



**College of Education and Human Development  
Division of Special Education and disAbility Research**

Summer 2018

EDSE 621 002: Applied Behavior Analysis: Empirical Bases

CRN: 42699, 3 – Credits

<b>Instructor:</b> Dr. Marlene Cohen	<b>Meeting Dates:</b> 5/21/2018 – 8/11/2018
<b>Phone:</b> 609-532-2382	<b>Meeting Day(s):</b> Tuesday (5/22; 6/5; 7/10; 7/24) via Blackboard Collaborate Ultra
<b>E-Mail:</b> mcohen24@gmu.edu	<b>Meeting Time(s):</b> 5:30 pm – 6:30 pm
<b>Office Hours:</b> Tuesdays 6:30 pm – 7:30 pm or by appointment	<b>Meeting Location:</b> On-line
<b>Office Location:</b> Blackboard Collaborate Ultra	<b>Other Phone:</b> N/A

\*Note: This syllabus may change according to class needs. Teacher Candidates/Students will be advised of any changes immediately through George Mason e-mail and/or through Blackboard.

**Prerequisite(s):** EDSE 619

**Co-requisite(s):** EDSE 619

**Course Description**

Focuses on basic content of applied behavior analysis. Teaches how to implement behavioral procedures and develop behavioral programs for clients with fundamental behavioral needs. Offered by Graduate School of Education. May not be repeated for credit.

**Advising Contact Information**

Please make sure that you are being advised on a regular basis as to your status and progress through your program. Mason M.Ed. and Certificate teacher candidates/students should contact the Special Education Advising Office at (703) 993-3670 for assistance. All other teacher candidates/students should refer to their faculty advisor.

**Advising Tip**

Have you met with an advisor? **All students should make an appointment to meet with an advisor to outline a plan for completing coursework and non-course requirements such as**

**testing.** To make an appointment by phone or in person, go to <http://gse.gmu.edu/special-education/advising/>.

### **Course Delivery Method**

Learning activities include the following:

1. Synchronous class lecture and discussion
2. Application activities
3. Small group activities and assignments
4. Video and other media supports
5. Research and presentation activities
6. Electronic supplements and activities via Blackboard

This course will be delivered online (76% or more) using both synchronous and asynchronous] format via Blackboard Learning Management system (LMS) housed in the MyMason portal. You will log in to the Blackboard (Bb) course site using your Mason email name (everything before @masonlive.gmu.edu) and email password. The course site will be available on May 19, 2018.

**Under no circumstances, may candidates/students participate in online class sessions (either by phone or Internet) while operating motor vehicles. Further, as expected in a face-to-face class meeting, such online participation requires undivided attention to course content and communication.**

### *Technical Requirements*

To participate in this course, students will need to satisfy the following technical requirements:

- High-speed Internet access with standard up-to-date browsers. To get a list of Blackboard's supported browsers see:  
[https://help.blackboard.com/Learn/Student/Getting\\_Started/Browser\\_Support#supported-browsers](https://help.blackboard.com/Learn/Student/Getting_Started/Browser_Support#supported-browsers)

To get a list of supported operation systems on different devices see:

[https://help.blackboard.com/Learn/Student/Getting\\_Started/Browser\\_Support#tested-devices-and-operating-systems](https://help.blackboard.com/Learn/Student/Getting_Started/Browser_Support#tested-devices-and-operating-systems)

- Students must maintain consistent and reliable access to their GMU email and Blackboard, as these are the official methods of communication for this course.
- Students will need a headset microphone for use with the Blackboard Collaborate web conferencing tool.
- Students may be asked to create logins and passwords on supplemental websites and/or to download trial software to their computer or tablet as part of course requirements.

- The following software plug-ins for PCs and Macs, respectively, are available for free download:
  - Adobe Acrobat Reader: <https://get.adobe.com/reader/>
  - Windows Media Player: <https://support.microsoft.com/en-us/help/14209/get-windows-media-player>
  - Apple Quick Time Player: [www.apple.com/quicktime/download/](http://www.apple.com/quicktime/download/)

### *Expectations*

- Course Week  
Because asynchronous courses do not have a “fixed” meeting day, our week will start on Monday, and finish on Sunday.  
Our course week will begin on the day that our synchronous meetings take place as indicated on the Schedule of Classes.
- Log-in Frequency:  
Students must actively check the course Blackboard site and their GMU email for communications from the instructor, class discussions, and/or access to course materials at least 3 times per week. In addition, students must log-in for all scheduled online synchronous meetings.
- Participation:  
Students are expected to actively engage in all course activities throughout the semester, which includes viewing all course materials, completing course activities and assignments, and participating in course discussions and group interactions.
- Technical Competence:  
Students are expected to demonstrate competence in the use of all course technology. Students who are struggling with technical components of the course are expected to seek assistance from the instructor and/or College or University technical services.
- Technical Issues:  
Students should anticipate some technical difficulties during the semester and should, therefore, budget their time accordingly. Late work will not be accepted based on individual technical issues.
- Workload:  
Please be aware that this course is **not** self-paced. Students are expected to meet *specific deadlines* and *due dates* listed in the **Class Schedule** section of this syllabus. It is the student’s responsibility to keep track of the weekly course schedule of topics, readings, activities and assignments due.
- Instructor Support:  
Students may schedule a one-on-one meeting to discuss course requirements, content or other course-related issues. Those unable to come to a Mason campus can meet with the instructor via telephone or web conference. Students should email the instructor to schedule a one-on-one session, including their preferred meeting method and suggested dates/times.
- Netiquette:

