin working with patients or clients.

Requirements vary by program, but courses appropriate for the first-year student that are often required can include: BIOL-L 1l1, L 112, and L 113; CHEM-C 103 or C 117; ANAT-A 215; PHSL-P 215; PSY-P 101; HPER-H 160 (for first aid certification); HPER-H 401 and H 404 (for EMT certification).<sup>1</sup>

# **Preveterinary Study**

Veterinarians serve in a variety of roles in our society. They provide health care for animals in all types of settings, conduct research, and protect humans against diseases carried by animals. Veterinary medical schools' admission requirements vary from program to program. Most require a strong foundation in the sciences, communication skills, and humanities, social science, and business course work. Considerable experience with animals in various settings (including clinical) is *very important*. Schedule an appointment with a HPPLC advisor for additional information.

Although students may not be required to complete an undergraduate degree in order to be admitted, it is important they choose a major that might serve as a basis for graduate study or employment should they not go to veterinary school. Most pre-vet students are biology majors; however, any major is acceptable as long as admission requirements are met.

Recommended courses for first-year pre-vet student should include ENG-W 131, CMCL-C 121, MATH-M 119 and M 120 (or MATH-M 211 and M 212), BIOL-L 111, L 112, and L 113, CHEM-C 117 and C 341, humanities, social science, and possibly business courses. ECON-E 201 and PHYS-P 201 are also possible, depending on the student's background.

## UNDERGRADUATE DEGREES AND CERTIFICATES COMPLETED AT OTHER IU CAMPUSES

The undergraduate degrees and certificates listed below include IU health-related majors that students may begin on the Bloomington campus, but must complete at other IU campuses (IUPUI is cited most frequently, but other IU campuses may offer similar programs). IU Bloomington students complete the prerequisite courses while here and apply to these programs at least six months prior to beginning the professional program. See HPPLC handouts and program Web sites for application deadlines.

# School of Dentistry Dental Hygiene Programs

www.iusd.iupui.edu/

IU Bloomington does not offer a dental hygiene program, but students may complete preparatory course work at IUB and then transfer to another IU branch that offers dental hygiene. Dental hygienists are trained and licensed to provide services including cleaning teeth, taking X rays, examining teeth and gums, recording the presence of diseases or abnormalities, and patient education. Employment opportunities are available in private dental practice, hospitals, public health, educational institutions, and research.

Dental hygiene programs are available on the following IU campuses: IUPUI (Indianapolis), Fort Wayne, Northwest (Gary), and South Bend. These campuses offer programs leading to an Associate of Science degree. (HPPLC advisors recommend that students apply to more than one dental hygiene program.) The IU School of Dentistry (IUSD) also offers a program leading to a Bachelor of Science degree in Public Health Dental Hygiene for dental hygienists who desire career options such as public health, teaching, research, business, and marketing. This degree is awarded upon completion of an additional 32 credit hours beyond the

<sup>&</sup>lt;sup>1</sup> HPER-H 401 and H 404 are taken concurrently and have a prerequisite of either HPER-H 160 or first aid certification.

Associate of Science degree. Dental laboratory technology and dental assisting programs are also available on some IU campuses. Ask your advisor for additional information.

# Admission to IU Dental Hygiene Programs

Because of the number of science requirements, IUB students usually need two years to complete the admission prerequisites. There is some variation of admission criteria among IU campuses. Other factors in admission may include, among other things, shadowing or observation of dental hygienists, college GPA, grades in science prerequisites, participation in an orientation session or open house, a personal statement, and the number of credit hours completed.

The minimum overall GPA required to apply varies across programs, but the average is between 2.00 and 3.00 (the minimum overall GPA is 2.00). The minimum science GPA required at IUPUI/IUSD is 2.70.

Students must complete an application between July 1 and February 1 of the academic year prior to the fall semester when admission is desired. Some programs require that all science prerequisites be completed by the end of the spring semester prior to admission.

