EDUCATION RESEARCH (EDRS)

200 Level Courses

EDRS 220: Introduction to Applied Quantitative Analysis. 3 credits.

Mason Core: Mason Core (All), Quantitative Reasoning (http://catalog.gmu.edu/mason-core/)

Schedule Type: Lecture

Grading:
This course is graded on the Undergraduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

500 Level Courses

EDRS 531: Educational and Psychological Measurement. 3 credits.
Emphasizes techniques and principles used in the construction, administration, and quantification of measuring devices for evaluation purposes. Discusses interpretation of standardized tests of ability, aptitude, achievement, interest, and personality. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit. Equivalent to EDRS 622.

Recommended Prerequisite: Appropriate methods and advanced methods courses. Concurrent enrollment is also permitted.

Registration Restrictions:
Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

Schedule Type: Lecture

Grading:
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 590: Education Research. 3 credits.
Develops skills, insights, and understanding to perform research, with emphasis on interpreting and applying research results. Critiques research, and uses findings in educational settings. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

Schedule Type: Lecture

Grading:
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 620: Quantitative Inquiry in Education. 3 credits.
Examines fundamental concepts and methods of statistics as applied to educational problems, including descriptive and inferential statistics. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisite: (EDRS 590B).
B Requires minimum grade of B.

Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

Schedule Type: Lecture

Grading:
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 621: Qualitative Inquiry in Education. 3 credits.
Focuses on basic application of naturalistic research methods. Examines major theoretical frameworks and qualitative research techniques, which include content analysis, coding, and interpretation of data. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Recommended Prerequisite: B or better in EDRS 590 or equivalent; concurrent enrollment in EDRS 590 possible with instructor permission.

Registration Restrictions:
Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

Schedule Type: Lecture

Grading:
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 622: Educational and Psychological Measurement. 3 credits.
Emphasizes techniques and principles used in the construction, administration, and quantification of measuring devices for evaluation purposes. Discusses interpretation of standardized tests of ability, aptitude, achievement, interest, and personality. Offered by School
of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit. Equivalent to EDRS 531.

**Recommended Prerequisite:** Concurrent enrollment with EDRS 621 possible with instructor permission; instructor permission possible with previous statistics experience.

**Registration Restrictions:**
Required Prerequisites: (EDRS 620\(^C\) and 621\(^{1C}\)).

\(^*\) May be taken concurrently.

\(^{1C}\) Requires minimum grade of C.

Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Students in a Non-Degree Undergraduate degree may not enroll.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 630: *Educational Assessment.* 3 credits.

Examines research theory and practice relevant to assessments. Focuses on assessment strategies for students including developing skills to select, score, and interpret educational assessments. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Recommended Prerequisite:** Recommended EDRS 590 and EDRS 620 (concurrent enrollment permitted)

**Registration Restrictions:**
Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 631: *Program Evaluation.* 3 credits.

Focuses on perspectives of existing and emerging issues, theories, and models of program evaluation. Involves implementation of program evaluation in related fields and school districts. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Recommended Prerequisite:** EDRS 621; EDRS 620 concurrent enrollment possible with instructor permission

**Registration Restrictions:**
Required Prerequisites: (EDRS 590\(^B\) and 620\(^B\)).

\(^B\) Requires minimum grade of B.

Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 680: *Advanced Evaluation Methods and Internship.* 1-4 credits.

Expands knowledge about evaluation with practical experience in the field through an internship and combines advanced thinking about evaluation theories, issues, methodologies, and research on evaluation. Emphasizes evaluation in educational contexts including K-12, higher education, government, and informal learning environments. Also considers evaluation work in grant-funded projects. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May be repeated within the degree for a maximum 8 credits. Equivalent to EDRS 880.

**Recommended Prerequisite:** EDRS 590, 620, 621, and 631.

**Registration Restrictions:**
Enrollment limited to students with a class of Advanced to Candidacy, Graduate, Junior Plus, Non-Degree or Senior Plus.

Enrollment is limited to Graduate, Non-Degree or Undergraduate level students.

