#### ECED: EARLY CHILDHOOD EDUCATION

#### ECED 5010 Student Teaching – Inclusive ECED

0-20-5

Prerequisites: Consent of the departmental Student Teaching Committee; Corequisite: ECED 5020. Guided professional experience in an elementary grade (P-5). Student teachers practice teaching and managing a classroom under the supervision of a full-time master teacher and university supervisor in an off-campus setting. The experience includes observations, participation, teaching, and other activities, which make a direct contribution to an achievement of basic concepts, skills, and principles in the teaching-learning process. A minimum of 20 contact hours per week is required in the school for the entire semester.

#### ECED 5020 Seminar – Inclusive ECED

1-0-1

Prerequisites: Consent of the departmental Student Teaching Committee; Corequisite: ECED 5010. This seminar is a forum for discussion and exchange of ideas relating to the responsibilities of professional ethical practices. Topics include direct intervention issues, advocacy, collaboration, diversity and any others that arise during student teaching.

#### ECED 7210 Assessment in Early Childhood Education

3-0-**3** 

A study of the role of assessment in early childhood education. Students examine alternative evaluation strategies for individual developmental and academic assessment of young children. Emphasis is placed on assessment of appropriate curriculum and programs in early childhood education. Computer software to support the assessment strategies will be incorporated.

#### ECED 7220 Early Childhood Environments

2-2-3

Principles for planning and implementing appropriate programs and learning environments for young children are presented. Program alternatives and models in early childhood education are presented. The integration of computer technology in supporting appropriate programs for young children will be included. Students will plan and implement changes in a classroom environment to address the principles examined in the course.

#### ECED 7320 Early Childhood Curriculum

3-0-**3** 

Study of basic principles, issues, and considerations of curriculum development in early childhood education. Emphasis will be placed on implications of child development to curriculum and issues, information and suggestions for bridging between curriculum theory and practice. Societal elements and conditions impacting early childhood curriculum, such as diverse populations, community mores and values, multicultural populations, and anti-bias principles, will be explored.

#### ECED 7330 Issues and Trends in Early Childhood Education

3-0-3

Examination of research, trends, and problems in early childhood education with special reference to professional ethics, professional mentoring, and the etiology of various delivery systems for early childhood education programs. An action research plan relevant to the setting in which the student is employed is initiated.

# ECED 7410 The Social Sciences in Early Childhood Education

3-0-**3** 

A study of the influence of the social sciences in early childhood education. The content, curriculum, and implementation of the social studies program are examined. The application of interdisciplinary knowledge from related fields such as sociology, psychology, health services, special education, history, philosophy, and anthropology to social learning is explored. Relevant computer software to support the social science curriculum in early childhood will be included. The student will plan and implement curricular improvement based on theory and practice examined in the course.

# ECED 7420 Child, Family, and Society

2-0-2

Examination of the research and dominant theories of human development and sociocultural development within the context of the family, community, and society. Strategies for collaboration between home and school will be emphasized, and interagency cooperation within the community will be examined in relation to the benefits for young children and their families. The student will investigate a variety of community agencies serving children and families to enhance and apply an understanding of community resources which support the education of young children.

# ECED 7430 Integrating Math, Science, and Technology in Early Childhood Education

3-0-**3** 

Explores the integration of curriculum in math, science, and technology. Special emphasis is placed on the utilization of inquiry methods for enhancing children's ability to analyze, to evaluate, and to make inferences from oral, written, and visual materials. Methodology for developing the skills of problem solving, decision making, and critical and creative thinking skills is explored. The use of computer technology to enhance the math, science, and technology curriculum will be included. The student will plan and implement curricular improvement based on theory and practice examined in the course.

# ECED 7540 Children, Play, and Development

3-0-**3** 

Focus on the definitions and the characteristics of play as a basis for understanding cultural and gender differences and similarities in children's play, the multiple stages of play by developmental age, play in special populations, and the relationship of play to intellectual, social, physical, and emotional development. Field based observations and experiences with multiple ages of children as they engage in play is included.

#### ECED 7550 The Integrated Early Childhood Curriculum

3-0-3

In depth investigation of developmentally appropriate ECE integrated curricula which employ a holistic philosophy of ECE. Principles and processes of integrated curriculum development will be examined.

#### ECED 8200 Theoretical Models in Early Childhood Education

3-0-**3** 

**Prerequisite: RSCH 8000.** An examination of the major theoretical models that influence early childhood education. The contributions to early childhood education of various perspectives will be examined, particularly constructivism, sociolinguistics, and psycholinguistics.

#### ECED 8230 Mentoring and Advocacy in Early Childhood Education

2-0-**2** 

An overview of the knowledge, understandings, and skills necessary to assume mentoring and advocacy roles in various capacities in early childhood education. Emphasis is given to the development of early childhood advocates who establish programs and policy that significantly and positively impact the young children, families, and communities with whom they work. Professional ethics and the development of mentoring strategies are integral parts of this course.

#### ECED 8300 Area Studies in ECE Curriculum and Instruction

3-0-3

A critical analysis of the current status of innovations and trends for curriculum development in various subject fields. Patterns of organization and techniques for curriculum development are examined and evaluated. Recognition is given to the impact of a multidimensional curriculum on planning, teaching, and learning.

# ECED 8330 Design and Evaluation of Quality Programs in ECE

3-0-3

A study of the issues related to designing and evaluating quality programs in early childhood education. Related research is examined regarding programs and educational environments for children from diverse cultural and socio-economic backgrounds as well as differing ages and developmental levels, including children with special needs.

# ECED 8410 Special Topic: Early Childhood Education Today

3-0-3

An interdisciplinary approach to the study of the historical, philosophical, sociological, and anthropological perspectives and influences on contemporary early childhood education.

#### ECED 8420 Special Topic: International Perspectives in ECE

3-0-**3** 

Directed readings in international perspectives in early childhood education. Emphasis is placed on the international impact of contemporary early childhood education and research on young children in early childhood settings and programs throughout the world.

#### ECED 8998 Applied Research Project

2-0-**2** 

Supervised development and investigation of a research problem in early childhood education.

#### **EDUC: EDUCATION**

# **EDUC 8010 Reflective Teaching Practices Seminar**

3-0-3

**Graded "Satisfactory" or "Unsatisfactory."** Introductory course for a six-course sequence of core classes for the Educational Specialist degree. National Board for Professional Teaching Standards are used for the candidates' self-assessment of professional goals that are based upon an understanding and application of a master teacher as leader. This course provides the basis for an individual program of study by identifying appropriate guided electives.

