

- 582. Mentor Program Year II**
Fall, Spring, 1(0-2) A student may earn a maximum of 2 credits in all enrollments for this course.
P: Completion of 3 credits of HM 581. R: Open only to graduate-professional students in College of Human Medicine.
Continuing exploration of the dimensions of being a physician, professional skills needed to interact with patients and medical workers, and current trends in field.
- 591. Special Problems in Human Medicine**
Fall, Spring, Summer, 1 to 34 credits. A student may earn a maximum of 36 credits in all enrollments for this course.
R: Graduate-professional students in College of Human Medicine.
Work under the direction of a faculty member on an experimental, theoretical, or applied problem that requires a broad, interdisciplinary approach.
- 605. Comprehensive Care Clerkship**
Fall, Spring, Summer, 18 credits. Interdepartmental with Family Practice.
P: FMP 602. R: Open only to graduate-professional students in College of Human Medicine.
Comprehensive and longitudinal management of patients in ambulatory care settings.
QA: HM 605
- 608. Sub-Specialty Clerkships**
Fall, Spring, Summer, 4 to 12 credits. A student may earn a maximum of 12 credits in all enrollments for this course.
P: FMP 602. R: Open only to graduate-professional students in College of Human Medicine.
Hospital-and office-based clinical experiences in sub-specialties in medicine and surgery.
QA: HM 608
- 691. Research Clerkship**
Fall, Spring, Summer, 2 to 6 credits. A student may earn a maximum of 6 credits in all enrollments for this course.
P: HM 690 or approval of community research director. R: Open only to graduate-professional students in College of Human Medicine.
Biological, behavioral, or clinical research project.
QP: HM 690 QA: HM 690

- 300. Experimental Approaches to Foods**
Spring, 3(2-3)
P: HNF 200, CEM 143. R: Open only to Dietetics and Human Nutrition majors. Not open to students with credit in FSC 401.
Effects of various treatments on chemical and physical properties of carbohydrates, proteins, lipids and other constituents of foods. Effects of changes in chemical and physical properties on functional and sensory attributes of foods.
QP: HNF 200, CEM 143 QA: HNF 300
- 311. Principles of Human Nutrition**
Spring, 3(3-0)
P: BCH 200.
A human ecological approach to identification, function and food sources of nutrients required by humans. Normal metabolism. Effects of deficiencies or excesses of specific nutrients on metabolism.
QP: BCH 200 QA: HNF 411
- 350. Food and the Consumer**
Fall, 3(3-0)
P: HNF 200; EC 201 or EC 202; ML 302 or concurrently.
Introduction to consumer behavior relative to food and food services. Food consumption and expenditure trends. Factors influencing food consumption and expenditures. Consumer advocacy and consumerism.
QP: HNF 200, EC 201, ML 302 or CONCURRENTLY
- 375. Community Nutrition**
Fall, 3(3-0)
P: HNF 150 or HNF 311.
Dietary and anthropometric assessment of population groups. Policies, programs and resources available to address community nutritional needs.
QP: HNF 102 QA: HNF 375
- 379. Basic Nutritional Counseling**
Spring, 3(2-3)
P: HNF 150 or HNF 311. R: Not open to freshmen. Open only to students in Department of Food Science and Human Nutrition.
Interviewing. Medical records and dietary history. Assessment of nutritional status. Planning, implementing, and evaluating nutritional programs. Quality assurance. Professional ethics.
QP: HNF 102 or HNF 411 QA: HNF 379