The course environment is a collaborative space. Experience shows that even an innocent remark typed in the online environment can be misconstrued. Students must always re-read their responses carefully before posting them, so as others do not consider them as personal offenses. *Be positive in your approach with others and diplomatic in selecting your words.* Remember that you are not competing with classmates, but sharing information and learning from others. All faculty are similarly expected to be respectful in all communications.

- Accommodations:

Online learners who require effective accommodations to insure accessibility must be registered with George Mason University Disability Services.

### **Learner Outcomes**

Upon completion of this course, teacher candidates/students will be able to:

1. Describe philosophical assumptions underlying data-based decision making in applied behavior analysis.
2. Define, describe, identify, exemplify, and use direct measures of behavior.
3. Define, describe, identify, exemplify, and use indirect measures of behavior.
4. Construct and interpret equal interval graphs.
5. Construct and interpret standard celeration charts.
6. Describe, identify, and exemplify single subject experimental design.
7. Describe and exemplify data-based decision making using visual inspection of graphically presented behavioral data in the context of single subject experimental designs.
8. Describe and identify utility and factors affecting use of single subject designs for evaluating instructional, behavioral, and other interventions in applied settings.
9. Describe, identify, and exemplify ethical factors regarding data collection, data management, and data based decision making as described by the Guidelines for Responsible Conduct and the Disciplinary Standards.
10. Read, interpret, and evaluate articles from the behavior analytic literature.

### **Course Relationship to Program Goals and Professional Organizations**

This course is part of the George Mason University, Graduate School of Education (GSE), Special Education Program for Applied Behavior Analysis Graduate Certificate. The content of the courses in this program is derived from the Task List published by the national Behavior Analyst Certification Board (BACB) as well as the Professional and Ethical Compliance Code for Behavior Analysts. The Professional and Ethical Compliance Code for Behavior Analysts is listed on the following website: <http://bacb.com/wp-content/uploads/2016/03/160321-compliance-code-english.pdf>. For more information on the Board and the examination, please visit the Board's website at [www.bacb.com](http://www.bacb.com).

### **Required Textbooks**

American Psychological Association. (2010). *Publication manual of the American Psychological Association* (6th ed.). Washington, DC: Author.

Cooper, J.O., Heron, T.E., & Heward, W.L. (2007). Applied behavior analysis (2nd Ed.). Upper Saddle River, NJ: Pearson Merrill Prentice Hall. ISBN 0-13-142113-1

Foxx, R.M., & Mulick, J.A. (2015). Controversial therapy for autism and intellectual disabilities: Fad, fashion, and science in professional practice (2nd Edition). New York, NY: Routledge. ISBN 978-1-138-80223-0

### **Recommended Textbooks**

N/A

### **Required**

Given the possibility of computer or internet difficulties some students may experience from time to time, students must consider and identify alternative availability of computers and internet access (e.g., public libraries, their employer (if permissible by the employer), internet cafes, etc.) within the first week of this course to ensure that they will be able to complete their assignments in a timely manner.

Students will need to have access to a scanner in order to scan and upload their completed assignments. Each assignment must be scanned into a single document and saved as a pdf file. **No photographs will be accepted.** Likewise, multiple one page scans (e.g., 5 single page pdf files instead of a single 5 page file) will also not be accepted.

Many home printers have scanning capability, and one can also scan at Fedex Office, Staples or other stores. Finally, one's employer may be able to make scanning available on request.

Only assignments submitted in Microsoft Word or in PDF files will be accepted. No assignments in any other file format will be accepted.

### **Additional Readings**

Readings will be assigned by the instructor throughout the semester and will be posted to Blackboard. **Students are responsible for ALL readings.**

### **Course Performance Evaluation**

Students are expected to submit all assignments on time in the manner outlined by the instructor (e.g., Blackboard, Tk20, hard copy).