Students in a Non-Degree Undergraduate degree may not enroll.

**Schedule Type:** Internship

**Grading:**
This course is graded on the Satisfactory/No Credit scale. (http://catalog.gmu.edu/policies/academic/grading/)

700 Level Courses

EDRS 797: *Advanced Topics in Education.* 1-6 credits.

Advanced study of selected topics in education for students preparing for doctoral studies or who have been admitted to the PhD program in education. Notes: May be repeated for credit with CEHD approval. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May be repeated within the degree.

**Specialized Designation:** Topic Varies

**Registration Restrictions:**
Enrollment limited to Graduate or Non-Degree level students.

Students in a Non-Degree Undergraduate degree may not enroll.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

800 Level Courses

EDRS 810: *Problems and Methods in Education Research.* 3 credits.

Advanced course in interpreting and applying education research methods. Emphasizes comparison of alternative philosophies of research, ways of formulating questions and hypotheses, research
plans, and analysis procedures. Students evaluate existing studies, and investigate a range of research approaches. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Recommended Prerequisite:** Admission to the PhD program or permission of instructor.

**Registration Restrictions:**
Enrollment is limited to students with a major in Education or Music Education.

Enrollment is limited to Graduate level students.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

**EDRS 811:** **Quantitative Methods in Educational Research.** 3 credits. Emphasizes advanced methods of conducting research using quantitative methods of data collection, and analysis appropriate for research in education. Includes design of experimental and quasi-experimental research studies, and methods of analysis appropriate to these studies, including analyzing variance and multiple linear regression. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Registration Restrictions:**
Required Prerequisites: EDRS 810\(^B\) or 810\(^X\)\(^S\).
\(^B\) Requires minimum grade of B-
\(^X\)\(^S\) Requires minimum grade of XS.

Enrollment limited to students in the AR-PHD-MUE or E1-PHD-EDUC programs.

Enrollment is limited to Graduate level students.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

**EDRS 812:** **Qualitative Methods in Educational Research.** 3 credits. Teaches how to apply qualitative data collection and analysis procedures in educational research, including ethnographic and other field-based methods, and unobtrusive measures. Notes: Emphases vary depending on student interests and needs. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Registration Restrictions:**
Required Prerequisites: EDRS 810\(^B\) or 810\(^X\)\(^S\).
\(^B\) Requires minimum grade of B-
\(^X\)\(^S\) Requires minimum grade of XS.

Enrollment limited to students in the AR-PHD-MUE or E1-PHD-EDUC programs.

Enrollment is limited to Graduate level students.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

**EDRS 814:** **Anti-Colonial Methodologies.** 3 credits. Develops knowledge and skills of anti-colonial research methodologies. Emphasizes theories that undergird anti-colonial and decolonial approaches to research as well as ethical and methodological tensions surrounding these approaches. Includes anti-colonial and decolonial methods for data collection and analysis appropriate for research in education as well as other social sciences. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). Limited to three attempts.

**Recommended Prerequisite:** Successful completion (with a grade of B or higher) of EDRS 810, EDRS 811, and EDRS 812, or equivalent coursework or experience, or permission of the instructor.

**Registration Restrictions:**
Enrollment limited to students with a class of Advanced to Candidacy or Graduate.

**Schedule Type:** Seminar

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

**EDRS 818:** **Critical Discourse Analysis in Education Research.** 3 credits. Prepares students with a working knowledge of discourse analysis and its application to ethnographic and qualitative research in education. Focuses on critical discourse analysis as a resource to improve classroom interaction and transform educational practice and as an analytic tool for a social analysis of education in a wide variety of local, national and international education contexts and settings. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Recommended Prerequisite:** EDRS 810 EDRS 811 EDRS 812 or permission of instructor.