# **EDUC 8020 Using Assessment and Research Data**

3-0-**3** 

**Prerequisite: EDUC 8010.** Techniques for establishing reliable and valid data sources for student, classroom, and school-improvement decisions. Students learn how to utilize technology tools for educational management.

#### **EDUC 8030 Developing and Leading a Community of Diverse Learners**

3-0-**3** 

**Prerequisite: EDUC 8010.** Examination of the impact of cultural, multicultural, diversity, and exceptionality issues on adults' and children's relationships, communication, and educational practices in American schools. Appropriate verbal and nonverbal communication techniques are addressed.

#### EDUC 8040 Strategic Planning for School Reform

3-0-**3** 

**Prerequisite: EDUC 8010.** Study of major theories and practices in the development and evaluation of school-based programs, including curricular, co-curricular, and staff development initiatives for the improvement of student learning.

#### **EDUC 8050 Action Research**

3\_0\_3

**Prerequisite: EDUC 8010.** Practical action research utilized for the purpose of school reform and student achievement; an examination of the reflective roles of the classroom teacher and how reflection may lead to school improvement.

#### EDUC 8880 Capstone Seminar

3-0-**3** 

Prerequisites: EDUC 8010, EDUC 8020, EDUC 8030, EDUC 8040, EDUC 8050. Capstone course resulting in a portfolio demonstrating candidates' analysis of teaching, leadership, and mentoring. Analysis is based on the Nkational Board Standards, educational specialist degree goals, professional development program plan designed in EDUC 8010, and candidates' school-improvement plans.

Most credit notations on the far right are in the pattern 3-0-3. The first number is the number of lecture hours (or equivalent) each week; the second number is the number of laboratory hours (or equivalent) each week; the third number, **in bold**, is the number of semester hours credit.

#### **ENGL: ENGLISH**

An English Department course, numbered 4000 or above, which may be taken at the graduate level with appropriate adjustments agreed on by the student and the professor.

An introduction to the fields and methods of research and writing in graduate literary study.

An introduction to the role and function of literary criticism in the context of literary studies.

A focused survey in the area of British literature to 1500, with special emphasis on themes, genres, and/or figures. Attention will be given to cultural background and/or critical perspec-

A focused survey in the area of British literature from 1500-1660, with special emphasis on themes, genres, and/or figures. Attention will be given to cultural background and/or critical

A focused survey in the area of British literature from 1660-1800, with special emphasis on

ENGL 6000 Graduate Option

tive.

perspective.

and/or critical perspective.

ENGL 7000 Approaches to Graduate Study

ENGL 7010 Approaches to Critical Theory

ENGL 7110 Studies in British Literature to 1500

ENGL 7120 Studies in British Literature 1500-1660

ENGL 7130 Studies in British Literature 1660-1800

3-0-**3** 

3-0-**3** 

3-0-**3** 

3-0-3

3-0-**3** 

3-0-**3** 

themes, genres, and/or figures. Attention will be given to cultural background and perspective.	or critical
ENGL 7140 Studies in British Romantic Literature	3-0- <b>3</b>
A focused survey in the area of Romantic literature, with special emphasis of	n themes,
genres, and/or figures. Attention will be given to cultural background and/or critical	al perspec-
tive.	
ENGL 7145 Studies in Victorian Literature	3-0- <b>3</b>
A focused survey in the area of Victorian literature, with special emphasis on them and/or figures. Attention will be given to cultural background and/or critical personal contents of the property of the contents of the property of the property of the contents of the property of the pr	, 0
ENGL 7150 Studies in Modern and Contemporary British Literature	3-0- <b>3</b>
A focused survey in the area of modern and contemporary literature, with special	emphasis
on themes, genres, and/or figures. Attention will be given to cultural background	ınd and/or
critical perspective.	
ENGL 7210 Studies in American Literature to 1800	3-0- <b>3</b>
A focused survey in the area of American literature to 1800, with special emphasis on	
themes, genres, and/or figures. Attention will be given to cultural background and perspective.	or critical
ENGL 7220 Studies in American Literature 1800-1865	3-0- <b>3</b>
A focused survey in the area of American literature from 1800 to 1865, with speci	ial empha-
sis on themes, genres, and/or figures. Attention will be given to cultural background	ınd and/or
critical perspective.	
ENGL 7230 Studies in American Literature 1865-1914	3-0- <b>3</b>
A focused survey in the area of American literature from 1865 to 1900, with special empha-	
sis on themes, genres, and/or figures. Attention will be given to cultural backgroucritical perspective.	and/or
ENGL 7240 Studies in Modern and Contemporary American Literature	3-0- <b>3</b>

A focused survey in the area of modern and contemporary American literature, with special emphasis on themes, genres, and/or figures. Attention will be given to cultural background