- 440. Foodservice Operations**
Fall, 3(3-0)
P: HNF 150 or HNF 311; HNF 200. R: Not open to freshmen and sophomores.
Principles, processes and control strategies in foodservice operations. Menu planning, procurement, and on-premise storage and issue. Production, consumer distribution, safety and sanitation.
QP: HNF 200 or HNF 102 or HNF 411 QA: HNF 440
- 441. Management of Foodservice Operations**
Spring, 2(2-0)
P: CPS 100 or CPS 130 or CPS 131; HNF 440; MGT 310 or concurrently. R: Not open to freshmen and sophomores.
Fiscal management of human and material resources in food service operations. Application of manual and electronic data processing strategies to analyze and control costs.
QP: HNF 440 QA: HNF 441
- 444. Computerized Foodservice Management Laboratory**
Spring, 1(0-3)
P: CPS 100 or CPS 130 or CPS 131; HNF 441 or concurrently. R: Open only to majors in Dietetics, Foods: Technology and Management, Human Nutrition, and Nutritional Sciences.
Use of prototype foodservice management software for inventory management, recipe adjustment, recipe and menu pre-costing, nutrient analysis, cost analysis, and other foodservice applications.
QP: HNF 440 QA: HNF 441
- 445. Foodservice Management Experience**
Spring, 2 credits.
P: HNF 441 or concurrently; MPH 205. R: Open only to seniors in Dietetics and graduate students in Human Nutrition. Approval of department.
Receipt, storage, preparation and service of foods. Safety and sanitation. Design, layout, and care of equipment. Costing. Meal tickets required. Offered half of semester.
QP: HNF 440, MPH 200 or MPH 301 QA: HNF 440P
- 450. Contemporary Cases from the Food Industry**
Spring, 3(3-0)
P: HNF 350. R: Open only to seniors in the Department of Food Science and Human Nutrition.
Analysis and interpretation of the consumer environment. Development of effective strategies and policies for the food industry. Case study approach.
QP: ML 300, ML 302 QA: HNF 415
- 460. Advanced Human Nutrition**
Fall, 5(5-0)
P: BCH 200 or BCH 401; HNF 150 or HNF 311; PSL 250.
Metabolism of carbohydrates, proteins, fats, vitamins, and minerals as related to dietary requirements and disease processes in humans. Recommended dietary allowances of nutrients. Metabolism of nutrients. Food sources of nutrients.
QP: BCH 200, PSL 241 or PSL 432 QA: HNF 461, HNF 462
- 463. Nutrition and Human Development**
Fall, 3(3-0)
P: HNF 460 or concurrently.
Role of nutrients in anatomical, physiological, and biochemical processes as related to human growth and development. Nutrition throughout the life cycle. Nutritional assessment and programs.
QP: HNF 462 QA: HNF 463
- 470. Clinical Nutrition and Dietetics**
Spring, 4(3-12)
P: BCH 200 or BCH 401; HNF 460; PSL 250 or PSL 431. R: Not open to freshmen and sophomores.
Anatomical, physiological and biochemical changes associated with diseases. Nutritional assessment. Use of modified diets as adjuncts to other therapies.
QP: HNF 462 QA: HNF 470, HNF 470P

HUMAN NUTRITION AND FOODS HNF

Department of Food Science and Human Nutrition College Of Human Ecology

- 150. Introduction to Nutrition and Food Science**
Fall, Spring, Summer, 3(3-0) Interdepartmental with Food Science.
Nutrition needs in life stages from a human ecological perspective. Domestic and international factors affecting the availability of a safe, nutritious food supply. Relationships of food choices to health and disease.
QA: HNF 102, FSC 101
- 200. Physical and Chemical Properties of Foods**
Fall, 3(2-2)
P: CEM 141 or concurrently.
Interrelationships between basic physical and chemical principles and food preparation: composition, methods of preparation, meal planning, evaluation, quality standards and comparative analysis.
QP: CEM 141 QA: HNF 200
- 220. Basic Skills in Dietetic Practice**
Spring, 2(1-2)
P: CPS 100 or CPS 130 or CPS 131; HNF 150 or HNF 311; STT 200 or STT 201. C: STT 201 or R: Not open to freshmen. Open only to students in the Department of Food Science and Human Nutrition.
Evaluation and communication of scientific and consumer information. Sources of reliable food and nutrition information. Statistics. Nutritional epidemiology, nutrient composition, and computer diet analysis.
QP: HNF 102 or HNF 200 or FSC 101, CPS 100 or CONCURRENTLY QA: HNF 290

- 400. Art and Science of Food Preparation**
Spring, 1 credit.
P: HNF 200.
Art and science of food preparation in relation to cost, health, and historical, regional, ethnic, and religious customs. Product evaluation using sensory techniques. Offered half of semester.
QP: HNF 200 QA: HNF 406L
- 404. Food Product Development**
Fall, 4(3-3)
P: FSC 401 or HNF 300. R: Not open to freshmen and sophomores.
Functions of proteins, carbohydrates, and fats, and their interactions with other food ingredients. Objective and sensory food evaluation techniques.
QP: HNF 300 or FSC 333 QA: HNF 403, HNF 404
- 406. Sociocultural Aspects of Food**
Spring, 3(3-0)
R: Not open to freshmen and sophomores. One ISS "B" course option or concurrently.
Factors impacting food consumption from a human ecological perspective. International and national food consumption patterns. Geographic, political, and economic aspects of food consumption. Food availability and distribution. Family structure, taboos, religion, and food related health problems.
QA: HNF 406
- 410. Sensory Assessment of Foods**
Spring, 2(1-2)
P: STT 200 or STT 201 or STT 315 or STT 421 or STT 464; HNF 200 or FSC 401. R: Open only to majors in Department of Food Science and Human Nutrition.
Discriminative, consumer and descriptive methods used to evoke, measure, analyze, and interpret sensory reactions to food characteristics.
QP: STT 201 or STT 315 or STT 422 QA: HNF 310

