

**George Mason University**  
**College of Education and Human Development**  
**Early Childhood Education**

ECED 623.001 Creating Disciplinary Project-Based Learning Environments  
3 Credits, Spring 2024, In-person  
3/12/2024-4/29/2024, Mondays/ 5:30 pm-8:10 pm  
Thompson L019, Fairfax Campus

**Faculty**

Name: Carley Fisher-Maltese, PhD  
Office Hours: By Appointment  
Office Location: Thompson Hall 1251, Fairfax Campus  
Office Phone: 703-993-4848  
Email Address: [cfisherm@gmu.edu](mailto:cfisherm@gmu.edu)

**Required Prerequisites**

None

**University Catalog Course Description**

Explores the theoretical frameworks supporting project-based learning across content areas. Emphasizes inclusive practices through the implementation of universal design for learning practices. Examines strategies for immersing learners in inquiry experiences in social studies, science, mathematics, and literacy to develop critical problem-solving, investigation, thinking, and communication skills, domain specific knowledge, and habits of mind.

**Course Overview**

Not Applicable

**Course Delivery Method**

This course will be delivered using a lecture and/or hybrid format.

**Learner Outcomes or Objectives**

This course is designed to enable students to do the following:

1. Conduct a holistic class analysis of assessment data to understand and customize learning experiences for diverse young learners.
2. Engage in focused case studies to document, understand, and customize learning experiences for individual students.
3. Identify multiple developmental entry points (e.g., cognitive, social, emotional, linguistic, and physical) to draw learners into project-based learning experiences.
4. Examine research-based pedagogical principles informing project-based learning practices.
5. Explore discipline-specific project-based learning practices, including inquiry-based learning in social studies, problem-based learning in science and mathematics, and problem-solving in mathematics.

6. Design an interdisciplinary unit that leverages the project-based learning core practice framework to create disciplinary rich, authentic, iterative, and collaborative student-centered learning experiences.
7. Incorporate universal design for learning (i.e., engagement, representation, and action/expression) and appropriate differentiated instructional strategies to ensure all learners exercise complex thinking practices and remain meaningfully engaged in the learning process.
8. Design formative and summative assessment tools grounded in learning standards to document learners' engagement, domain-specific knowledge, and progression through the project-based learning unit.
9. Implement an interdisciplinary unit that leverages project-based learning core practices and universal design for learning principles (i.e., engagement, representation, and action/expression) to create disciplinary rich, authentic, iterative, and collaborative student-centered learning experiences.
10. Engage in reflective practices, independently and in collaboration with colleagues, to examine the effectiveness of core practices including the strategies, scaffolds, and intentional facilitation processes used to promote disciplinary rich, authentic, iterative, and collaborative learner-centered learning experiences and the integration of universal design for learning principles (i.e., engagement, representation, and action/expression).

### **Professional Standards**

Interstate Teacher Assessment and Support Consortium (InTASC) Standards

Upon completion of this course, students will have met the following professional standards:  
Not Applicable

### **Required Texts**

- American Psychological Association. (2020). *Publication manual of the American Psychological Association* (7th ed.). Author. ISBN: 9781433832178
- Grossman, P., Herrmann, Z., Kavanagh, S. S., & Pupik Dean, C. G. (2021). *Core practices for project-based learning: A guide for teachers and leaders*. Harvard Education Press. ISBN: 9781682536421

### **Additional Readings**

- Brooks, P., & Rock, T. C. (2018). Using social studies to lead project-based learning: An innovative teacher's story. *Social Studies and the Young Learner*, 31(2), 4–10.
- Capp, M. J. (2017). The effectiveness of universal design for learning: A meta-analysis of literature between 2013 and 2016. *International Journal of Inclusive Education*, 21(8), 791–807. <https://doi.org/10.1080/13603116.2017.1325074>
- CAST (2018). Universal Design for Learning Guidelines version 2.2. <http://udlguidelines.cast.org>
- Coogle, C. G., Storie S., & Rahn, N. L. (2022). A framework for promoting access, increasing participation, and providing support in early childhood classrooms. *Early Childhood Education Journal*, 50, 867–877. <https://doi.org/10.1007/s10643-021-01200-6>