ENGL 7300 Studies in Special Topics	3-0- <b>3</b>
A focused survey in a selected topic, with special emphasis on themes,	
figures. Attention will be given to cultural background and/or critical perspe	
ENGL 7320 Studies in Genre	3-0- <b>3</b>
A focused survey in genre studies, with special emphasis on themes, genres,	
Attention will be given to cultural background and/or critical perspective.	una, or rigures.
ENGL 7600 Studies in Rhetoric and Composition	3-0- <b>3</b>
A focused survey in the area of rhetoric and/or composition theory.	303
ENGL 8110 Seminar in British Literature to 1500	3-0- <b>3</b>
A seminar in the area of British literature to 1500.	300
ENGL 8120 Seminar in British Literature 1500-1660	3-0- <b>3</b>
A seminar in the area of British literature from 1500-1660.	300
ENGL 8130 Seminar in British Literature 1660-1800	3-0- <b>3</b>
A seminar in the area of British literature from 1660-1800.	303
ENGL 8140 Seminar in British Romantic Literature	3-0- <b>3</b>
A seminar in the area of Romantic literature.	
ENGL 8145 Seminar in Victorian Literature	3-0- <b>3</b>
A seminar in the area of Victorian literature.	300
ENGL 8150 Seminar in Modern and Contemporary British Literature	3-0- <b>3</b>
A seminar in the area of modern and contemporary literature.	300
ENGL 8210 Seminar in American Literature to 1800	3-0- <b>3</b>
A seminar in the area of American literature to 1800.	
ENGL 8220 Seminar in American Literature 1800-1865	3-0- <b>3</b>
A seminar in the area of American literature from 1800 to 1865.	
ENGL 8230 Seminar in American Literature 1865-1914	3-0- <b>3</b>
A seminar in the area of American literature from 1865 to 1900.	
ENGL 8240 Seminar in Modern and Contemporary American Literature	3-0- <b>3</b>
A seminar in the area of modern and contemporary American literature.	
ENGL 8300 Seminar in Special Topics	3-0- <b>3</b>
A seminar within the area of language and/or literature.	
ENGL 8320 Seminar in Genre	3-0- <b>3</b>
A seminar in genre studies.	
ENGL 8600 Seminar in Rhetoric and Composition	3-0- <b>3</b>
A seminar in the area of rhetoric and/or composition theory.	
ENGL 8690 Workshop in Rhetoric and Composition	1-0- <b>1</b> to 6-0- <b>6</b>
Writing-intensive and leadership course for teachers that promotes writing-	
subject areas and grade levels. Participants write for personal and profess	
research composition theory, and design a lesson based on their experience.	
program provides nine Staff Development Units or six hours of master's deg	
course requires formal application and interview into the South Georgia W	
Graduates from this program also participate in at least two programs, eithe	
school or the South Georgia Writing Project over the course of the following	
ENGL 8700 Directed Study	3-0- <b>3</b>
Research in selected areas of language and literature.	
ENGL 8800 Seminar for Teaching Assistants	1-0-1
A seminar for graduate students currently teaching composition courses.	
ENGL 8999 Thesis	3-0- <b>3</b> to 6-0- <b>6</b>
Individualized study and research in preparation for a work of fifty or more pages demon-	
strating competent and substantial research coupled with an innovative ap	pproach to the
subject matter. May be repeated for credit.	

# FLED: FOREIGNLANGUAGE EDUCATION

Methods of teaching English at both the elementary- school and secondary-school levels to students whose first language is not English. Review of theories of second language acquisition, instructional strategies and materials, methods of evaluating proficiency and progress,

3-0-**3** 

3-0-3

FLED 6800 Methods and Materials for Teaching ESOL

curriculum, and professional organizations and resources.

FLED 7100 Professional Development Seminar I	2-0- <b>2</b>	
Through interaction with peers and education professionals, students perform se	lf-assess-	
ment, determine areas of skill and knowledge in need of improvement, and design an effective		
career growth and development plan, as a preliminary step in expanding and modif		
personal teaching strategies.		
FLED 7500 Theory and Practice in Second Language Acquisition	2-0- <b>2</b>	
Discussion, analysis, and practice of the various theories and models of second-	-language	
acquisition.		
FLED 7600 Research and Design	3-0- <b>3</b>	
Research in foreign language education with emphasis on curricula and curriculum	ı develop-	
ment, current research, and current reform in foreign language education, including	g national	
standards, and their application to the design of innovative instructional tools.		
FLED 7800 Professional Development Seminar II	2-0- <b>2</b>	
A capstone experience requiring students to reflect upon their teaching experience		
interactions with peers, secondary education professionals and other educator		
content area. The preparation and presentation of a portfolio reflecting their stude	ent teach-	
ing experience is required.		
FREN: FRENCH		
FREN 5410 Francophone Literature	3-0- <b>3</b>	
Selected works of twentieth-century Francophone writers from the French-speak		
munity outside of France, especially the Caribbean, Africa, and Quebec.	ing com	
FREN 5610 Women Writers of Seventeenth-Century France	3-0- <b>3</b>	
Selected literary works of major women writers of seventeenth-century France.		
FREN 5630 Topics in French Language or Literature	1-0-1	
Intensive study to improve the student's ability in a particular area of French lan	nguage or	
Francophone literature. This course requires independent work of the student and may be		
repeated with different topics for a total of 3 hours.	•	
FREN 6400 French Phonetics and Advanced Conversation		
FREN 0400 French Phonetics and Advanced Conversation	3-0- <b>3</b>	
	3-0- <b>3</b>	
Study of phonetic principles and their applications.	3-0- <b>3</b>	
Study of phonetic principles and their applications.  FREN 6410 French Composition and Advanced Grammar	3-0- <b>3</b>	
Study of phonetic principles and their applications.	3-0- <b>3</b>	
Study of phonetic principles and their applications.  FREN 6410 French Composition and Advanced Grammar  Advanced study of grammar, practical composition, and refinement of written ex	3-0- <b>3</b> apression. 3-0- <b>3</b>	
Study of phonetic principles and their applications.  FREN 6410 French Composition and Advanced Grammar  Advanced study of grammar, practical composition, and refinement of written ex  FREN 6420 French Translation: English to French	3-0- <b>3</b> apression. 3-0- <b>3</b>	
Study of phonetic principles and their applications.  FREN 6410 French Composition and Advanced Grammar  Advanced study of grammar, practical composition, and refinement of written ex  FREN 6420 French Translation: English to French  Translation techniques from English to French, including idiomatic expressions a	3-0- <b>3</b> apression. 3-0- <b>3</b>	

Study in an area or topic of Francophone literature or the French language not normally found in established courses offered by the department. The work is done under the super-

FREN 6950 Directed Study

vision of a professor.

#### GEOG: GEOGRAPHY

# GEOG 5020 Geoscience Perspectives on Global Climate Change 1-0-1 Also offered as GEOL 5020. Study of global climate change from the perspective of the geoscientist. Topics include whether or not global climate change is occurring, possible

geoscientist. Topics include whether or not global climate change is occurring, possible causes of global climate change, climate change in the geologic record, implications of climate change on the human population, and proposed methods and policies designed to limit or reverse processes believed to lead to global climate change.

# GEOG 5050 Computer Cartography and Image Analysis

2-2-3

An introduction to digital production of general and thematic maps. Lectures and laboratory exercises cover principles of cartography and remote sensing as well as the manipulation and visualization of spatial data and imagery.

# **GEOG 5051 Introduction to Geographic Information Systems**

2-2-3

An examination of geographic information systems, including methods of capture, storage, analysis, and display of spatially-referenced data. Laboratory exercises provide experience with typical GIS operations and applications.

# **GEOG 5052 Advanced Geographic Information Systems**

2-2-3

Advanced applications of GIS including: overlay analysis, writing short macros for repetitive operations, spatial modeling and technical support of complex land use and natural resource management decision making. Laboratory exercises designed to form a cartographic and software portfolio for students.