#### Freshman Year Course Work

Note that *all* of the courses listed below must be completed during the first year in order to attempt admission to a dental hygiene clinical program after one year. IUB students usually take two years to complete their prerequisites. Normally, first-year courses include:

■ English Composition: ENG-W 131 or W 170

■ Public Speaking: CMCL-C 121

■ Science: 9-10 credit hours from CHEM-C 101 and C 121; ANAT-A 215; BIOL-M 200 and M 215; PHSL-P 215. Fort Wayne also requires CHEM-C 102 and C 122; and CLAS-C 209.

■ Psychology: PSY-P 101

■ Sociology: SOC-S 101

- Arts and Humanities: 3-6 credit hours of Arts and Humanities courses (Refer to your University Division *Planner Course Descriptions* booklet for "A&H" courses.)
- Computer Science: Northwest (Gary) requires that students complete 3 credit hours in computer skills (CSCI-A 110).
- Elective Courses: Other courses of your choosing. Consult with your advisor.

# SCHOOL OF INFORMATICS (IUPUI) Health Information Administration Program

informatics.iupui.edu/academics/health/hia/

IU Bloomington does not offer a health information administration program, but students may complete preparatory course work on the Bloomington campus and then transfer to IUPUI to complete the degree in the School of Informatics. IUB students take approximately two years of prerequisite courses to qualify for admission to the IUPUI program. (For general information on the School of Informatics, see the entry in this *Planner*.)

Health information professionals collect, analyze, and protect health care data. They are experts in management of patient information and administration of computer information systems. They also interact with clinical, financial, and legal staff to interpret data for research, statistical reporting, and patient care.

Minimum GPA required to apply: 2.500.

First-year courses vary, but can include ENG-W 131 or 170; CMCL-C 121; ANAT-A 215; PHSL-P 215; INFO-I 101; BUS-K 201; finite math (preferably MATH-M 118 or MATH-S 118, but MATH-A 118 or MATH-D 116-117 is acceptable); BUS-A 200; BUS-X 100; PHIL-P 140 or REL-R 170; another 3 credit Arts and Humanities course (refer to the University Division *Planner Course Descriptions* booklet for A&H courses); social and behavioral science (including PSY-P 101 or P 102, or SOC-S 100).

# SCHOOL OF MEDICINE Health Professions Programs

Degree programs (majors) in clinical laboratory science, cytotechnology, medical imaging technology, nuclear medicine technology, paramedic science, radiography, radiation therapy, and respiratory therapy are completed on the Indianapolis campus and administered by the Indiana University School of Medicine (IUSM) Health Professions Programs office. For advising assistance on the IU Bloomington campus, students should contact their freshman advisor or an advisor in HPPLC, Maxwell Hall 010, (812) 855-1873. The center produces detailed information sheets for the following IUSM Health Professions Programs (HPP) for IU Bloomington students and advises them through the application/admission process. Students are responsible for obtaining the most current information directly from the IUSM Health Professions Programs (HPP) section of the IUPUI Bulletin (bulletin.iupui.edu/2006/pdf/ medicine06.pdf). Please call the IU School of Medicine Health Professions Programs at (317) 278-4752 or e-mail askhpp@iupui.edu if you have any additional questions.

# **Admission to Degree Programs**

Admission requirements vary widely among the IUSM Health Professions Programs. Bloomington students take prerequisite courses on our campus for one to three years, depending on the program, to qualify for admission to these associate and bachelor degree programs. Once admitted, students must complete one or two years of professional study on the Indianapolis campus (IUPUI), which also includes a clinical practice component. Related programs are also available at IU Northwest, IU South Bend, IPFW (Fort Wayne), IU Kokomo, and IU Southeast.

Prerequisites include courses in general education and the professional concentration. Each program has specific minimum GPA requirements for admission, reflected in program-specific entries below. Students seeking admission to the associate and bachelor degree programs (with the exception of Respiratory Therapy) must earn a C or higher in all prerequisite courses. The actual average GPA for admitted students is almost always considerably higher than the listed minimums. For specific requirements, please refer to the IUSM HPP section of the IUPUI Bulletin and the HPPLC information sheets. For a list of prerequisite courses for these programs at IU Bloomington, please call (812) 855-1873 or consult the publications listed at www.hpplc.indiana.edu.