Descriptions—Human Nutrition and Foods of Courses

473. Interpretation of Clinical Laboratory Tests in Dietetics
Fall, 3(3-0)

P: HNF 460 or concurrently.
Principles, procedures and interpretation of clinical laboratory tests. Interrelationships of nutrition and the biological sciences. Relationships of test results to total nutritional care.
QP: HNF 462 QA: HNF 473

480. Concepts of Human Nutrition Research Methods
Spring, 2(1-3)

P: HNF 311 or HNF 460; FSC 455. R: Open only to seniors and graduate students. Approval of department.
Issues and techniques involved in nutrition research with humans and animals. Guided laboratory experience plus independent project.
QP: HNF 411 or HNF 461, HNF 462, FSC 455

490. Independent Study

Fall, Spring, Summer. 1 to 10 credits. A student may earn a maximum of 10 credits in all enrollments for this course.
R: Open only to juniors and seniors. Approval of department.
Individual study of selected topics in foods, foodservice management or nutrition.
QA: HNF 495

490H. Honors Independent Study

Fall, Spring, Summer. 1 to 10 credits. A student may earn a maximum of 10 credits in all enrollments for this course.
R: Not open to freshmen and sophomores. Open only to honors students. Approval of instructor.
Individual study of selected topics in foods, foodservice management or nutrition.
QA: HNF 400H

494. Practicum

Fall, Spring, Summer. 1 to 10 credits. A student may earn a maximum of 10 credits in all enrollments for this course.
R: Open only to majors in Department of Food Science and Human Nutrition. Approval of department.
Professional experience in selected settings and organizations under faculty supervision.
QA: HNF 498

840. Human Nutrition and Chronic Diseases

Fall of odd-numbered years. 3(3-0)
R: Open only to graduate students in Food Science, Human Nutrition, and Nursing.
Dietary intervention and treatment of chronic diseases: obesity, cardiovascular disease, diabetes, gastrointestinal disorders and cancer.
QP: HNF 462, BCH 401

843. Community Nutritional Assessment
Spring, 3(2-2)

R: Open only to graduate students in Food Science, Human Nutrition, and Nursing.
Nutritional assessment of population groups in community settings. Interpretation of national and international health data.
QP: HNF 462, CEP 905 or DEPT APPROVAL

890. Supervised Individual Study

Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 6 credits in all enrollments for this course.
R: Open only to graduate students in Food Science and Human Nutrition. Students are limited to a combined total of 10 credits in HNF 890 and HNF 894.
Faculty supervised study of nutrition areas of individual interest.
QP: HNF 462 QA: HNF 813A, HNF 813B, HNF 813C

891. Topics in Human Nutrition (MTC)

Fall, Spring, Summer. 1 to 3 credits. A student may earn a maximum of 12 credits in all enrollments for this course.
R: Open only to graduate students.
Current topics in applied and basic human nutrition.
QA: HNF 840

892. Nutrition Seminar

Fall, Spring, 1(1-0) A student may earn a maximum of 6 credits in all enrollments for this course.
Presentations by students on current topics in nutrition.
QA: HNF 800

894. Human Nutrition Practicum

Fall, Spring, Summer. 1 to 6 credits. A student may earn a maximum of 6 credits in all enrollments for this course.
R: Open only to graduate students in Food Science and Human Nutrition. Students are limited to a combined total of 10 credits in HNF 890 and HNF 894. Approval of department.
Experience in agencies or offices related to Human Nutrition. Field experience required.
QP: HNF 462

899. Master's Thesis Research

Fall, Spring, Summer. 1 to 10 credits. A student may earn a maximum of 20 credits in all enrollments for this course.
R: Open only to masters students in Human Nutrition and Foods.
QA: HNF 899

935. Nutrition: Lipid and Carbohydrate Metabolism

Fall of even-numbered years. 3(3-0) Interdepartmental with Animal Science.
R: Open only to graduate students in Food Science, Human Nutrition, Animal Science, and Nursing, and to graduate-professional students.
Regulatory aspects of lipid and carbohydrate metabolism as influenced by nutritional status.
QP: BCH 452, HNF 462 or ANS 313A QA: HNF 935