# **GEOG 5053** Application Issues in Geographic Information Systems

3-0-**3** 

Operational and planning issues in GIS. Students will learn which issues need to be considered when proposing and implementing a GIS and will have opportunities to evaluate how a GIS can be used to solve specific planning problems.

# GEOG 5100 Regional Planning and Environmental Management

3-0-**3** 

Introduction to planning for economic development, service provision and resource management at scales larger than municipalities with an emphasis on the environmental impacts of planning policy and regulation.

#### GEOG 5150 Meteorology and Climatology

3-0-**3** 

A detailed examination of atmospheric motions and climatic controls including, the Earth's radiation and energy balance, air mass dynamics, weather systems, and past and present climates of the Earth.

#### GEOG 5200 History of Life

2-3-**3** 

**Also listed as GEOL 5200.** Principles of paleontology with emphasis on the history of life including vertebrates. Includes an account of the outstanding forms of life from the beginning of earthtime to the present, and those paleontologically significant groups that are uncommon, different, or extinct today.

#### GEOG 5210 An Introduction to Hydrology

3-2-4

**Also listed as GEOL 5210**. An introduction to surface and subsurface hydrology, examining components of the hydrologic cycle. Topics include local and global water balance, precipitation, interception and infiltration, runoff, stream flow, water storage, and groundwater. This course makes use of some mathematical equations.

#### GEOG 5300 An Introduction to Process Geomorphology

3-3-**4** 

**Also listed as GEOL 5300.** An introduction to process geomorphology examining land-forms and their formative processes. Topics include weathering and slope, fluvial, coastal, aeolian, glacial and periglacial processes, and the application of soils to geomorphology. This course makes use of some mathematical equations. Field trip required.

# GEOG 5310 Physiography of North America

3-0-**3** 

The physiographic description, including the landforms, soils, structural framework, climate, plant and animal geography, natural resources, and the unique environmental problems of each major physiographic province of the United States and Canada, including Alaska, Hawaii, and Puerto Rico.

# GEOG 5320 Geomorphology of Fluvial and Coastal Environments

3-0-**3** 

An examination of processes and landforms in fluvial (river) and coastal environments. Fluvial topics include channel geometry and pattern, characteristics of flow, sediment load, bedforms, and floodplains. Coastal topics include the study of waves and tides, coastal sediment transport, beaches, and the effects of changing sea level. This course makes use of some mathematical equations.

# **GEOG 5410 Cultural Geography**

3-0-**3** 

A study of the Earth as the home of humankind, emphasizing the spatial and functional complexes of human geography. Topics to be considered are population, settlement form, settling processes, resources, and economic, political, and societal organizations.

# **GEOG 5510 Urban Community Planning**

3-0-**3** 

Principles and applications of planning for neighborhoods, towns and cities with an emphasis on the United States. Topics covered include: public services, land-use decision making, economic development, growth management and the role of non-government organizations.

#### **GEOG 5610 Economic Geography**

3-0-**3** 

A study of area variations in human economic activities as related to production exchange, and consumption of economic goods and services. Emphasis is placed on location of economic activities and related theories.

# GEOG 5710 Environmental Soil Science

3-3-4

Also listed as GEOL 5710. Prerequisites: CHEM 1211K; GEOG 1113K or GEOL 1121K. Soil properties, distribution and classification, factors of soil formation, and the relationships among soils, geomorphology, and the environment, stressing analysis and use of soils and soil databases for proper urban, agricultural, and environmental land use.

#### **GEOG 5810 Introduction to Biogeography**

3-0-3

An overview of spatial and temporal patterns in the distributions of plant and animal species across the Earth's surface. Topics covered include ecosystem dynamics, biodiversity, competition and predation, interpreting past life, effects of climate change, and effects of community disturbances.

## **GEOG 5910 European Geography**

3-0-**3** 

A survey of European geography, with a special emphasis on the European Union. Topic areas covered include physical, economic, political, and cultural geography of Europe.

#### GEOG 5920 Geography of the Middle East

3-0-**3** 

A survey of the nations of the Middle East, with a special emphasis on the Arab-Israeli conflict. Topic areas covered include physical, economic, political, and cultural geography of the Middle East.

# GEOG 6700 Field Methods in Environmental Geography

2-4-4

Study of field techniques and field problems in physical geography. Course includes class-room presentations, field projects, field trips, and writing technical reports.

#### GEOG 6800 Internship in Environmental Geography

0-6-3 to 0-12-6

A supervised, practical experience using physical geography skills in an appropriate organization. Provides the student with an opportunity to apply skills learned during pursuit of environmental geography degree to real world situations. (Graded on an S/U basis).

# GEOG 6900 Special Topics in Geography

1-0-1 to 4-4-6

Topic to be assigned by instructor; the course may be repeated more than once if the topics are different.

# GEOG 6990 Directed Study in Geography

1-0-**1** to 4-4-**6** 

Study in area or subject not normally found in established courses offered by the department; may also allow students to explore in more detail and/or depth an area or subject covered by the department.

#### GEOL: GEOLOGY

#### **GEOL 5010 Environmental Geology**

2-2-3

The application of basic geologic principles and techniques to problems in land-use planning, resource management, waste disposal, conservation, energy plant sitings, under-and-above-ground construction, subsidence, construction in seismic areas, slope-stability, urban development and other problems resulting from human interaction with the geological habitat.

# **GEOL 5020** Geoscience Perspectives on Global Climate Change

1-0-1

**Also offered as GEOG 5020.** Study of global climate change from the perspective of the geoscientist. Topics include whether or not global climate change is occurring, possible causes of global climate change, climate change in the geologic record, implications of climate change on the human population, and proposed methods and policies designed to limit or reverse processes believed to lead to global climate change.

#### **GEOL 5050 Oceanography**

3-0-**3** 

The physical, chemical, geological, and biological characteristics of the ocean and the interactions between the hydrosphere, lithosphere, atmosphere, and biosphere.

# GEOL 5100 Principles of Mineralogy/Petrology

2-3-**3** 

An introduction to mineral and rock identifications, and the study of the genesis, occurrence, and uses of common minerals and rocks. Laboratory consists of identification of common rocks and minerals.

#### **GEOL 5101 Mineralogy**

3-3-4

The classification, identification, and crystallography of the principal rock-forming minerals, silicate and non-silicate; and the introduction of the use of the petrographic microscope in the study of the crystallography and identification of minerals.