Because admission to professional programs in the IUSM Health Professions Programs is competitive and limited by the availability of clinical facilities, students completing preprofessional course requirements are not guaranteed admission to professional programs. Applicants must submit applications for the following programs directly to the IUSM Health Professions Programs. For specific deadline dates, please refer to the IUSM Health Professions Programs section of the IUPUI Bulletin.

## Freshman Year Course Work

During the freshman year students usually complete the following:

- English Composition: ENG-W 131 or alternate. See pp. 12–13.
- Verbal Communication: CMCL-C 121 or C 122
- Mathematics: See math course recommendations at the end of each of the program-specific entries.
- General Education: See recommended course lists at the end of each of the program-specific entries.

General education includes science courses such as chemistry, anatomy, physiology, biology, and physics. At least one humanities and two social and behavioral science courses are also included.

■ Elective Course(s): The amount of elective work varies with each program. Some programs recommend that you take specific courses to complete elective course work (*e.g.*, two business courses are required for Radiation Therapy).

Following is an alphabetical list of programs along with program descriptions.

## Clinical Laboratory Science (B.S.)

Clinical laboratory scientists sample and analyze blood, fluids, and body tissues to reveal abnormalities. They use sophisticated instruments and must be thoroughly knowledgeable about scientific principles and techniques relating to clinical laboratory medicine.

Minimum GPA required to apply: 2.500 CGPA with a 2.500 GPA in all mathematics and science courses. The actual average CGPA for admitted students is considerably higher. See your advisor for details.

Recommended courses for the first year: Choose from ENG-W 131; CMCL-C 121 or C 122; one humanities course<sup>2</sup>; two social and behavioral science courses<sup>2</sup>; MATH-M 119 or M 211; CHEM-C 117; BIOL-L 112 and L 113 (second term); a computer course<sup>2</sup>; CLAS-C 209.

# Cytotechnology (B.S.)

Cytotechnologists collect, inspect, and evaluate cells to detect cancer and other diseases. One of the primary objectives in this field is to discover cancer early, when the best chances for a complete cure exist.

Minimum GPA required to apply: 2.500 CGPA with a 2.500 GPA in all biology courses. The actual average CGPA for admitted students is considerably higher. Please see your advisor for more details.

Recommended courses for the first year: Choose from ENG-W 131; CMCL-C 121 *or* C 122; one humanities course<sup>2</sup>; two social and behavioral science courses<sup>2</sup>; one course from MATH-M 025 or higher; CHEM-C 101/C 121 and C 102/C 122 (*or* CHEM-C 117 and C 118); BIOL-L 112, L 113 (second term); computer course<sup>2</sup>, HPER-H 320.

# Medical Imaging Technology (B.S.)

Medical imaging technologists carry out advanced imaging procedures. Students must first complete the A.S. in Radiography or be A.R.R.T. certified with a minimum GPA of 3.000 in their radiography course work plus additional prerequisites with a minimum CGPA of 2.800. The actual average CGPA for admitted students is considerably higher. See your advisor for details.

<sup>&</sup>lt;sup>1</sup> The Respiratory Therapy program does not require all prerequisite courses to be completed with a grade of C or higher, only mathematics and science courses.

<sup>&</sup>lt;sup>2</sup> Please see your advisor for appropriate alternatives.

Recommended courses for the first year: Please see entry under "Radiography."

# **Nuclear Medicine Technology (B.S.)**

Nuclear medicine technologists assist physicians when radioactive materials are used to diagnose or treat disease. Nuclear medicine procedures fall into two categories: those performed totally within the patient (in vivo), and those performed on patient specimens in the laboratory (in vitro).

Minimum cumulative GPA required to apply: 2.800 CGPA with a 2.500 GPA in <u>all</u> mathematics and science courses. The actual average CGPA for admitted students is considerably higher. Please see your advisor for more details.

Recommended courses for the first year: Choose from ENG-W 131; CMCL-C 121 or C 122; PSY-P 101; social and behavioral sciences elective<sup>1</sup>; two math courses, or MATH-M 2112; computer course<sup>1</sup>; CHEM-C 101/C 121 and C 102/C 122; CLAS-C 209; humanities course<sup>1</sup>.