- García-Campos, M. D., Canabal, C., & Alba-Pastor, C. (2020) Executive functions in universal design for learning: Moving towards inclusive education, *International Journal of Inclusive Education*, 24(6), 660–674. <https://doi.org/10.1080/13603116.2018.1474955>
- Hall, E. W., & Salmon, S. J. (2003). Chocolate chip cookies and rubrics: Helping students understand rubrics in inclusive settings. *Teaching Exceptional Children*, 35(4), 8–11.
- Hanuscin, D., & van Garderen, D. (2020). *Universal design for learning science: Reframing for elementary instruction in physical science*. NSTA Press.
- Kersten, S. (2017). Becoming nonfiction authors: Engaging in science inquiry. *The Reading Teacher*, 71(1), 33–41. <https://doi-org.mutex.gmu.edu/10.1002/trtr.1577>
- Larmer, J. (2018). Project-based learning in social studies. *Social Education*, 82(1), 20–23.
- Murata, A., & Stewart, C. (2017). Facilitating mathematical practices through visual representations. *Teaching Children Mathematics*, 23(7), 404–412. <https://www.jstor.org/stable/10.5951/teacchilmath.23.7.0404>
- Revelle, K. Z., Wise, C. N., Duke, N. K., & Halvorsen, A. L. (2019). Realizing the promise of project-based learning. *The Reading Teacher*, 73(6), 697–710. <https://doiorg.mutex.gmu.edu/10.1002/trtr.1874>
- Selmer, S. J., & Floyd, K. (2012). UDL for geometric length measurement. *Teaching Children Mathematics*, 19(3), 146–151. <https://www.jstor.org/stable/10.5951/teacchilmath.19.3.0146>
- Shanahan, T. & Shanahan, C. (2008). Teaching disciplinary literacy to adolescents: Rethinking content area literacy. *Harvard Educational Review*, 78(1), 40-59.

Additional readings will be posted to Blackboard as indicated on the class schedule. Readings will be influenced by the disciplinary focus students choose to complete for their projects.

### Course Performance Evaluation

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

Assignments	Due Dates	Points
Attendance and Participation <ul style="list-style-type: none"> <li>Self-evaluation</li> </ul>	Ongoing April 28	25
Integrated Universal Design for Learning and Project-Based Learning Plan		75
<ul style="list-style-type: none"> <li>Part 1: Class Descriptive Analysis</li> </ul>	March 25	15
<ul style="list-style-type: none"> <li>Part 2: Focused Case Studies</li> </ul>	April 1	10
<ul style="list-style-type: none"> <li>Part 3: Integrated Universal Design for Learning and Project-Based Plans <ul style="list-style-type: none"> <li>Part 3a: Developing Integrating Universal Design for Learning Principles Plan</li> <li>Part 3b: Developing Project-Based Learning Plan</li> </ul> </li> </ul>	April 8	35
<ul style="list-style-type: none"> <li>Part 4: Implementing, Assessing, and Analyzing the Project-Based Learning Experience with Integrated Universal Design Principles</li> </ul>	April 28	15
<b>TOTAL</b>		<b>100</b>

- **Assignments and/or Examinations**

## **Integrated Universal Design for Learning and Project-Based Learning Plan (75 points)**

### **Part 1: Class Descriptive Analysis (15 points)**

Students will complete a descriptive analysis of current students in their class. The analysis will include a rich description of community, school, and class context. Students will contextualize the multitude of diversities students bring with them into the classroom learning community, including detailing ability, linguistic, cultural, family structure, and economic diversities. Students will provide a holistic description of students' performances across cognitive, social, emotional, and physical domains. Students will use a combination of narrative text and data summaries to present a holistic description of the students and other essential educators in their learning community.

At the end of the analysis, students will identify discipline-specific content areas they want to prioritize when creating their universal design for learning, project-based learning experience. Students will use pseudonyms, initials, or case numbers throughout the class descriptive analysis. Students will use APA citations as appropriate throughout Part 1.