#### GEOL 5102 Petrology and Petrography

3-3-4

Genesis, classification, and properties of igneous, metamorphic, and sedimentary rocks. Laboratory includes the use of analytical methods, hand specimens, and thin-section study with the petrographic microscope, and the macroscopic and microscopic properties of important rock types.

#### **GEOL 5200 History of Life**

2-3-**3** 

**Also listed as GEOG 5200**. Principles of paleontology with emphasis on the history of life including vertebrates. Includes an account of the outstanding forms of life from the beginning of earthtime to the present, and those paleontologically significant groups that are uncommon, different, or extinct today.

#### GEOL 5210 An Introduction to Hydrology

3-2-**4** 

**Also listed as GEOG 5210**. An introduction to surface and subsurface hydrology, examining components of the hydrologic cycle. Topics include local and global water balance, precipitation, interception and infiltration, runoff, stream flow, water storage, and groundwater. This course makes use of some mathematical equations.

# **GEOL 5220 Invertebrate Paleontology**

2-2-3

Identification, classification, and natural history of major groups of invertebrates preserved as fossils in the geologic record, with special attention to those forms commonly encountered in the southeastern United States. Emphasis in laboratory will include taxonomic affinities and functional morphology. Saturday (optional) field trips will be scheduled to local areas of interest.

# **GEOL 5230 Vertebrate Paleontology**

2-2-**3** 

Geologic history and evolution of animals with backbones, with coverage of extinct groups such as the Dinosauria.

#### GEOL 5250 Micropaleontology

2-2-3

The classification, stratigraphic relationships, and methods of study of microfossils with emphasis on the stratigraphically important groups.

#### GEOL 5300 An Introduction to Process Geomorphology

3-3-4

**Also listed as GEOG 5300.** An introduction to process geomorphology examining land-forms and their formative processes. Topics include weathering and slope, fluvial, coastal, aeolian, glacial and periglacial processes, and the application of soils to geomorphology. This course makes use of some mathematical equations. Field trip required.

#### **GEOL 5410 Structural Geology**

2-2-3

Structural features of the rocks, such as folds, faults, joints, cleavage, and primary structures, including their origin, classification, analyses and economic relationships. A study of tectonic plate motion is included. Laboratory work includes depth and thickness problems, structure sections, and structure contour maps.

#### GEOL 5450 Field Methods in Geology

2-4-4

An introduction to the basic tools and techniques used in preparation of topographic and geologic maps, and profiles and cross-sections. Includes uses of plane table, alidade, brunton compass, and aerial photographs.

# **GEOL 5500 Principles of Geochemistry**

3-2-4

The application of chemical principles to study of geological and environmental processes. Course emphasis is on understanding processes that influence the chemistry of water, sediment, and soil. Specific topics include aqueous solutions, thermodynamics, mineral-water equilibria, oxidation-reduction reactions, and radiogenic and stable isotopes. Laboratory component of the course is field-based.

#### **GEOL 5710** Environmental Soil Science

3-3-4

**Also listed as GEOG 5710. Prerequisites: CHEM 1211K; GEOG 1113K or GEOL 1121K.** Soil properties, distribution and classification, factors of soil formation, and the relationships among soils, geomorphology, and the environment, stressing analysis and use of soils and soil databases for proper urban, agricultural, and environmental land use.

# **GEOL 6110 Principles of Stratigraphy**

3-0-**3** 

The interrelationships of stratigraphy, sedimentation, and paleogeography; methods in stratigraphy and correlation.

# GEOL 6900 Special Topics in Geology

1-0-1 to 4-4-6

Topics to be assigned by instructor; may be taken more than once if topics are different; up to a total of 6 credit hours.

#### GEOL 6950 Directed Studies in Geology

1-0-1 to 4-4-6

Study of subjects not normally found in established courses offered by this department; may also allow students to explore in more detail and/or depth subjects covered by this department, up to a maximum of 6 credit hours.

# **HIST: HISTORY**

The history of Ancient Egypt and Mesopotamia, with emphasis on political structures, social

A study of major trends in European history from the Peace of Westphalia to the Enlightenment. Cultural, social, and political achievements of European countries will be stressed.

A study of major developments in Europe from the Enlightenment through the defeat of

A survey of the leading developments of the period in Europe, including social and national-

A survey of the lost generation living in a society broken and disillusioned by World War I.

A study of European domestic and international affairs since 1945 with emphasis upon the

3-0-3 each

3-0-3

3-0-**3** 

3-0-**3** 

HIST 5030/5040/5050/5060/5070/5080/5090 Special Topics in History

Napoleon. The impact of the French Revolution will be emphasized.

istic trends. Emphasis is placed on factors leading to World War I.

Selected themes of historical and contemporary interest.

**HIST 5201 The Ancient Near East** 

HIST 5207 Europe, 1815-1914

HIST 5208 Europe, 1914-1945

HIST 5209 Europe Since 1945

maior states

present time.

institutions, and cultural developments.

HIST 5206 Revolutionary Europe, 1750-1815

HIST 5205 Europe in the Age of Louis XIV, 1648-1750

major states.	
HIST 5301 England to 1603 3-0-3	
The English people from early times to the advent of the Stuarts with emphasis on the	
growth of political, social, economic, and cultural institutions.	
HIST 5302 England Since 1603 3-0-3	
England and Great Britain in the period of the seventeenth through the twentieth centuries,	
emphasis being given to social, economic, and imperial development.	
HIST 5303 English Constitutional History 3-0-3	
A study of the development of English judicial and governmental institutions from the	
Anglo-Saxon period to the present.	
HIST 5401 Czarist Russia to 1917 3-0-3	
Russian history from the founding of the nation until the Revolutions of 1917 and the fall of	
the Romanov Dynasty.	
HIST 5402 The Soviet Union and Afterward 3-0-3	
A study of Russia's history as part of the Soviet Union, 1917-1989, and following the Soviet	
Union's breakup.	
HIST 5500 German History, 1700-1945 3-0-3	
An in-depth study of German history from the rise of Brandenburg-Prussia to the fall of	
Nazi Germany. Topic areas include social, political, intellectual, cultural, diplomatic, and	
gender history.	
HIST 5502 Topics in German History 3-0-3	
An in-depth study into the history and historiographical and philosophical debates of a	
particular issue or period in German history. May be repeated for credit.	
HIST 6100 United States Constitutional History 3-0-3	
Development of American constitutionalism from its origins in England and colonies to the	

# HIST 6105 European Ethnicity in American History

3-0-**3** 

A study of European immigration to the United States during the 19th and 20th centuries. The course will examine the reason why Europeans came to American, the problems they faced in the assimilation process, and the contributions they made to the growth of the United States.