## Paramedic Science (A.S.)

Paramedics manage medical emergencies of acutely ill or injured patients using advanced life support equipment and ambulance services in pre–hospital care settings. These emergency care professionals provide a variety of life support interventions such as emergency medication administration, intravenous therapy, heart monitoring, artificial respiration, and the stable transportation of victims to hospitals.

Minimum GPA required to apply: 2.300. Students may apply for either spring or fall admission, depending upon when prerequisite courses will be completed. Careful planning will increase the likelihood that all admission prerequisites are completed during your first year (see a HPPLC advisor).

Recommended first-year courses include ENG-W 131; CMCL-C 121 or C 122; ANAT-A 215; PHSL-P 215; MATH-M 014 or higher; PSY-P 101; SOC-S 100. HPER-H 160 and HPER-H 401/H 404<sup>2</sup>, plus certification exams, will gain EMT certification, which is also required prior to beginning the professional course work.

# Radiation Therapy (B.S.)

Radiation therapy technologists treat patients who have benign and malignant tumors by administering the prescribed dose of ionizing radiation to specific sites on the patient's body as directed by a physician.

Minimum GPA required to apply: 2.500 CGPA with a 2.300 GPA in all prerequisite mathematics and science courses and a 2.500 GPA in stated prerequisite courses. The actual average CGPA for admitted students is considerably higher. See your advisor for details.

Recommended courses for the first year: ENG-W 131; CMCL-C 121 or C 122; PSY-P 101; MATH-M 025 and M 026 or MATH-M 119; PHYS-P 201; humanities course<sup>1</sup>; computer course<sup>1</sup>; CHEM-C 101/C 121; HPER-H 220 and H 320.

# Radiography (A.S.)<sup>3</sup>

Radiographers and graduates with a B.S. in Medical Imaging Technology use X rays, sound waves, radio frequencies, and computers to produce photographic images of body structures. These images provide physicians with information vital to the diagnosis and treatment of injuries and illnesses.

Minimum GPA required to apply: 2.800 CGPA with a 2.500 GPA in all mathematics and science courses. The actual average CGPA for admitted students is considerably higher. Please see your advisor for more details. Students who will complete the math (college algebra) and English composition courses in their freshman year should apply to the professional program in the fall semester of their freshman year.

Recommended courses for the first year: ENG-W 131; CMCL-C 121 *or* C 122; CLAS-C 209; social and behavioral science course<sup>1</sup>; MATH-M 014 or higher.

Additional courses (for future admission into the Medical Imaging Technology program): MATH-M 025 or M 119; CHEM-C 101 or C 117; PSY-P 101; PHYS-P 101 or P 201; humanities course<sup>1</sup>; computer course<sup>1</sup>.

# Respiratory Therapy (B.S.)

Respiratory therapists evaluate and treat patients with cardiopulmonary disorders. They care for all types of patients, from premature infants to the very old; practice in many settings, ranging from patients' homes to critical care units; and utilize a range of diagnostic procedures, from the physical exam to the use of sophisticated equipment.

Minimum GPA required to apply: 2.500 CGPA and a minimum grade of C in all math and science courses.

Recommended courses for the first year: ENG-W 131; CMCL-C 122 or C 121; two math courses<sup>1</sup>; CHEM-C 101/C 121, C 103 or C 117; ethics course<sup>1</sup>; HPER-F 150 or EDUC-P 314; PSY-P 101; computer course<sup>1</sup>; CLAS-C 209; HPER-H 220, H 160, or H 263; HPER-N 220 or N 231.

<sup>&</sup>lt;sup>1</sup> Please see your advisor for appropriate alternatives.

<sup>&</sup>lt;sup>2</sup> HPER-H 160 is required prior to the EMT courses (HPER-H 401/H 404). In addition to these IUB course options, other schools, hospitals, fire departments, and private businesses in Indiana offer EMT training. Visit HPPLC (Maxwell 010) to see a list of certified training programs.

<sup>&</sup>lt;sup>3</sup> Students may be admitted to this program directly from high school. Please see bulletin.iupui.edu/2006/pdf/medicine06.pdf for more information.