#### **Tk20 Performance-Based Assessment Submission Requirement**

It is critical for the special education program to collect data on how our students are meeting accreditation standards. Every teacher candidate/student registered for an EDSE course with a required Performance-based Assessment (PBA) is required to upload the PBA to Tk20 (regardless of whether a course is an elective, a one-time course or part of an undergraduate minor). A PBA is a specific assignment, presentation, or project that best demonstrates one or more CEC, InTASC or other standard connected to the course. A PBA is evaluated in two ways. The first is for a grade, based on the

instructor's grading rubric. The second is for program accreditation purposes. Your instructor will provide directions as to how to upload the PBA to Tk20.

For *EDSE 621*, the required PBA is Make Your Own Experiment and Final Exam Feedback. Failure to submit the assignment to Tk20 will result in reporting the course grade as Incomplete (IN). Teacher candidates/students have until five days prior to the University-stated grade change deadline to upload the required PBA in order to change the course grade. When the PBA is uploaded, the teacher candidate/student is required to notify the instructor so that the “IN” can be changed to a grade. If the required PBA is not uploaded five days prior to the University-stated grade change deadline and, therefore, the grade not changed, it will become an F. Please check to verify your ability to upload items to Tk20 before the PBA due date.

### **Assignments and/or Examinations**

#### **Performance-based Assessment (Tk20 submission required)**

There are two assignments for this course that require submission through TK20.

They are as follows:

**Final Examination.** This test will consist of 50 items (worth 2 points each), and will be given as a pretest on the first night of class, and a parallel form as a final exam on the last night of class. Credit toward your final score will only be given for your performance on this test on the last night of class. After you have completed your final exam, you'll be emailed a document that details your performance by content area covered by the exam. You'll need to upload this document to TK20 after receiving it.

**Make Your Own Experiment.** You will be provided with 10 scenarios. You will choose two scenarios for which you will complete this project. You will use a different experimental design and a different data collection method for each of the two scenarios you choose. For each of these scenarios, instructions are as follows:

- A. develop a behavioral definition for the identified problem behavior (2 points);
- B. select a measure for the behavior of interest (and give the rationale for selecting this measure) (2 points);
- C. develop a recording form for collecting data (2 points);
- D. write step by step instructions for collecting data, ensuring that these instructions:
  - a. are bulleted
  - b. use active voice
  - c. specify only one implementer behavior per step
  - d. instruct the implementer what to do
  - e. use only as many words as is necessary
  - f. provide steps in linear order
  - g. include only necessary steps (necessary)
  - h. include all necessary steps (sufficient) (8 points);
- E- select a design that will best answer the question asked (and give the

- rationale for that design) (2 points);
- F- describe, step by step, how you will implement that design, indicating:
    - a. How you will begin baseline data collection (1 point);
    - b. Decision rules for introducing your intervention (1 point)
    - c. Decision rules for withdrawing and for reintroducing your intervention (if appropriate) or for introducing your intervention in another setting (or for another therapist, subject, behavior, etc.) (if appropriate) (1 point); and
    - d. How you will control for relevant threats to internal validity (1 point)
  - G- Construct a graph of possible data that would show functional control of the intervention over the behavior, using the design you chose (2 points).
  - H- Scan all of this into a single document, and submit, in PDF form.

**College Wide Common Assessment (TK20 submission required)**

None

**Performance-based Common Assignments (No Tk20 submission required)**

**EDSE 619 Final Exam.** You will already completed EDSE 619, or you will be taking it at the same time you are taking this course. During the first week of this course, you will complete the final exam for EDSE 619 that this instructor gives as a final exam when he teaches EDSE 619. Your instructor will provide you with written feedback regarding your performance by the end of the fourth week of the course. **The purpose of this assignment is to promote maintenance and retention of content learned during EDSE 619, and / or to help each student identify areas of weakness needing attention that may impact the student's performance in EDSE 621.** This final exam must be completed during the first week of the course. It is no longer available after 11:59 pm on 27 May 2018. You will receive 0.2 points for each correct response on this final exam.

**CITI Training Module.** You will be responsible for completing the basic human subjects research modules recommended for anyone conducting research at GMU. These modules are available through <https://www.citiprogram.org/>. Please be sure to take the Social and Behavioral Science Research Basic course. Registering for the wrong course will not count towards this class and may result in significant time lost (30 Points).

### **Interteaching Assignments**

This assignment will allow you to have hands-on access to the reading materials, as well as discussion. Each week, you will be given an activity that will extend your knowledge of the readings. This will consist of a study sheet. While you may choose to complete parts of the assignment independently, the goal is for you to work with a partner to discuss the readings and complete the study guide together. You will be responsible for completing a study guide relating to the readings and any class activity. This guide will consist of both factual and open-ended questions. Your study guides will be the basis for your unit quizzes and final exam. (5 points per assignment).

**Weekly Quizzes.** Beginning with Week 1, you will have a 10 item, multiple choice quiz each week, covering content presented during that week. (Week 1's quiz will include the syllabus.) Each question will be worth 1 point toward your final grade. You will be provided with 15 minutes in which to complete each quiz. Once you answer a quiz question, you will not be able to return to it.