#### HIST 6106 Socialism and Anarchism, 1815-1933

3-0-**3** 

A comparative study of the socialist and anarchist movements in Europe and the United States from the end of the Napoleonic era to the beginning of the era of World War II. A major focus of this course will be how these movements were transmitted to the U.S. by European immigrants. Also examined is how these movements attempted to offer an alternative to capitalism and the problems brought on by industrialization, revolution, and global conflict.

#### HIST 6201 Colonial America to 1789

3-0-**3** 

A study of English, French, and Hispanic cultures in America to 1789. Included are the American Revolution, the creation of the United States, and the establishment of a permanent government under the United States Constitution.

# HIST 6202 United States, 1789-1850

3-0-**3** 

A study of United States history from the Washington administration through the Compromise of 1850, focusing on political, cultural, social, and economic developments.

#### HIST 6203 United States, 1850-1877

3-0-**3** 

A study of United States history from the Compromise of 1850 to the end of Reconstruction. Focuses on the sectional crisis of the 1850s, the Civil War, and the Reconstruction process after the war.

# HIST 6204 United States, 1877-1921

3-0-**3** 

A study of United States history from the end of Reconstruction to the end of the Wilson administration. Emphasizes diplomatic, ethnic, cultural, political, and social developments.

# HIST 6205 United States, 1921-1945

203

A study of United States history from the end of World War I to the end of World War II. Focuses on the "Roaring '20s," the Great Depression, and U.S. involvement in World War II.

#### HIST 6206 United States Since 1945

3-0-3

A study of United States history since World War II with emphasis on political, cultural, social, and economic developments and the nation's foreign relations.

#### HIST 6207 United States Diplomacy to 1921

3-0-**3** 

A study of United States foreign relations from the Revolutionary period through 1921.

# HIST 6208 United States Diplomacy since 1921

3-0-**3** 

A study of United States foreign relations since 1921.

#### HIST 6211 Georgia History through 1865

3-0-**3** 

A study of Georgia's history from its occupation by the earliest Indians through the Civil War, with attention to the state's development in its regional, national, and international context. Satisfies the Georgia History legislative requirement.

#### HIST 6212 Georgia History since 1865

3-0-**3** 

A study of Georgia's history from the Civil War to the present, with attention to the state's development in its regional, national, and international context. Satisfies the Georgia History legislative requirement.

# HIST 6220 Local History

3-0-**3** 

A study of the methodology of local history research and writing. The course examines aspects of South Georgia history as a means of providing the student with an opportunity to apply the methodology.

#### HIST 6221 The Old South

3-0-3

A detailed study of the social, economic, cultural, and intellectual life of the colonial and antebellum South, with consideration of the influence of slavery.

#### HIST 6222 The New South

3-0-**3** 

A history of the South since the Civil War, with special attention to political, social, economic, and cultural developments, as well as the problems of southern blacks after emancipation.

# HIST 6231 African American History to 1865

3-0-3

The history of African-Americans from their origin in Africa to the end of slavery in the U.S., with emphasis on their economic life and social thought.

# HIST 6232 African American History Since 1865

3-0-3

The history of the African-American struggle for equality after emancipation, with special focus on the problems of black leadership from Frederick Douglass to the present.

#### HIST 6240 American Social History

3-0-**3** 

Analysis of the major trends in religion, culture, social structures, and social groups in the United States from the Colonial Era until the present. Particular attention is paid to the experiences of the various ethnic groups making up the American people.

# HIST 6250 History of Religion in the South

3-0-3

Overview of general religious patterns and their influence on southern society, with particular attention to mass religious movements such as the Great Awakening, Great Revival, Mission/Antimission Movement, Confederate Religion, African American Religion, Holiness/Pentecostalism, the Charismatic Movement, and the rise of the Religious Right. The course also will focus on the origins and development of the major denominations in the South.

#### HIST 6261 Women in the U.S. to 1869

3-0-**3** 

A study of United States history from the perspective of women. Includes social, cultural, political, intellectual, and economic aspects of the nation's history, and more specifically, the ways women influenced and were influenced by various events and movements in U.S. history from the Colonial period to 1869.

#### HIST 6262 Women in the U.S., 1869 to the Present

3-0-**3** 

A study of United States history from the perspective of women. Includes social, cultural, political, intellectual, and economic aspects of the nation's history, more specifically, the ways women influenced and were influenced by various events and movements in U.S. history from 1869 to the present.

#### HIST 6270 History of Women in the U.S. South

3-0-**3** 

A study of the history of the U.S. South from women's perspectives. An examination of the contributions of women to southern social, cultural, and political developments, and of the ways in which gender, class, and race influence women's regional identity.

#### HIST 6280 History of U.S. Women Activists and Social Reformers

3-0-**3** 

An examination of women activists and reformers at different periods in U.S. history, of the issues that have motivated women to activism and reform efforts, and of the ways women have contributed to, influenced, and been influenced by various social movements in U.S. history

# HIST 6290 U.S. Military History

3-0-**3** 

A study of military experiences and issues in American history from the Colonial Era to the present. The course analyzes war, its economic issues, technological developments, politics, and other factors that have influenced military aspects of American history.

# HIST 6291 U.S. Political History I

3-0-3

A study of U.S. political history to 1877. Special emphasis will be placed on national elections and the parties and issues that have influenced American political history.

# HIST 6292 U.S. Political History II

3-0-3

A study of U.S. political history from 1877 to the present. Special emphasis will be placed on national elections and the parties and issues that have influenced American political history.

# **HIST 6301 Colonial Latin America**

3-0-3

The founding, growth, and development of Latin America by Spain and Portugal to the wars of independence.

# HIST 6302 Republican Latin America

3-0-**3** 

Major historical trends in Latin America since the wars of independence.

#### **HIST 6303** The Spanish Borderlands

3-0-**3** 

Political, military, and social developments of Spain's borderlands from Virginia to California, 1513-1821.

# HIST 6304 The Caribbean

3-0-**3** 

Political, economic, social, and cultural developments of the major Caribbean countries, 1492 to the present.