Credit Hours

# **Appendix**

#### ADVANCED PLACEMENT PROGRAM (AP) TEST INFORMATION

Subject	AP Score	Department or School	Course Credit	Credit Hours Received
Art: History Studio	5 3-4 5	Fine Arts	A 101/A 102 Undistributed <sup>1</sup> Undistributed <sup>1</sup>	(3-3) 6 3 5
Biology	4 5	Biology	E 112 E 111/E 112	3 6
Chemistry <sup>2</sup>	5	Chemistry	C 117	5
Computer Science: A AB	3-4-5 2-3 4-5	Computer Science	A 201 A 201 A 201/A 202	4 4 (4-4) 8
Economics: Micro Macro	4-5 4-5	Economics	E 201 E 202	3 3
English: Composition and Literature Language and Composition	4-5 <sup>3</sup>	English	L 198 (Literature)	3
Environmental Science	4-5	SPEA	E 272	3
Geography: Human Geography	3-5	Geography	G 110	3
Government: American Comparative	4-5 4-5	Political Science	Y 103 Y 107	3 3
History: American European World	4-5 4-5 4-5	History	H 105/H 106 H 103/H 104 W 100	(3-3) 6 (3-3) 6 3
French: <sup>4</sup> Language Literature	3 4-5 3 <sup>5</sup> 4-5 <sup>6</sup>	French/Italian	F 200 F 200/F 250 F 200/F 250 F 200/F 250	3 6 6 6
German: <sup>4</sup> Language	2 3 4 <sup>7</sup> 5 <sup>8</sup>	Germanic Studies	G 100 G 200/G 250 G 200/G 250 G 200/G 250	4 (3-3) 6 (3-3) 6 (3-3) 6
Latin: <sup>4</sup> Vergil Lyric	3 <sup>9</sup> 4-5 3 <sup>9</sup> 4-5	Classical Studies	L 100/L 150 L 200/L 250 & L 309 L 100/L 150 L 200/L 250 & L 304	8 (3-3-3) 9 8 (3-3-3) 9

<sup>&</sup>lt;sup>1</sup> Undistributed indicates that credit is not assigned to a specific course.

 $<sup>^2</sup>$  Students who earn test credit for C 117 are recommended to take S 117 (honors version of C 117) in the first semester or

C 341 (or S 341, the honors version of C 341) in the second semester after consultation with the Department of Chemistry. <sup>3</sup> Students with AP scores of 4 or 5 are exempted without credit from the first-level English composition course. Students who also earn a score of 660+ on the SAT Writing Test will receive 2 hours of special credit in W 143.

<sup>&</sup>lt;sup>4</sup> If you test into the 200 level or above and are a full-time student, 8 hours of credit for 100-level courses are automatically added to your transcript.

<sup>&</sup>lt;sup>5</sup> Students who continue studying French should take F 300.

<sup>&</sup>lt;sup>6</sup> Students who continue studying French should take F 300 unless they have permission from the department undergraduate advisor to skip this course.

<sup>&</sup>lt;sup>7</sup> Students who continue studying German are exempt from G 300 and should take G 330. No special placement credit is awarded above the G 250 level.

 $<sup>^8</sup>$  Students who continue studying German are exempt from G 300/G 330 and should take G 400. No special placement credit is awarded above the G 250 level.

<sup>&</sup>lt;sup>9</sup> 17 credit hours will be given to students who receive a score of 3, but only after they have completed L 305, L 307, or L 308 with a grade of C- or higher.