**Reaction Video.** During the weeks indicated on the syllabus, you will either access a recording through that week's blackboard folder, or will follow the instructions in that folder to access one or more recordings. You will watch / listen to these recordings in their entirety and will then record your reaction via video and post it in the Discussion Forum. The video should contain enough information to fill a 1 – 2 page paper in which you:

1. Summarize the presentation.
2. Explain what was new to you in the presentation.
3. Explain how you can incorporate what you learned in that presentation into your work.

You will also be required to view the video of two other students and comment on their response.

### **Final Exam**

A final exam will be given to test knowledge of measurement, assessment, and experimental design concepts. Each test item is correlated to the BACB Task List to help the student identify strengths and weaknesses in empirical methods.

The instructor will provide written feedback on students' correct and incorrect responses

**Course Policies and Expectations**

**Attendance/Participation**

Attendance/Participation. All students are expected to be present, in Blackboard Collaborate and ready to work, at 5:30 pm on Synchronous Discussion days. Your instructor will take a screen shot of the listing of those present at the beginning of each session. All whose names are listed at in that screen shot will earn 1 point for being present on time. All students are expected to remain for the entire Synchronous Discussion session, each session. Your instructor will likewise take a screen shot of the listing of names at the end of each Synchronous Discussion session, and all students whose names are on the list at that time will earn 1 point for being present at that time. Arriving late, leaving early or absence from a Synchronous Discussion will preclude opportunity for earning attendance points. Each student is expected to contribute to each Synchronous Discussion by speaking. This means that each student's microphone must work; participating from a computer without a working microphone will preclude opportunity to participate. Likewise, typing one's comments or questions will not count toward contribution points. Contributing to a synchronous discussion by speaking will earn 2 points per synchronous discussion. Absence form a discussion precludes opportunity to earn participation points.

**Late Work.**

All assignments are due no later than the due dates indicated on the syllabus. Late assignments will not be accepted.

**Grading Scale**

Assignment Type	Number of Opportunities	Points Possible per Opportunity	Points Possible by Type	Cumulative Points Possible
EDSE 619 Final Exam	1 test	10 points	10 points	10 points
Weekly Quizzes	12 quizzes	10 points	130 points	140 points
EDSE 621 Final Exam	1 test	100 points	100 points	240 points
Make Your Own Experiment Project (Applied)	1 project submitted in 4 parts	20 points for parts 1, 2 and 3 40 points for part 4	60 points for parts 1, 2 and 3 40 points for part 4	340 points

Make Your Own Experiment Project (Basic)	1 project submitted in 4 parts	20 points for parts 1, 2 and 3 <b>40 points for part 4</b>	60 points for parts 1, 2 and 3 <b>40 points for part 4</b>	440 points
Reaction Video Posted on Discussion Board	1 forum	10 points	10 points	450 points
Interteaching Assignments	9 assignments	10 points	90 points	540 points
CITI Training Module	1 module	30 points	10 points	570 points
Synchronous Discussions	4 discussions	2 points	8 points	578 points
Synchronous Discussion Summaries	4 discussions	10 points	40 points	618 points

### Grading Criterion:

Grade	Percentage	Grade	Percentage	Grade	Percentage
A+	97-100%	A	96-93%	A-	92-90%
B+	87-89%	B	83-86%	B-	80-82%
C	77-79%	F	76% and Below		

\*Note: The George Mason University Honor Code will be strictly enforced. Students are responsible for reading and understanding the Code. “To promote a stronger sense of mutual responsibility, respect, trust, and fairness among all members of the George Mason University community and with the desire for greater academic and personal achievement, we, the student members of the university community, have set forth this honor code: Student members of the George Mason University community pledge not to cheat, plagiarize, steal, or lie in matters related to academic work.” Work submitted must be your own or with proper citations (see <https://catalog.gmu.edu/policies/honor-code-system/>).

### Professional Dispositions

Students are expected to exhibit professional behaviors and dispositions at all times. See <https://cehd.gmu.edu/students/polices-procedures/>

### Class Schedule

\*Note: Faculty reserves the right to alter the schedule as necessary, with notification to students.