#### HIST 6401 East Asia

3-0-**3** 

An analysis of the principal historical and cultural developments in China, Japan, and Korea, with special emphasis upon the interactions of those nations among themselves, their responses to western culture, and their roles in regional and world affairs.

#### HIST 6402 Asia in the Modern World

3-0-**3** 

A general overview of the role of Asia in the contemporary world, with special reference to such phenomena as geography, population trends, cultural diversity, and regional and world interactions of the Asian nations.

#### HIST 6403 The Indian Subcontinent

3-0-3

An analysis of the 5000-year-old culture of the Indian subcontinent and Sri Lanka, with major emphasis upon the indigenous religions of the region and the impact of western culture and Christianity. Other topics considered are population, caste, the family, village life, government organization, the impact of British rule, and the independence movements that led to the establishment of the independence of India, Sri Lanka, and Bangladesh.

#### HIST 6404 History of the Vietnam War

3-0-**3** 

An exploration of the many interrelated aspects of the conflict in Vietnam. Topics include French colonization, Ho Chi Minh and Vietnamese nationalism, the 1946-1954 war between the French and the Vietninh, the Cold War policies of the United States, escalating United States intervention in Vietnam, the United States's war in Vietnam (1965-1973), the fall of Saigon, domestic opposition to the war within the U.S.A., and postwar legacies of the conflict.

#### **HIST 6500 History of the Middle East**

3-0-3

Overview of the political, religious, and cultural history of present-day Egypt, Sudan, Ethiopia, Israel, Lebanon, Syria, Iran, Turkey, Saudi Arabia, and the states of the Arabian peninsula from the birth of Mohammed to the present. Particular attention is paid to the beliefs, structure, and influence of religious groups, particularly Muslims.

#### **HIST 6511 Precolonial Africa**

3**-**0**-3** 

An analysis of the 8000-year-old cultures of the Nile Valley, including Egypt, Nubia, and Kush; West Africa and its contacts with the Middle East and Europe; the East African city-states and their contacts with India.

#### HIST 6512 Modern Africa

3-0-**3** 

An examination of the European colonization of Africa and the African response. The course also examines the emergence of African nationalism and the problems of creating new states.

# HIST 6810 Internship in History

3-0-3 to 9-0-9

**Graded "Satisfactory" or "Unsatisfactory.** Supervised practical experience related to the discipline of history in an appropriate agency, combined with a program of academic work. The number of credit hours granted in dependent on the nature of the program, the hours worked, and the academic program approved in advance. A maximum of 9 hours will be awarded for HIST 6810.

# HIST 7000 Seminar in Historiography

3-0-3

A seminar focusing on the history of historical writing from the ancient world to the present. Topics covered include major themes, schools of thought, methods of research, and the writings of influential historians.

HIST 7101/7102/7103 Seminars in United States History	3-0- <b>3 each</b>
Seminars on selected topics in the history of the United States.	
HIST 7201/7202 Seminars in English History	3-0-3 each
Seminars on selected topics in English history.	
HIST 7301/7302 Seminars in European History	3-0-3 each
Seminars on selected topics in European history.	
HIST 7401/7402 Seminars in Latin American History	3-0-3 each
Seminars on selected topics in Latin American history.	
HIST 7501/7502 Seminars in Asian History	3-0-3 each
Seminars on selected topics in Asian history.	
HIST 7600 Seminar in African History	3-0- <b>3</b>
Seminar on selected topics in African history	
HIST 7700 Seminar in Middle Eastern History	3-0- <b>3</b>
Seminar on selected topics in Middle Eastern history.	
HIST 7800 Seminar in Women's History	3-0- <b>3</b>

# Seminar on selected topics in Women's history. **HIST 7950 Directed Study in History**

3-0-**3** 

Supervised readings in areas of history not normally available in regular graduate course offerings, with regular conferences between instructor and student.

#### HIST 7970 Libraries and Literacy in History

3 credit hours

**Also offered as MLIS 7970.** An exploration of the development of reading, writing, and information management from the proto-literate stages of the ancient Near East to the present computer age. Intellectual foundations of research and librarianship will be emphasized in their historical contexts.

HIST 7999 Thesis 6-0-6

Most credit notations on the far right are in the pattern 3-0-3. The first number is the number of lecture hours (or equivalent) each week; the second number is the number of laboratory hours (or equivalent) each week; the third number, **in bold**, is the number of semester hours credit.

#### INTL: INTERNATIONAL PROGRAMS

# INTL 5000 Foreign Exchange

0-0-0

A course for foreign students enrolled at VSU under official exchange agreements of the University.

# INTL 5170 Topics in International/Intercultural Studies

1-0-**1** to 3-0-**3** 

Special topics in international studies include on-campus experiences, seminars, workshops such as the National Model United Nations program, and the courses offered in conjunction with the Focus lecture series each spring. May be repeated for credit.

#### INTL 5500 Study Abroad

0-0-**0** to 3-6-**3** 

**Prerequisite:** Acceptance to a VSU study abroad program. Courses for students studying abroad on VSU-approved programs. Students must have written approval from the Center for International Programs and relevant academic units to register for these courses. The number of credit hours granted is dependent on the nature of the program. Faculty supervisors in relevant departments will be responsible for assigning credit and reporting grades.

# INTL 5501 Study Abroad

0-0-**0** to 3-6-**3** 

**Prerequisite:** Acceptance to a VSU study abroad program. Courses for students studying abroad on VSU-approved programs. Students must have written approval from the Center for International Programs and relevant academic units to register for these courses. The number of credit hours granted is dependent on the nature of the program. Faculty supervisors in relevant departments will be responsible for assigning credit and reporting grades.

# INTL 5502 Study Abroad

0-0-**0** to 3-6-**3** 

**Prerequisite:** Acceptance to a VSU study abroad program. Courses for students studying abroad on VSU-approved programs. Students must have written approval from the Center for International Programs and relevant academic units to register for these courses. The number of credit hours granted is dependent on the nature of the program. Faculty supervisors in relevant departments will be responsible for assigning credit and reporting grades.

#### ITED: INSTRUCTIONAL TECHNOLOGY

#### ITED 7000 Technologies for Teaching and Learning

3-0-**3** 

3-0-3

Exploration and application of tools and techniques to support education, academic productivity, and professional development. Includes legal and ethical issues related to technology.