Subject	AP Score	Department or School	Course Credit	Credit Hours Received
Mathematics:		Mathematics		
Calculus AB	4-5		M 211	4
Calculus BC	4-5		M 211/M 212	(4-4) 8
Music	3	Music	Undistributed <sup>1</sup>	3
	4		Undistributed <sup>1</sup>	4
	5		Undistributed <sup>1</sup>	5
Physics:		Physics		
В	4	,	P 201	5
	5		P 201/P 202	(5-5) 10
C			,	(0 0) -0
Mechanics	4-5		P 221	5
Electricity and Magnetism	n 5		P 222	5
Psychology	4-5	Psychological and Brain Sciences	P 101	3
Spanish: <sup>2</sup>		Spanish/Portuguese		
Language	3	1 0	S 200	3
	4		S 200/S 250	(3-3) 6
	5		S 200/S 250/S 310	(3-3-3) 9
Literature	3		S 200	3
	4		S 200/S 250	(3-3) 6
	5		S 200/S 250/S 331	(3-3-3) 9
Statistics	4-5	Statistics	S 300	4

 $<sup>^{1}</sup>$  Undistributed indicates that credit is not assigned to a specific course.  $^{2}$  If you test into the 200 level or above and are a full-time student, 4 hours of credit for HISP-S 105 will be automatically added to your transcript.



History Professor David Pace meets with new students.

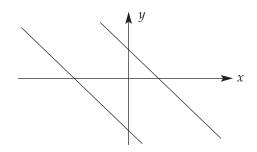
Photography by IU Photographic Services, IU School of Public and Environmental Affairs, Tyagan Miller, Owen Mundy, Annalese Poorman, Evelyn Tracy, and Nancy Webber.

#### SAMPLE PROBLEMS: MATHEMATICAL SKILLS ASSESSMENT TEST

- 1.  $(xy^3)^2 =$ (a)  $x^2 y^3$  (b)  $x^2 y^6$  (c)  $(xy)^6$  (d)  $x^2 y^5$ (e)  $(xy)^5$
- 2.  $\sqrt{3} (\sqrt{3} + 2) =$ (a)  $9 + 2\sqrt{3}$  (b) 5 (c)  $3 + 2\sqrt{3}$ (d)  $\sqrt{3} + 2\sqrt{3}$  (e) 11
- 3.  $\frac{x-3}{8} \frac{7}{4} = \frac{5}{8}$  has a solution of (a) 12 (b) -6 (c) 15 (d) 16 (e) 22
- 4. If  $x^2 + 2x = 3$ , then x could equal (a) -3 (b) -2 (c) -1 (d) 0 (e) 3
- 5.  $x^{3}(2x^{-2} + 4x) =$ (a)  $2x + 4x^{4}$  (b)  $2x^{-6} + 4x^{3}$  (c)  $2x^{5} + 4x^{4}$ (d) 2x + 4x (e)  $2x^{-5} + 4x^{4}$
- 6. When factored  $y^2 7y + 12 =$ (a) y(y-7) + 12 (b) y(y-7) + 5(c) (y+2)(y+6) (d) (y+3)(y+4)(e) (y-3)(y-4)
- 7.  $\frac{x}{5y} \div \frac{2x}{3y} =$ (a)  $\frac{3}{10}$  (b)  $\frac{2x^2}{15y^2}$  (c)  $\frac{x}{15y}$  (d)  $\frac{10}{3}$ (e)  $\frac{x+3y}{2x+5y}$
- 8.  $\frac{5}{x} \frac{3}{2y} =$ (a)  $\frac{2}{2xy}$  (b)  $\frac{2}{x+2y}$  (c)  $\frac{10x-3y}{2xy}$ (d)  $\frac{5x-6y}{2xy}$  (e)  $\frac{10y-3x}{2xy}$
- 9. If  $f(x) = \frac{x+3}{5-x}$ , then f(a+4) =(a)  $\frac{a+7}{1-a}$  (b)  $\frac{a+7}{9-a}$  (c)  $\frac{38-6a}{5-a}$ (d)  $\frac{23-3a}{5-a}$  (e)  $\frac{a+7}{5-a}$
- 10. Which are factors of  $x^2 3x + 2$ ?

  (I) x + 1 (II) x 2 (III) x 3(a) I only (b) II only (c) III only (d) I and II only (e) II and III only
- 11.  $\frac{8}{4x-16} \cdot \frac{x^2-16}{2x} =$ (a) 1 (b)  $\frac{x-4}{x}$  (c) x+4 (d)  $\frac{8x^2-16}{4x-32x}$  (e)  $\frac{x+4}{x}$

- 12.  $32^{(2/5)} + 16^{(1/4)} =$  (a)  $48^{(1/10)}$  (b) 4 (c) 6 (d) 8 (e) 84/5
- 13. The two parallel lines represent the graphs of which of the following pair of equations?