The class descriptive analysis may be submitted in a format meaningful to the student (e.g., assessment portfolio, descriptive analytical paragraphs, PowerPoint presentation of data sets, etc.). The format presentation needs to be clear and provide a complete representation of the class data.

### **Part 2: Focused Case Studies (10 points)**

Students will identify two learners within their classroom community as focal learners. Based on their class descriptive analysis, students will select two focal learners that encourage them to identify, design, and integrate different strategic universal design for learning principles. The selected focal case study learners should express different diversities (e.g., learners with IEPs, learners who are emergent bi- or multilingual, learners who bring cultural diversity to the classroom community, etc.).

Students will compile a case study report for each learner. Case study reports will compile data sets documenting each learner's cognitive, social-emotional, and/or physical expressions. Students will synthesize the data into brief case study reports characterizing each child's learning strengths, needs, and preferences. At the end of each case study report, students will identify universal design for learning strategies to enhance the learning environment to meaningfully engage each learner based on identified learning strengths, preferences, and needs. Students will use pseudonyms, initials, or case numbers throughout the class descriptive analysis. Students will use APA citations as appropriate throughout Part 2.

The Focused Case Studies may be submitted in a format meaningful to the student (e.g., assessment portfolio, descriptive analytical paragraphs, PowerPoint presentation of data sets,

etc.). The presentation format needs to be clear and provide a complete representation of the focused case studies.

### **Part 3: Integrated Universal Design for Learning and Project-Based Plans (35 points)**

Students will identify a discipline-specific content area to emphasize to create their universal design for learning, project-based learning experience. In Part 3, students will clearly articulate how they will intentionally integrate universal design for learning and project-based learning design principles. Although Part 3a and Part 3b are outlined separately to support students reflective design process during the planning phases, students will work to bring synergy between the two frameworks. Students will use an iterative design process to share their UDL and PBL plans with peer groups and course instructor(s) for enhancing feedback prior to implementation.

#### ***Part 3a: Developing Integrating Universal Design for Learning Principles Plan (15 points)***

Students will identify universal design for learning strategies to enhance the project-based learning environment for their learners. Students will use the blank universal design for learning guideline organizer to document the specific pedagogical practices they will leverage during the project-based learning experience to support universal design for learning goals for learners who are (a) purposeful and motivated, (b) resourceful and knowledgeable, and (c) strategic and goal directed. Specifically, students will use the universal design for learning guidelines (<https://udlguidelines.cast.org/>) to design and articulate project-based learning experiences that provide multiple means of *engagement, representation, and action and expression*. Students will integrate at least one concrete suggestion for each of the nine Universal Design for Learning Guidelines.

Students will use their descriptive analysis of their whole class to identify specific environmental and pedagogical enhancements for meaningfully engaging and supporting the whole class throughout the project-based learning experience. Students will identify specific environmental and pedagogical enhancements for each focus case study learner. The specific environmental and pedagogical enhancements will align with the identified learning strengths, preferences, and needs articulated in Part 1 and Part 2. Students will provide a rationale for each universal design for learning strategy suggested and use course literature to justify proposed strategies. Students will use APA citations throughout the rationale as appropriate. Students will use pseudonyms, initials, or case numbers throughout Part 3a as appropriate.

#### ***Part 3b: Developing Project-Based Learning Plan (20 points)***

Students will create a personally relevant project-based unit plan grounded in project-based learning goals. Students will use project-based learning principles to develop a discipline-specific learning experience based on identified learning strengths, needs, and preferences articulated in Part 1 and Part 2. Students will develop a project-based learning experience grounded in PBL goals that are (a) discipline specific, (b) collaborative, (c) authentic, and (d) iterative. Students will explicitly detail how they plan to integrate the core practices framing project-based learning experiences. Specifically, students will do the following:

- Use the project-based learning guide to design and articulate *disciplinary-specific* PBL experiences that do the following:
  - Orient learners to subject area content knowledge, skills, and learning standards;
  - Leverage disciplinary specific higher order thinking skills; and
  - Engage learners in disciplinary practices (Grossman et al., 2021, p. 31).
- Use the project-based learning guide to design and articulate *authentic* PBL experiences that do the following:
  - Support learners’ personal connections to the work and
  - Support learners in making contributions to the world (Grossman et al., 2021, p. 31).
- Use the project-based learning guide to design and articulate *iterative* PBL experiences that do the following:
  - Encourage learners to reflect and revise,
  - Provide learners with opportunities to receive and give supportive feedback regarding their work, and
  - Documents and monitors learners’ progress and feedback (Grossman et al., 2021, p. 31).
- Use the project-based learning guide to design and articulate *collaborative* PBL experiences that do the following:
  - Offer and support learners’ choices and
  - Support learners’ collaborations (Grossman, et al., 2021, p. 31).

Students will provide a rationale for each project-based learning goal in their plan and use course literature to justify proposed strategies. Students will use APA citations throughout the rationale as appropriate. Students will use pseudonyms, initials, or case numbers throughout Part 3b as appropriate.

**Part 4: Implementing, Assessing, and Analyzing the Integrated Universal Design for Learning and Project-Based Learning Experience (15 points)**

Students will implement, assess, and analyze their project-based learning experience with integrated universal design for learning principles. During the implementation phase, students will use an iterative design process to share their implementation experiences. Through discussion within their peer groups and course instructor(s), students will integrate feedback to enhance the implementation process. Students will use the iterative core practice strategies developed for providing feedback and documenting and monitoring student progress to strategically reflect on their learners’ experiences engaging in the project-based learning experience. Students’ evaluation will consider learning for the whole class as well as for each focus case study learner. Using the iterative project-based learning lens, students will evaluate how the project-based learning experience with integrated universal design for learning principles and strategies served to do the following:

- Promote all learners’ disciplinary-specific use of higher-order thinking skills, practices, and subject-area content knowledge;
- Facilitate learners’ collaborative efforts; and
- Support learners’ immersion in authentic learning opportunities.

Students will conclude their evaluation with specific recommendations for leveraging universal design for learning practices in future project-based learning experiences.

Students will choose from one of the following options to demonstrate the Implementing, Assessing, and Analyzing the Integrated Universal Design for Learning and Project-Based Learning Experience and are welcome to email the instructor proposing an alternative option:

- Write a three- to four-page, double-spaced paper, OR
- Create a video, OR
- Create a detailed graphic organizer, OR
- Submit an alternative option approved in advance by the instructor.

The format for Part 4 presentation needs to be clear and provide a complete representation of their experience.

- **Other Requirements**

### **Attendance and Participation (25 points)**

Active participation and engagement are imperative for optimal learning. Therefore, students will prepare for and participate in in-class and online activities. Students will be expected to do the following:

- Attend class, arrive on time, and stay for the entire class period for all in-person and online synchronous class sessions.
- Complete all online asynchronous work by the due dates.
- Use laptops and personal devices for instructional purposes only during in-person and online synchronous class sessions.
- Complete readings and prepare for class activities prior to class as evidenced by the ability to discuss, write about, and engage in activities related to the concepts presented and examined in the texts.
- Complete participation activities across the semester that complement the scheduled course topic. *Note: Instructors will periodically collect artifacts from the activities.*
- Support the participation and learning of classmates. Students in attendance and who actively engage in the learning experience will receive credit for their efforts. Graded participation activities are not announced and are implemented at the discretion of the instructor.
- Show evidence of critical reflective thinking through in-person, online synchronous, and online asynchronous discussions, activities, and written reflections.
- Display professional dispositions at all times when interacting with the instructor, classmates, and other professionals.
- Submit an attendance and participation self-evaluation.

### **Written Assignments**

All formal written assignments will be evaluated for content and presentation. The American Psychological Association, Seventh Edition (APA) style will be followed for all written work. All written work unless otherwise noted must be completed on a word processor and should be proofread carefully. (Use spell check!) If students are not confident of their own ability to catch errors, they should have another person proofread their work. When in doubt, they should check the APA manual. Portions of the APA manual appear at the Style Manuals link on the Mason library website at <http://infoguides.gmu.edu/content.php?pid=39979>. Students may consult the Writing Center for additional writing support.