**Registration Restrictions:**
Enrollment is limited to Graduate level students.

**Schedule Type:** Seminar

**Grading:**
This course is graded on the Graduate Special scale. (http://catalog.gmu.edu/policies/academic/grading/)

**EDRS 820:** **Evaluation Methods for Educational Programs and Curricula.** 3 credits. Explores development and types of current systems and models for evaluating educational programs and curricula. Emphasizes evaluation needs and problems of public and private elementary and secondary schools, and colleges and universities. Also considers needs of government agencies, industry, and health-related organizations. Notes: Prior completion of EDRS 811 and 812 helpful but not required. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Recommended Prerequisite:** EDRS 810 or 810\(^X\)\(^S\).

**Registration Restrictions:**
Enrollment is limited to Graduate level students.

**Schedule Type:** Lecture

**Grading:**
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)
EDRS 821: Advanced Applications of Quantitative Methods. 3 credits. Advanced study of applications of quantitative methods in educational research, reinforcing and building on concepts and skills acquired in EDRS 811. Uses modular approach, and provides advanced study of techniques appropriate to survey research, group-experimental and quasi-experimental research, selected multivariate procedures and factor analysis, and quantitative synthesis (meta-analysis) of research. Combines text reading assignments, critiques, and discussion of relevant journal articles; and application activities. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: (EDRS 810B or 810XS) and (EDRS 811B or 811XS).
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

EDRS 822: Advanced Applications of Qualitative Methods. 3 credits. Advanced seminar devoted to study of current topics in qualitative research. Deals with cutting-edge information on selected advanced topics in qualitative research, and provides opportunities to apply new skills and knowledge to projects related to students' interests. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: (EDRS 810B or 810XS) and (EDRS 812B or 812XS).
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

EDRS 824: Mixed Methods Research: Integrating Qualitative and Quantitative Approaches. 3 credits. Advanced research seminar that integrates qualitative and quantitative approaches, methods, and data in a single study. The course covers the paradigms and "mental models" that inform both approaches, and the ways in which qualitative and quantitative goals, questions, methods, and interpretive strategies can be productively combined. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: (EDRS 810B or 810XS) and (EDRS 811B or 811XS) and (EDRS 812B or 812XS).
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

EDRS 825: Advanced Research Methods in Self-Study of Professional Practice. 3 credits. Prepares students to conduct research using the self-study research methodology, a qualitative research approach for systematically examining one's practitioner role for improvement-aimed purposes with contributions to the educational field and knowledge base. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

EDRS 823: Advanced Research Methods in Single Subject/Case Design. 3 credits. Prepares students to conduct research using single subject design and single case study design. Provides understanding of salient features as well as advantages, disadvantages of these research methodologies. Students critique and analyze published research using these methodologies. Provides opportunities to apply these methodologies to research questions related to student interests. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: (EDRS 810B or 810XS) and (EDRS 811B or 811XS) and (EDRS 812B or 812XS).
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Recommended Prerequisite: Admission to PhD in Education program.
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 826: Qualitative Case Study Methods. 3 credits.
Advanced research seminar on qualitative case study design and application in educational research. Topics include descriptive, theoretical, evaluation, and policy case study design and methods. Students will conduct and critique a case study appropriate to their discipline. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: EDRS 812 B- or 812 XS.
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Enrollment is limited to Graduate level students.

Schedule Type: Seminar

This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 827: Introduction to Measurement and Survey Development. 3 credits.
Develops knowledge and skills related to measurement and survey development and use in research for education, psychology, and related fields. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: EDRS 811 B- or 811 XS.
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Enrollment is limited to students with a class of Graduate.

Enrollment is limited to Graduate level students.

Schedule Type: Lecture

This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 828: Item Response Theory. 3 credits.
Develops knowledge and skills related to Item Response Theory with application in the context of education, psychology, and related fields. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: EDRS 821 B- or 821 XS, 827 B- or 827 XS.
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Enrollment is limited to Graduate level students.

Schedule Type: Lecture

Grading:

This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 829: Bayesian Methods. 3 credits.
Develops knowledge and skills of the Bayesian perspective, a contemporary approach to quantitative analysis. Explores the applications for the Bayesian perspective on data analysis and inference for researchers and practitioners in the social and behavioral sciences. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisite: EDRS 821 B-.
B- Requires minimum grade of B-.

Enrollment limited to students with a class of Advanced to Candidacy or Graduate.