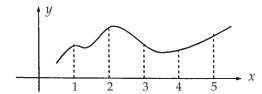


- (a) x 2y = 3 and x 2y = 7(b) x + y = 1 and x + y = -2(c) x + y = 3 and 2x + 2y = 6(d) x + y = 3 and x - y = 5(e) x - y = 7 and x - y = 14
- 14.  $\left(\frac{u^2v^{-3}}{2w}\right)^{-2} =$ (a)  $\frac{u^4w^2}{4v^6}$  (b)  $\frac{u^6}{4v^6w^2}$  (c)  $\frac{4w^2v^6}{u^4}$  (d)  $\frac{4u^4v^6}{w^2}$ (e)  $\frac{u^4v^6}{4v^2}$
- 15. If a(x + b) = bx c then x =(a)  $\frac{ab + c}{a + b}$  (b)  $\frac{b + c}{b a}$  (c)  $\frac{ab + c}{b a}$  (d)  $\frac{b c}{b a}$ (e)  $\frac{b + c}{a + b}$
- 16. Let  $f(x) = x^2 kx + 1$ . If f(2) = 3, then k = (a) 4 (b) -1 (c) 1 (d) 2 (e) 3
- 17. For any x, |x-7| =(a) x-7 (b) |7-x| (c) |x+7| (d) -x-7(e) |-(x+7)|
- 18. If  $7^x = 3$  then x =(a) 3/7 (b) 7/3 (c)  $\log_3(7)$  (d)  $\log_7(3)$ (e)  $\log_{10}(3/7)$
- 19.  $\log_6 4 + \log_6 9 =$ (a) 2 (b)  $\log_6 (13)$  (c) 13/6 (d) 78
  (e)  $\log_6 (4/9)$

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#### SAMPLE PROBLEMS: MATHEMATICAL SKILLS ASSESSMENT TEST, CONTINUED

20. Definition: A function is increasing on the interval [a, b] if and only if  $f(x_1) < f(x_2)$  whenever  $x_1 < x_2$ , where  $x_1$  and  $x_2$  are any numbers in [a, b].



The function *f*, pictured in the graph above is increasing on the interval

- (a) [1, 2] (b) [2, 3] (c) [3, 4]
- (d) [4, 5]
- (e) none of these

- 21. Given a rectangle with sides of length *x* and width y. Suppose the length x is doubled and the width y is halved. The new perimeter is
  - (b) (2x)(y/2)(a) 4x + y(c) 2x + (y/2)
  - (d)  $x^2 + y$  (e)  $x^2 + (y/2)$

#### ANSWERS TO SAMPLE PROBLEMS

- 1. (b) 2. (c) 3. (e) 4. (a) 5. (a) 6. (e)
- 7. (a) 8. (e) 9. (a) 10. (b) 11. (e)
- 12. (c) 13. (b) 14. (c) 15. (c) 16. (c)
- 17. (b) 18. (d) 19. (a) 20. (d) 21. (a)

#### SAMPLE PROBLEMS: CALCULUS ADVANCED PLACEMENT EXAM

- 1.  $\lim_{x \to 1} \frac{7x^2 9x + 2}{-2x^3 + x^2 + x} =$
- $2. \lim_{\theta \to 0} \frac{\theta \tan \theta}{\sin^2 \theta} =$
- 3.  $\frac{d}{dx} \left[ \sqrt{x^4 + 1} + \ln(x^2 + 1) \right] =$
- 4. Let  $f(x) = x/(x^2 + 2)$ . Find the intervals on which f(x)is increasing. Find the intervals on which f(x) is decreasing.
- 5. Let  $f(x) = x(\ln x \sqrt{x})$ . Find the inflection points of f(x).
- 6. The radius of a spherical balloon is changing at a rate of -1.25 inches per second. Find the rate of change in the volume at the moment that the volume is  $288\pi$  cubic inches.
- 7. The height, *h*, of a rectangle is related to its base, *b*, by  $h = b^3 - 4b^2 + 4b$ . Find the value of b which will give the largest rectangular area.
- 8.  $\int x \sec^2(x^2 + 5) dx =$
- 9.  $\int \frac{e^{\sqrt{x}}}{\sqrt{x}} dx =$
- 10.  $\int_{-2}^{-2} \frac{1}{2x+1} dx =$