#### ITED 7040 Thinking and Learning with Computers

Exploration of computer applications as cognitive tools for engaging and enhancing thinking in learners. Examines the theoretical, pedagogical and practical reasons for using computers as thinking tools.

#### ITED 7050 Distance Education

3-0-**3** 

Introduction to distance education technologies and their utilization as instructional delivery systems.

# ITED 7070 Decision-Oriented Research and Evaluation

3-0-**3** 

Introduction to field-based research and evaluation issues and methodologies. The course covers problem identification, sources of data, communication with clients, legal and ethical considerations, use of data for decision making, and research and evaluation techniques, including action research.

# ITED 7080 Technology and Learning Standards

3-0-**3** 

Integration of technology into learning environments with an emphasis on matching technology with instructional approaches, content, student needs, and assessment to meet Georgia QCC standards.

#### ITED 7100 Foundational Theories in Instructional Technology

3-0-**3** 

Introduction to theories of learning, instruction, communication, information, and systems as applied to research and practice in the field of instructional technology. Includes presentation skills and instructional techniques.

#### ITED 7200 Information Resources I

3-0-**3** 

Introduction to information sources including Internet and databases, search strategies, information retrieval, access issues, legal and ethical issues, and evaluation of information.

#### ITED 7201 Information Resources II

3-0-**3** 

**Prerequisite: ITED 7200.** Development and application of knowledge and skills in information resources with emphasis on P-12 media center resources and services. Covers strategies for integrating information access skills into the curriculum, selection and evaluation of software and other resources, and building and managing media center collections.

# ITED 7202 Bibliographic Organization

3-0-3

**Prerequisite: ITED 7200.** Introduction to basic AACR2R rules and U.S. MARC as applied to integrated microcomputer-based automated systems. Includes bibliographic networks (i.e., OCLC, GOLD), resource sharing, database maintenance and evaluation.

# ITED 7299 Internship in Educational Media Center

3 hours credit

**Prerequisite: Approval of advisor.** Study and practice in administering an educational media center. Includes planning, coordinating, supervising, budgeting, and evaluating center services and programs.

#### ITED 7300 Instructional Design and Production

3-0-**3** 

**Prerequisite: ITED 7100.** Introduction to the systematic design of instruction and applied research, including front-end analysis, use of instructional and learning theories to select learning strategies, basic production, assessment, and formative and summative evaluation.

#### ITED 7301 Systematic Design of Instruction

3-0-**3** 

Application of systematic design principles to instructional and non-instructional projects. Includes project management, team building, and development issues for different delivery systems.

# ITED 7302 Needs Assessment

3-0-**3** 

**Prerequisite: ITED 7100 or permission of the instructor.** Application of research and evaluation skills to a field-based needs assessment; investigation of non-instructional solutions with attention to performance improvement. The course includes the use of job task analysis, consideration of organizational cultures, and application of team-building skills.

# ITED 7303 Advanced Instructional Design

3 A 3

**Prerequisite:** ITED 7301 and ITED 7302. Development of a professional project in which students design, implement, and evaluate an instructional product or learning environment.

#### ITED 7399 Internship in Technology Applications

3 hours credit

**Prerequisite: Approval of advisor.** A university-supervised field experience in an instructional technology setting.

#### ITED 7400 Automation and Networking

3-0-**3** 

**Prerequisite:** ITED 7200. Hands-on introduction to the process of automation and networking. Includes standards, software and hardware selection, maintenance, repair, implementation, and evaluation.

#### ITED 7401 Using Networked Systems for Teaching and Learning

3-0-**3** 

**Prerequisite: ITED 7200.** Practical experiences in setting up, managing, and using network applications to support instruction, collaboration, and computer-mediated communication.

# ITED 7403 Instructional Technology Leadership Seminar

3-0-**3** 

Prerequisites: ITED 7100 and ITED 7200, or permission of the instructor. In-depth investigations of specific contemporary topics and technologies using computer-mediated communications. Electronic media are the primary vehicles for course content and contact.

# ITED 7500 Instructional Technology Management

Prerequisites: ITED 7300 and ITED 7400, or permission of the instructor. Introduction to management principles in an IT context. The course includes theory and practice in strategic planning, the change process, program administration, use of human and physical resources, and budgeting for service-oriented functioning.

# ITED 7900 Special Topics in Instructional Technology

1-0-**1** to 3-0-**3** 

In depth study of specific issues in instructional technology. Course may be repeated under different topics. ITED 8100 Theories, Models, and Perspectives of Instructional Technology

# Survey and analysis of the theoretical perspectives of change, communication, diffusion, systems, learning, and instruction as applied in instructional technology.

ITED 8200 Database/Internet Applications

3-0-**3** 

Prerequisite: ITED 7200 or equivalent. Advanced principles and techniques of searching the Internet and a variety of databases. Covers file and thesauri structures, principles of indexing and abstracting, information management, Internet applications, and curriculum integration.

#### ITED 8300 Technology Tools for Training and Education

Prerequisite: ITED 7301 or equivalent instructional design course. Application of various technologies and products for instructional development. Includes in-depth use of computer-related technology tools to create effective instructional materials.

#### ITED 8400 Technology Selection for Learning Environments

3-0-**3** 

Prerequsite: ITED 8100. Practical experiences as evaluators and consumers of educational technology based on research and review of commercial, educational, and other authoritative sources. The course includes source, vendor, and product analysis, study of effectiveness and other benefits, and incorporation in technology plans and facilities.

#### ITED 8500 Leadership in Instructional Technology

3-0-**3** 

A study of theories and techniques for facilitating instructional and technological change. Emphasis is on team building, reflective practice and application in a field-based setting.

#### ITED 8900 Special Topics in Instructional Technology

1-0-1 to 3-0-3

Advanced study of specific contemporary issues in instructional technology. Course may be repeated under different topics.

#### ITED 8970 Research Seminar

3-0-**3** 

Prerequisite: ITED 7070 or equivalent. Graded "Satisfactory" or "Unsatisfactory." A review of studies applying a variety of methodologies to problems in instructional technology. The course includes development of a research proposal. May be repeated.

#### ITED 8980 Review of Literature

Prerequisite: ITED 7070 or equivalent. The writing of a critical review of current research on a specific topic related to curriculum and instructional technology. May be repeated.

#### ITED 8999 Journal-Ready Thesis

Prerequisites: ITED 7070 and ITED 8970. The data collection, analysis, and reporting phase of the Education Specialist research project. May be repeated.