938. Nutrition: Metabolism and Function of Vitamins

Spring of even-numbered years. 3(3-0) Interdepartmental with Animal Science.
R: Open only to graduate students in Food Science, Human Nutrition, Animal Science, and Nursing, and to graduate-professional students.
Regulatory roles of vitamins at cellular and molecular levels.
QP: BCH 453, ANS 313A or HNF 462 QA: HNF 938

999. Doctoral Dissertation Research

Fall, Spring, Summer. 1 to 24 credits. A student may earn a maximum of 50 credits in all enrollments for this course.
R: Open only to doctoral students in Human Nutrition and Foods.
QA: HNF 999

INTEGRATIVE STUDIES IN ARTS AND HUMANITIES IAH

College of Arts and Letters

201. United States and the World (D)

Fall, Spring, 4(4-0)
R: Designated score on English placement test or completion of a Tier I writing course. Concurrent registration in writing tutorial required for students receiving 1.0 or 1.5 in Tier I writing course.
Major issues in development of US society and culture, presented in international and comparative context. Influences from native Americans, Europeans, Africans, and Asians. Organized historically, with thematic emphasis on literature and the arts.
QP: ATL XX2 or ENG 101 or MC 112 or ENG 104 or LBS 131 QA: HST 122, HST 133

211A. Area Studies and Multicultural Civilizations: Africa (I)

Spring, 4(4-0)
P: IAH 201.
Arts and humanities of Africa: literature, art, music, religion and philosophy presented in historical context. Selected regions, cultures, and themes. Variable by term.
QA: HUM 295

211B. Area Studies and Multicultural Civilizations: Asia (I)

Fall, Spring, 4(4-0)
P: IAH 201.
Arts and humanities of Asia: literature, visual arts, music, religion and philosophy presented in historical context. Selected regions, cultures, and themes. Variable by term.
QA: HUM 296, HUM 297, HUM 298

211C. Area Studies and Multicultural Civilizations: The Americas (D)

Fall, Spring, 4(4-0)
P: IAH 201.
Arts and humanities of the Americas: literature, visual arts, music, religion and philosophy presented in historical context. Selected regions, cultures, and themes. Variable by term.

211D. Area Studies and Multicultural Civilizations: The Middle East (I)

Fall, 4(4-0)
P: IAH 201.
Arts and humanities of the Middle East: literature, visual arts, music, religion and philosophy presented in historical context. Themes variable by term.
QA: HUM 294

221A. Great Ages: The Ancient World (I)

Fall, Spring, 4(4-0)
P: IAH 201.
Arts and humanities of the ancient world examined through the frame of urban and intellectual life. Literature, visual arts, music, religion and philosophy presented in historical context. Selected regions and themes, variable by term.
QA: HUM 201, HUM 202

221B. Great Ages: The European Renaissance

Fall of odd-numbered years. 4(4-0)
P: IAH 201.
Arts and humanities of Renaissance Europe: literature, visual arts, music, religion and philosophy presented in historical context. Selected themes, variable by term.

221C. Great Ages: The Modern World (I)

Fall, Spring, 4(4-0)
P: IAH 201.
Arts and humanities of the modern world, examined through the frame of urban and intellectual life. Literature, visual arts, music, religion and philosophy presented in historical context. Selected regions and themes. Variable by term.
QA: HUM 203, HUM 204

231A. Themes and Issues: Human Values and the Arts and Humanities

Fall, Spring, 4(4-0)
P: IAH 201.
Values of individualism, responsibility, love, community, and rationality. Students are introduced to diverse methods and materials from the arts and humanities.

231B. Themes and Issues: Moral Issues and the Arts and Humanities

Fall, Spring, 4(4-0)
P: IAH 201.
Human conflict and moral dilemmas, addressed through diverse methods and materials from the arts and humanities.

231C. Themes and Issues: Roles of Language in Society (D)

Fall, Spring, 4(4-0)
P: IAH 201.
Language as the medium of culture in various societies. Power and social identity as manifested through language. Students are introduced to diverse methods and materials from the arts and humanities.

241A. Creative Arts and Humanities: Music and Society in the Modern World (D)

Fall of even-numbered years. 4(4-0)
P: IAH 201.
The arts and humanities of the modern world through the prism of music. Music traditions and methodologies in their historic context. Relationship of music creativity to societies in which it has been produced.