- 11.  $\int_{1}^{2} \frac{t}{(2t-1)^3} dt =$
- 12. Find the area of the region enclosed by the curves  $y = x^2 + 4$  and x + y = 6.
- 13. Find the volume of the solid obtained by revolving the region enclosed by the curves y = x + 3 and  $y = x^2 + 1$  about the x-axis.
- 14. If y is given by  $dy/dx = -4xy^2$  and y = 1/4 when x = 0, find y when  $x = \sqrt{2}$ .

#### ANSWERS TO SAMPLE PROBLEMS

- 1. -5/3 2. 1 3.  $\frac{2x^3}{\sqrt{x^4+1}} + \frac{2x}{x^2+1}$
- 4. f(x) is increasing for  $-\sqrt{2} < x < \sqrt{2}$ ; f(x) is decreasing for  $x < -\sqrt{2}$  and for  $x > \sqrt{2}$ .
- 5. x = 16/9 6.  $-180\pi in^3/sec$  7. b = 1
- 8.  $(1/2) \tan(x^2 + 5) + C$  9.  $2e^{\sqrt{x}} + C$  10.  $\ln(\sqrt{3/5})$
- 11. 5/18 12. 9/2 13.  $117\pi/5$  14. y = 1/8

# **WEB SITES OF INTEREST TO IUB STUDENTS**

#### STUDENT SUPPORT

Academic Advising—University Division

www.iub.edu/~udiv

Academic Support Center

www.indiana.edu/~acadsupp/ASChome.shtml

**Admissions** 

www.admit.indiana.edu

**Bureau of Evaluation Studies and Testing** 

www.indiana.edu/~best

Bursar

www.indiana.edu/~blbursar

Career Development Center (CDC)

www.indiana.edu/~career

**Center for English Language Training** 

iep.indiana.edu

**Counseling and Psychological Services (CAPS)** 

healthcenter.indiana.edu/caps

**Dean of Students** 

www.dsa.indiana.edu/dos.html

**Disability Services for Students** 

www.dsa.indiana.edu/dss.html

Exploratory Student Resources—

**University Division** 

www.iub.edu/~udiv/html/explore.html

**Health Professions and Prelaw** 

**Information Center** 

www.indiana.edu/~udivhpp

Hoosier Help (H20)

www.h2o.iub.edu

Indiana University— Bloomington campus

www.iub.edu

**International Admissions** 

www.admit.indiana.edu/international/welcome

**International Services** 

www.indiana.edu/~intlserv

**Orientation Programs** 

www.indiana.edu/~orient

**Overseas Study** 

www.indiana.edu/~overseas

Registrar

www.indiana.edu/~registra

**Student Financial Assistance** 

www.iub.edu/~sfa

**Student Academic Center** 

www.indiana.edu/~sac

**Student Advocates** 

www.dsa.indiana.edu/adv.html

#### **ACADEMIC UNITS**

**College of Arts and Sciences** 

www.indiana.edu/~college

**Kelley School of Business** 

www.bus.indiana.edu

**Continuing Studies** 

www.indiana.edu/~scs

Education

www.education.indiana.edu

Health, Physical Education,

and Recreation

www.hper.indiana.edu

Informatics

www.informatics.indiana.edu/academics

**Journalism** 

www.journalism.indiana.edu

**Labor Studies** 

www.labor.iu.edu

**Medicine Health Professions Programs** 

msa.iusm.iu.edu/hpp

**Jacobs School of Music** 

www.music.indiana.edu

**Nursing** 

www.indiana.edu/~iubnurse

**Optometry** 

www.opt.indiana.edu

**Public and Environmental Affairs** 

www.indiana.edu/~speaweb

**Social Work** 

www.socialwork.iu.edu