# **CURRICULUM AND INSTRUCTION (CIED)**

#### CIED 5085. Advanced Research in Teaching. 1-3 Hours.

Analysis of opposing or varying viewpoints on educational issues of current concern is the main focus of the course. Examination of research literature, current data, experts in the various fields, and utilization of current technology in the examination of contemporary topics will be completed. A capstone course in which the oral defense of a research paper will be conducted. Variable Credit (1-3). Pre-Requisite CIED 5370.

#### CIED 5087. Workshop in Education. 1-3 Hours.

This course is designed to explore the relation of brain development in school-age children and methods for enhancing this development through the use of technology. Studetns will have the opportunity to design instructional aids, which seamlessly implement developmentally appropriate technology in the classroom. Variable Credit (1-3).

## CIED 5088. Special Topics in Curriculum and Instruction. 1-3 Hours.

# CIED 5089. Independent Study in Curriculum and Instruction. 1-3 Hours.

This is a course designed for independent study of selected topics under the supervision of a faculty member. Variable Credit (1-3).

Prerequisite: Consent of Department Chair.

## CIED 5333. Professional Educator's Role. 3 Hours.

This course is designed to assist educators in considering the complexity of the role of professional educators in public school systems. The history of American education, school reform, school law, professional ethics, technology, diversity and special populations are some of the topics addressed in this course.

#### CIED 5335. Teaching Practices in Science Education. 3 Hours.

Candidates evaluate the conceptual underpinnings of modern approaches to science education and professional development as they relate specifically to teaching and learning science. Principles of learning, students' inquiry strategy development, assessment/evaluation of teaching/learning, and the use of instructional technology are examined using research-based best practices in science inquiry education.

# CIED 5337. STEM Education Pedagogy. 3 Hours.

Candidates explore research and practical applications of STEM (Science, Technology, Engineering, and Mathematics) concepts related to STEM education and pedagogy. Graduate students will evaluate both strengths and limitations associated with research-based pedagogies, and gain insights into pedagogical strategies that can serve to enhance practices within STEM education.

# CIED 5340. Foundations of U.S. Education. 3 Hours.

Candidates focus on the historical foundations of elementary, secondary, and post-secondary education with emphasis on teaching and policy in western societies and North American schools.

## CIED 5341. Comparative Education. 3 Hours.

Candidates evaluate theories in comparative education, cross-national comparative analysis, educational indicator research, educational transfer and borrowing, and the relationship between culture and education. Special attention is devoted to similarities and differences in educational policy and practice among various nations.

## CIED 5342. Socio-Cultural Forces in Education. 3 Hours.

Candidates focus on national and global educational perspectives to examine the social, cultural, political and economic systems that shape society and the role education plays in the process.

# CIED 5343. Philosophy of Education. 3 Hours.

Candidates examine educational theory and practice in relation to philosophical perspectives, both classical and contemporary. This course provides graduate students with the knowledge and understanding of various philosophies of education, national and international, and allows them to apply the philosophies to contemporary and classical educational issues.

#### CIED 5352. Foundations of Project Based Learning. 3 Hours.

Candidates focus on the foundational, research-based elements that are critical to implementation of Project Based Learning, including examination of required elements in pedagogy. These include mastery of skills needed to facilitate K-12 student learning through participation in inquiry, critical thinking, and self-assessment.

# CIED 5354. Project Based Learning Culture, Environment, and Management. 3 Hours.

In this course, graduate students focus on leading and managing the learning environment while implementing and maintaining Project Based Learning in a variety of learning venues.

Prerequisite: CIED 5352.

# CIED 5356. Project Based Learning Methodology. 3 Hours.

This course focuses specifically on the first three critical elements of an effective Project Based Learning educational setting: planning and developing entry events and driving questions, facilitating student discussions about areas of need, and effectively implementing student voice and choice. This detailed study will prepare graduate students to teach this process to other educators.

Prerequisite: CIED 5352 and CIED 5354.

#### CIED 5358. Assessment and Analysis of Project Based Learning. 3 Hours.

In this course, candidates focus on the final critical elements of an effective Project Based Learning environment, including development, implementation, and analysis of all assessment components.

Prerequisite: CIED 5352, CIED 5354, and CIED 5356.

#### CIED 5360. Adv Techniques & Mthds Instr. 3 Hours.

Study is made of current and advanced teaching techniques, strategies, and materials. Candidates will identify, research and develop approaches to problems pertaining to their teaching field.

#### CIED 5370. Research In Teaching. 3 Hours.

This course is designed for educators of all subject and grade levels. The focus of this course is to prepare teachers to read published research critically, to integrate those finding with personal experience in order to make reflective instructional decision and to participate in pedagogical research, theory-building, and elementary statistics.