Date	Topics	Assignments/Activities	Content Hours Distribution
Week 1 Week of May 21	Review Syllabus Review Honor Code Review APA Format Review Make Your Own Experiment Assignments  Introduction to Single subject design – Pinpointing and Defining Behavior	<ul style="list-style-type: none"> <li>✓ Complete Week 1 Quiz 1 (covering the syllabus) by 11:59 pm 1/29/18</li> <li>✓ Complete EDSE 619 Final Exam by 11:59 pm 5/27</li> <li>✓ Synchronous Discussion 5:30 pm 5/23</li> <li>✓ Complete Synchronous Meeting Notes</li> <li>✓ Read CT Ch 1 and 2</li> <li>✓ Read ABA Ch 1, pp. 65 – 69</li> <li>✓ Complete Week 1 Quiz 2 by 11:59 pm 5/29</li> <li>✓ Select and submit topics for Make Your Own Experiment by May 30</li> </ul>	<ul style="list-style-type: none"> <li>✓ Quiz 1: 15 min</li> <li>✓ Review Test: 50 min</li> <li>✓ Synchronous Discussion: 60 min</li> <li>✓ Synchronous meeting notes: 20 minutes</li> <li>✓ Recorded content: 25 min</li> <li>✓ Recorded content: 10 min</li> <li>✓ Quiz 2: 15 min</li> <li>✓ Select Topics for Make Your Own Experiment: 45 min</li> </ul>
Week 2 Week of May 28	Research Ethics  Measurement – Why bother? Direct Measures of Behavior: count, cumulative count, duration, rate, latency, interresponse time, extensity, intensity	<ul style="list-style-type: none"> <li>✓ Read CT Ch 3 and 4</li> <li>✓ Read ABA Ch 7</li> <li>✓ Complete Week 2 Quiz by 11:59 pm 6/3</li> <li>✓ Interteaching Assignment Week 2</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 40 min</li> <li>✓ Recorded content: 35 min</li> <li>✓ Quiz: 15 min</li> <li>✓ Week 2 Interteaching</li> </ul>

		<ul style="list-style-type: none"> <li>✓ Assignment 1: Make your Own Experiment (Applied) and Make your Own Experiment (Basic)</li> </ul>	<p>Assignment: 60 min</p> <ul style="list-style-type: none"> <li>✓ Assignment 1: Make your Own Experiment (Applied) and (Basic): 30 min</li> </ul>
<p>Week 3 Week of June 4</p>	<p>Defining Behavior Sampling</p>	<ul style="list-style-type: none"> <li>✓ Read CT Ch 5 and 6</li> <li>✓ Read ABA Ch 3</li> <li>✓ Synchronous discussion 6/5</li> <li>✓ Complete Synchronous Meeting Notes</li> <li>✓ Complete Week 3 Quiz by 11:59 pm 6/10</li> <li>✓ Interteaching Assignment Week 3</li> <li>✓ Assignment 2: Make your Own Experiment (Applied) and Make your Own Experiment (Basic)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 20 min</li> <li>✓ Recorded content: 40 min</li> <li>✓ Synchronous discussion 60 minutes</li> <li>✓ Synchronous meeting notes: 20 minutes</li> <li>✓ Quiz: 15 min</li> <li>✓ Week 3 Interteaching Assignment: 60 min</li> <li>✓ Assignment 2: Make your Own Experiment (Applied) and (Basic): 40 min</li> </ul>
<p>Week 4 Week of June 11</p>	<p>Continuous Measurement</p>	<ul style="list-style-type: none"> <li>✓ Read CT Ch 7 through and inc. 10</li> <li>✓ Read ABA Ch 4</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 50 min</li> <li>✓ Recorded content: 35</li> </ul>

		<ul style="list-style-type: none"> <li>✓ Complete Week 4 Quiz by 11:59 pm 6/17</li> <li>✓ Interteaching Assignment Week</li> <li>✓ Assignment 3: Make your Own Experiment (Applied)</li> </ul>	<ul style="list-style-type: none"> <li>min</li> <li>✓ Quiz: 30 min</li> <li>✓ Week 4 Interteaching Assignment: 60 min</li> <li>✓ Assignment 3: Make your Own Experiment (Applied): 40 min</li> </ul>
Week 5 Week of June 18	Discontinuous Measurement  Choice	<ul style="list-style-type: none"> <li>✓ Read CT Ch 11 and 12</li> <li>✓ Complete Week 5 Quiz by 11:59 pm 6/24</li> <li>✓ Interteaching Assignment Week 5</li> <li>✓ Assignment 3: Make your Own Experiment (Basic)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 45 min</li> <li>✓ Quiz: 15 min</li> <li>✓ Week 5 Interteaching Assignment: 60 min</li> <li>✓ Assignment 3: Make your Own Experiment (Basic): 40 min</li> </ul>
Week 6 Week of June 25	Treatment Integrity  Interobserver Agreement	<ul style="list-style-type: none"> <li>✓ Read CT Ch 13 and 14</li> <li>✓ Read ABA Ch 5 and 10</li> <li>✓ Complete Week 6 Quiz by 11:59 pm 7/1</li> <li>✓ Interteaching Assignment Week 6</li> <li>✓ Work on Make Your Own</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 30 min</li> <li>✓ Recorded content: 60 min</li> <li>Quiz: 15 min</li> <li>✓ Week 6 Interteaching Assignment: 60 min</li> </ul>

		Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic)	✓ Make Your Own Experiment (Applied) and Make Your Own Experiment (Basic): 60 min
Week 7 Week of July 2	Equal Interval Graphing	<ul style="list-style-type: none"> <li>✓ Read CT Ch 15 and 16</li> <li>✓ Read ABA Ch 6</li> <li>✓ Complete Week 7 Quiz by 11:59 pm 7/8</li> <li>✓ Interteaching Assignment Week 7</li> <li>✓ Continue to work on Make Your Own Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 30 min</li> <li>✓ Recorded content: 40 min</li> <li>✓ Quiz: 15 min</li> <li>✓ Week7 Interteaching Assignment: 60 min</li> <li>✓ Make Your Own Experiment (Applied) and Make Your Own Experiment (Basic): 60 min</li> </ul>
Week 8 Week of July 9	<p>Standard Behavior Charting</p> <p>Design and Functional Control</p> <p>Human Subjects Protection</p>	<ul style="list-style-type: none"> <li>✓ Read CT Ch 17 and 18</li> <li>✓ Read ABA Ch 8</li> <li>✓ Synchronous discussion 7/10</li> <li>✓ Complete Synchronous Meeting Notes</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 20 min</li> <li>✓ Recorded content: 20 min</li> <li>✓ Synchronous discussion 60 minutes</li> <li>✓ Synchronous meeting notes: 20 minutes</li> </ul>

		<ul style="list-style-type: none"> <li>✓ Complete Week 8 Quiz by 11:59 pm 7/15</li> <li>✓ Submit CITI Training Certificate by 11:59 pm 7/15</li> <li>✓ Interteaching Assignment Week 8</li> <li>✓ Submit draft of Make Your Own Experiment Assignment 4 (Applied)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Quiz: 15 min</li> <li>✓ CITI Training (Basic): 50 min</li> <li>✓ Week 8 Interteaching Assignment: 60 min</li> <li>✓ Make Your Own Experiment Assignment 4 (Applied): 60 min</li> </ul>
Week 9 Week of July 16	Multiple Baseline/Multiple Probe Design  Changing Criterion Design	<ul style="list-style-type: none"> <li>✓ Read CT Ch 19 and 20</li> <li>✓ Read ABA Ch 9</li> <li>✓ Complete Week 9 Quiz by 11:59 pm 7/22</li> <li>✓ Submit draft of Make Your Own Experiment Assignment 4 (Basic)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 35 min</li> <li>✓ Recorded content: 20 min</li> <li>✓ Quiz: 15 min</li> <li>✓ Make Your Own Experiment Assignment 4 (Basic): 60 min</li> </ul>
Week 10 Week of July 23	Alternate Treatment Design  Component and Parametric Analysis	<ul style="list-style-type: none"> <li>✓ Read CT Ch 21 and 22</li> <li>✓ Read ABA Ch 8</li> <li>✓ Complete Week 10 Quiz by 11:59 pm 7/29</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 35 min</li> <li>✓ Recorded content: 20 min</li> <li>✓ Quiz: 15 min</li> </ul>

		<ul style="list-style-type: none"> <li>✓ Synchronous discussion 7/24</li> <li>✓ Complete Synchronous Meeting Notes</li> <li>✓ Submit Reaction Video you're your chosen reading <b>in the discussion forum</b> by 11:59 pm 7/29 and your comments are due by 8/5</li> <li>✓ Interteaching Assignment Week 10</li> <li>✓ Work on revisions Make Your Own Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic)</li> </ul>	<ul style="list-style-type: none"> <li>✓ Synchronous discussion: 60 min</li> <li>✓ Synchronous meeting notes: 20 minutes</li> <li>✓ Reaction video: 30 min</li> <li>✓ Week 10 Interteaching Assignment: 60 min</li> <li>✓ Revisions for Make Your Own Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic): 60 min</li> </ul>
Week 11 Week of July 30	Work on Make Your Own Experiment Assignments (Basic and Applied)	<ul style="list-style-type: none"> <li>✓ Read CT chapters 23 and 24</li> <li>✓ Complete Week 11 Quiz by 11:59 pm 8/5</li> <li>✓ Interteaching Assignment Week 11</li> <li>✓ Work on revisions Make Your Own</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 50 min</li> <li>✓ Quiz: 15 min</li> <li>✓ Week 11 Interteaching Assignment: 60</li> <li>✓ Revisions for Make Your</li> </ul>

		Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic)	Own Experiment Assignment 4 (Applied) and Make Your Own Experiment (Basic): 60 min
Week 12 Week of August 6	Radical Behaviorism and measurement of overt and covert behavior  Final Exam and Make Your own Experiment Project Due No Later than 8/11	<ul style="list-style-type: none"> <li>✓ Listen to Whatever happened to psychology as the science of behavior (Skinner, 1986).</li> <li>✓ Submit final draft Make Your own Experiments documents (Applied and Basic) to TK20 no later than 11:59 pm on 8/11</li> <li>✓ Complete your final exam online by 8/11</li> </ul>	<ul style="list-style-type: none"> <li>✓ Recorded content: 50 min</li> <li>✓ Make you Own Experiment (Applied): 60 min</li> <li>✓ Make your Own Experiment (Basic): 60 min</li> <li>✓ Final exam: 120 min</li> </ul>