Schedule Type: Lecture

Grading:

This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 830: Hierarchical Linear Modeling. 3 credits.
Analyzes nested data structures (e.g. students within classrooms) as well as student growth. Students will learn through reading assignments, lecture and applications using a computer program for data analysis. Students will be expected to critically read multilevel methods used in published research, analyze data, and provide written report of results in APA format. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Registration Restrictions:
Required Prerequisites: EDRS 821 B- or 821 XS.
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Enrollment is limited to Graduate level students.

Schedule Type: Lecture

Grading:

This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 831: Structural Equation Modeling. 3 credits.
Focusing on the development of knowledge and skills related to structural equation modeling and research applications in education, psychology, and related fields. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Recommended Prerequisite: EDRS 811.

Registration Restrictions:
Required Prerequisites: EDRS 821 B- or 821 XS.
B- Requires minimum grade of B-.
XS Requires minimum grade of XS.

Enrollment is limited to Graduate level students.

Schedule Type: Lecture
**EDRS 832: Document Analysis and Archival Research.** 3 credits.
Examines the methodological foundations of and analytical approaches to document-based research. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Required Prerequisites:**
- EDRS 810\(^B\) or 810\(^XS\)
- EDRS 811\(^B\) or 811\(^XS\)
- EDRS 812\(^B\) or 812\(^XS\)

**Grading:**
Requires minimum grade of B-.
XS Requires minimum grade of XS.

**Enrollment:**
- Limited to Graduate level students.

**Recommended Prerequisite:**
EDRS 822.

**Schedule Type:** Lecture

**EDRS 833: Participatory Action Research.** 3 credits.
Explores theoretical concepts associated with participatory action research and teaches how to apply participatory data collection and analysis procedures in educational research. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Required Prerequisites:**
- EDRS 812\(^B\) or 812\(^XS\)

**Grading:**
Requires minimum grade of B-.
XS Requires minimum grade of XS.

**Enrollment:**
- Limited to Graduate level students.

**Recommended Prerequisite:**
EDRS 822.

**Schedule Type:** Lecture

**EDRS 836: Narrative Inquiry.** 3 credits.
Teaches theory behind narrative inquiry and application of narrative data collection and analysis procedures in educational research. Builds students' abilities to conduct narrative data collection and analysis. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

**Required Prerequisites:**
- EDRS 812\(^B\) or 812\(^XS\)

**Grading:**
Requires minimum grade of B-.
XS Requires minimum grade of XS.

**Enrollment:**
- Limited to Graduate level students.

**Recommended Prerequisite:**
Completion of all courses required for the Anti-Racist and Decolonizing Research Concentration

**Schedule Type:** Lecture
This course is graded on the Satisfactory/No Credit scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 895: Qualitative Methods Capstone Project. 3 credits.
Provides the opportunity to formulate, engage and complete a qualitative research project, research internship, or pilot study of their choice under faculty supervision in an advanced and specialized seminar. Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May not be repeated for credit.

Recommended Prerequisite: EDRS 812, EDRS 822.

Registration Restrictions:
Enrollment is limited to students with a major, minor, or concentration in Qualitative Research.

Enrollment is limited to Graduate level students.

Schedule Type: Research

Grading:
This course is graded on the Satisfactory/No Credit scale. (http://catalog.gmu.edu/policies/academic/grading/)

EDRS 897: Special Topics in Research Methods. 3 credits.
Develops knowledge and skills of selected advanced research methods topic(s). Offered by School of Education (http://catalog.gmu.edu/colleges-schools/education-human-development/school-education/). May be repeated within the degree for a maximum 6 credits.

Specialized Designation: Topic Varies

Registration Restrictions:
Enrollment limited to students in the E1-PHD-EDHD or E1-PHD-EDUC programs.

Enrollment is limited to Graduate or Non-Degree level students.

Students in a Non-Degree Undergraduate degree may not enroll.

Schedule Type: Lecture

Grading:
This course is graded on the Graduate Regular scale. (http://catalog.gmu.edu/policies/academic/grading/)