Prerequisite: 12 Graduate level hours in education.

#### CIED 5382. Instructional Coaching. 3 Hours.

In this course, candidates will research and engage in a form of job-embedded professional development focused on improving teaching practice in order to enhance student learning. The course is designed to get teachers to examine currently held beliefs and assumptions about professional development and coaching, then re-examine those beliefs after experiencing coaching facilitation.

## CIED 5383. Integrating Curnt Tech In Tchg. 3 Hours.

A study of the technical and instructional skills needed for integrating modern technology into the classroom and a study of the issues impacting instructional design. This course is recommended for both Education and non-Education majors.

#### CIED 5384. Curricular Trends For Clss Tch. 3 Hours.

Development of the school curriculum and significant factors which help to determine the curriculum construction are studied. Educators will be provided the opportunity to apply best practice knowledge and skills to a curriculum unit.

## CIED 5390. Adv Mths Classroom Mgt & Disc. 3 Hours.

This course is designed for K-12 educators of all subject areas. Increased proficiency in classroom management skills is the primary objective of the course. Educatorswill be provided with an understanding of the factors influencing individual and group behavior in school settings; methods of diagnosing school and classroom factors that may be eliciting the problem; and the options available for influencing student behaviors.

## CIED 5391. Problems Teaching Elem Math. 3 Hours.

Study is made of recent trends in elementary mathematics programs and instructional approaches. Application of research findings to improving the teaching and learning of mathematics is emphasized.

## CIED 5392. Prob Tchg Elem Sci. 3 Hours.

Study is made of recent trends in elementary science programs and instructional approaches. Application of research findings to improving the teaching and learning of science is emphasized.

#### CIED 5393. Assessment Of Learning. 3 Hours.

The focus of this course is research in current literature on strategies for the analysis of student work designed to improve instruction and student success. Students will develop skills in the use of a wide range of assessment strategies.

#### CIED 5396. Prob In Tchg Social Studies. 3 Hours.

Study is made of recent trends in elementary social studies programs and instructional approaches. Application of research findings to improving the teaching and learning of social studies is emphasized.

# CIED 5397. Hum Grwth & Dev Across Lifespn. 3 Hours.

This course is designed to relate theory and research to present concerns and problems of teachers through the study of physiological, psychological and social interrelationships. A review of theory and current research concerning the growth and development of the individual through the lifespan, specifically childhood through adolescence will be emphasized as it pertains to teaching and learning.

# CIED 5398. Internship In Classroom Instrc. 3 Hours.

This course is designed for the candidate who possesses a baccalaureate degree from an accredited university, is seeking Texas teacher certification, has met all requirements for admission to the teacher education program, and is eligible for an internship as defined by the Texas Education Agency guidelines. The intern should be employed as the "teacher of record" in a public school in one of the school districts.

# CIED 5399. Internship In Classroom Instrc. 3 Hours.

This course is designed for the candidate who possesses a baccalaureate degree from an accredited university, is seeking Texas teacher certification, has met all requirements for admission to the teacher education program, and is eligible for an internship as defined by the Texas Education Agency quidelines. The intern should be employed as the "teacher of record" in a public school in one of the school districts.

Prerequisite: CIED 5398.

# ${\bf CIED~6394.~Developing~Curriculum~for~Adults.~3~Hours.}$

This course is designed to get educators to examine principles of adult learning, factors affecting curricular design for adults, curriculum planning, implementation, and outcomes evaluation. Candidates will design and implement a training for adult learners.

## CIED 7331. Teaching Strategies for Developmental Mathematics. 3 Hours.

This course explores research and practical application of mathematical concepts related to developmental mathematics education. Principals of learning, students' mathematical strategy development, assessment/evaluation of teaching/learning, and the use of instructional technology will be examined using research-based best practices in developmental mathematics education.

## CIED 7390. Assessment Of Math Learning. 3 Hours.

This course will be one of four education classes used in the doctoral program in mathematics education. Topics will include classroom assessment, standardized tests, and assessment instruments for research in mathematics education.

#### CIED 7393. Research In Mathematics Edu. 3 Hours.

This course will be one of four education classes used in the doctoral program in mathematics education. Topics will include selecting a research topic, research instruments, research statistics, and writing the paper.

# CIED 7395. Current Issues In Math Edu. 3 Hours.

This course will be one of four education classes used in the doctoral program in mathematics education. Topics will include curriculum, textbooks, standards, accountability, parental involvement, legal issues, ethics, and testing.

# CIED 7396. Theories Of Learning Math. 3 Hours.

This course will be one of four education classes used in the doctoral program in mathematics education. Topics will include theories of learning mathematics, information processing, cognitive theories, and constructivist theories.