### Core Values Commitment

The College of Education and Human Development is committed to collaboration, ethical leadership, innovation, research-based practice, and social justice. Students are expected to adhere to these principles: <http://cehd.gmu.edu/values/>

### GMU Policies and Resources for Students

#### Policies

- Students must adhere to the guidelines of the Mason Honor Code (see <https://catalog.gmu.edu/policies/honor-code-system/>).
- Students must follow the university policy for Responsible Use of Computing (see

<http://universitypolicy.gmu.edu/policies/responsible-use-of-computing/>).

- Students are responsible for the content of university communications sent to their Mason email account and are required to activate their account and check it regularly. All communication from the university, college, school, and program will be sent to students **solely** through their Mason email account.
- Students with disabilities who seek accommodations in a course must be registered with George Mason University Disability Services. Approved accommodations will begin at the time the written letter from Disability Services is received by the instructor (see <http://ods.gmu.edu/>).
- Students must silence all sound emitting devices during class unless otherwise authorized by the instructor.

### Campus Resources

- Support for submission of assignments to Tk20 should be directed to [tk20help@gmu.edu](mailto:tk20help@gmu.edu) or <https://cehd.gmu.edu/aero/tk20>. Questions or concerns regarding use of Blackboard should be directed to <http://coursessupport.gmu.edu/>.
- For information on student support resources on campus, see <https://ctfe.gmu.edu/teaching/student-support-resources-on-campus>

**For additional information on the College of Education and Human Development, please visit our website <https://cehd.gmu.edu/students/>.**

### Assessment Rubric(s)

#### Assessment #5 EDSE 621—Make Your Own Experiment Project

Task List Items	1 Does Not Meet Expectations	2 Meets Expectations	3 Exceeds Expectations
Measurement – Applied Research	Given a scenario describing a behavioral need in an applied setting, the candidate: <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-</li> </ul>	Given a scenario describing a behavioral need in an applied setting, the candidate: <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-</li> </ul>	Given a scenario describing a behavioral need in an applied setting, the candidate: <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-</li> </ul>

	<p>analytic (non-mentalistic) terms.</p> <ul style="list-style-type: none"> <li>• Selects one measure for the behavior of interest, and does four or fewer of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen that addresses dimensions of the behavior and logistics of observing and recording.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data (including the schedule of observation and recording periods).</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a standard behavior chart.</li> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> </ul> </li> </ul> </li> </ul>	<p>analytic (non-mentalistic) terms.</p> <ul style="list-style-type: none"> <li>• Selects one measure for the behavior of interest, and does each of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen that addresses dimensions of the behavior and logistics of observing and recording.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data (including the schedule of observation and recording periods).</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a standard behavior chart.</li> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> </ul> </li> </ul> </li> </ul>	<p>analytic (non-mentalistic) terms.</p> <ul style="list-style-type: none"> <li>• Selects two or more measures for the behavior of interest, and does each of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen that addresses dimensions of behavior and logistics of observing and recording.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data (including the schedule of observation and recording periods).</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a standard behavior chart.</li> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> </ul> </li> </ul> </li> </ul>
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	<ul style="list-style-type: none"> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul>	<ul style="list-style-type: none"> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul>	<ul style="list-style-type: none"> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul>
<b>Experimental Design</b>	<p>Given a scenario describing a behavioral need in an applied setting, the candidate does four or fewer of the following:</p> <ul style="list-style-type: none"> <li>▪ Selects an experimental design that will answer the scenario’s question,</li> <li>▪ Gives a clinically sound rationale for that design selection,</li> <li>▪ Writes step by step instructions for how that experimental design will be implemented, including: <ul style="list-style-type: none"> <li>○ Decision Rules for introducing the intervention</li> <li>○ Decision rules for withdrawing the intervention (if there are withdrawals) or for introducing the intervention in another setting, for another therapist, with another participant, etc.;</li> <li>○ Designs from which one may select include:</li> </ul> </li> </ul>	<p>Given a scenario describing a behavioral need in an applied setting, the candidate does each of the following:</p> <ul style="list-style-type: none"> <li>▪ Selects an experimental design that will answer the scenario’s question,</li> <li>▪ Gives a clinically sound rationale for that design selection,</li> <li>▪ Writes step by step instructions for how that experimental design will be implemented, including: <ul style="list-style-type: none"> <li>○ Decision Rules for introducing the intervention</li> <li>○ Decision rules for withdrawing the intervention (if there are withdrawals) or for introducing the intervention in another setting, for another therapist, with another participant, etc.;</li> <li>○ Designs from which one may select include:</li> </ul> </li> </ul>	<p>Given a scenario describing a behavioral need in an applied setting, the candidate does each of the following:</p> <ul style="list-style-type: none"> <li>▪ Selects an experimental design that will answer the scenario’s question,</li> <li>▪ Gives a clinically sound rationale for that design selection,</li> <li>▪ Writes step by step instructions for how that experimental design will be implemented, including: <ul style="list-style-type: none"> <li>○ Decision Rules for introducing the intervention</li> <li>○ Decision rules for withdrawing the intervention (if there are withdrawals) or for introducing the intervention in another setting, for another therapist, with another participant, etc.;</li> <li>○ Designs from which one may select include:</li> </ul> </li> </ul>

	<ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> <li>▪ Identifies at least two relevant threats to internal validity given the scenario</li> <li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> <li>▪ Identifies at least two relevant threats to internal validity given the scenario</li> <li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li> </ul>	<ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> <li>▪ Transforms the design into either a parametric analysis or a component analysis to assess necessary levels of intervention or necessary intervention components: <ul style="list-style-type: none"> <li>○ Writes step by step instructions for conducting the parametric analysis or component analysis</li> <li>○ Provides decision rules for making condition changes in the context of parametric analysis or component analysis</li> </ul> </li> <li>▪ Identifies at least two relevant threats</li> </ul>
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			<p>to internal validity given the scenario</p> <ul style="list-style-type: none"> <li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li> </ul>
<p><b>Measurement – Basic Research</b></p>	<p><b>Given a scenario describing a basic research question, the candidate:</b></p> <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-analytic (non-mentalistic) terms.</li> <li>• Selects one measure for the behavior of interest, and does four or fewer of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data.</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a</li> </ul> </li> </ul>	<p><b>Given a scenario describing a basic research question, the candidate:</b></p> <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-analytic (non-mentalistic) terms.</li> <li>• Selects one measure for the behavior of interest, and does each of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data.</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a</li> </ul> </li> </ul>	<p><b>Given a scenario describing a basic research question, the candidate:</b></p> <ul style="list-style-type: none"> <li>• Defines the behavior, including any relevant private events, in behavior-analytic (non-mentalistic) terms.</li> <li>• Selects two or more measures for the behavior of interest, and does each of the following for that measure: <ul style="list-style-type: none"> <li>○ Gives a clinically sound rationale for the measure chosen.</li> <li>○ Develops a behavioral data recording form.</li> <li>○ Writes step by step instructions for collecting the data.</li> <li>○ Prepares a graph potential behavioral data using either an equal interval graph, cumulative record, or a</li> </ul> </li> </ul>

	<p>standard behavior chart.</p> <ul style="list-style-type: none"> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul> </li> </ul>	<p>standard behavior chart.</p> <ul style="list-style-type: none"> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul> </li> </ul>	<p>standard behavior chart.</p> <ul style="list-style-type: none"> <li>○ Measures from which the student chooses are: <ul style="list-style-type: none"> <li>▪ Count</li> <li>▪ Rate</li> <li>▪ Duration</li> <li>▪ Latency</li> <li>▪ IRT</li> <li>▪ Percentage</li> <li>▪ Trials to Criterion</li> </ul> </li> </ul>
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	<p>setting, for another therapist, with another participant, etc.;</p> <ul style="list-style-type: none"> <li>○ Designs from which one may select include: <ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> </ul> </li> <li>▪ Identifies at least two relevant threats to internal validity given the scenario</li> <li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li> </ul>	<p>setting, for another therapist, with another participant, etc.;</p> <ul style="list-style-type: none"> <li>○ Designs from which one may select include: <ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> </ul> </li> <li>▪ Identifies at least two relevant threats to internal validity given the scenario</li> <li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li> </ul>	<p>setting, for another therapist, with another participant, etc.;</p> <ul style="list-style-type: none"> <li>○ Designs from which one may select include: <ul style="list-style-type: none"> <li>▪ Withdrawal Design (minimum ABAB)</li> <li>▪ Alternating treatments design</li> <li>▪ Changing criterion design</li> <li>▪ Multiple baseline design</li> <li>▪ Multiple probe design</li> <li>▪ Pairwise comparison</li> </ul> </li> <li>▪ Transforms the design into either a parametric analysis or a component analysis to assess necessary levels of intervention or necessary intervention components: <ul style="list-style-type: none"> <li>○ Writes step by step instructions for conducting the parametric analysis or component analysis</li> <li>○ Provides decision rules for making condition</li> </ul> </li> </ul>
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			<p>changes in the context of parametric analysis or component analysis</p> <ul style="list-style-type: none"><li>▪ Identifies at least two relevant threats to internal validity given the scenario</li><li>▪ Writes step by step instructions for how each of those threats to internal validity will be managed or minimized.</li></ul>
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