Students will do the following:

1. Present ideas in a clear, concise, and organized manner. (Avoid wordiness and redundancy.)
2. Develop points coherently, definitively, and thoroughly.
3. Refer to appropriate authorities, studies, and examples to document where appropriate. (Avoid meaningless generalizations, unwarranted assumptions, and unsupported opinions.)
4. Use correct capitalization, punctuation, spelling, and grammar.
5. Type the paper with double spacing, indented paragraphs, 1-inch margins all around, and 12-point Times New Roman font.

- **Grading**

A = 95-100   A- = 90-94   B+ = 87-89   B = 80-86   C = 70-79   F = <70

Incomplete (IN): This grade may be given to students who are passing a course but who may be unable to complete scheduled coursework for a cause beyond reasonable control.

All CEHD students are held to the university grading policies as described in the Academic Policies section of the current catalog, which can be accessed at <http://catalog.gmu.edu>. Those students enrolled in a CEHD Licensure Graduate Certificate program, however, must earn a B- or better in all licensure coursework. A degree-seeking graduate student will be dismissed after accumulating grades of F in two courses or 9 credits of unsatisfactory grades (C or F) in graduate courses. A 3.0 grade point average is required for completion of the graduate degree.

### Professional Dispositions

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

### Class Schedule

Date	Topic	Readings & Assignments Due
Week 1 Mar 11	Overview  Examining the Project-Based Approach <ul style="list-style-type: none"><li>• Authentic</li><li>• Domain Specific</li><li>• Collaborative</li><li>• Iterative</li></ul>	Chapter 1 Grossman et al., 2021



	<p>Designing Learning Environments for Diverse Learners</p> <p>Examining Universal Design for Learning Principles</p> <p>Engagement, Representation, Action and Expression</p> <p>Understanding UDL Learner Goals</p> <ul style="list-style-type: none"> <li>• Purposeful and Motivated</li> <li>• Resourceful and Knowledgeable</li> <li>• Strategic and Goal Directed</li> </ul> <p>Introducing the Case Study</p>	<p>Capp (2017)</p> <p>CAST (2018)  <a href="https://udlguidelines.cast.org/">https://udlguidelines.cast.org/</a></p> <p>Coogle et al. (2021)</p>
<b>Week 2 Mar 18</b>	<p>Project-Based Learning Focal Point: Discipline Specific</p> <p>Examining Disciplinary Literacy Practices and Pedagogies</p>	<p>Chapter 2 Grossman et al., 2021</p> <p>Shanahan &amp; Shanahan (2008)</p>
	<p>Project-Based Learning Focal Point: Discipline Specific</p> <p>English Language Arts Project-Based Learning Approaches</p>	<p>Selected English/Language Arts Project-Based Learning Articles</p> <p>Revelle et al. (2019)</p> <p>Kersten (2017)</p>
<b>Week 3 Mar 25</b>	<p>Project-Based Learning Focal Point: Discipline Specific</p> <p>Mathematics and Problem-Based and Problem-Solving Approaches</p>	<p>Selected Math Project-Based Learning Articles</p> <p>Slemer &amp; Floyd (2012)</p> <p>Murata &amp; Stewart (2017)</p>
	<p>Project-Based Learning Focal Point: Discipline Specific</p> <p>Social Studies and the Inquiry Arc</p>	<p>Selected Social Studies Project-Based Learning Articles</p> <p>Brooks &amp; Rock (2018)</p> <p>Larmer (2018)</p> <p><b>Due to Bb (3/25): Part 1 Class Descriptive Analysis</b></p>

<p><b>Week 4 Apr 1</b></p>	<p>Project-Based Learning Focal Point: Authentic</p> <p>Finding an Audience</p> <p>Immersing Learners in Personally Relevant Problem-Based and Problem-Solving Approaches</p> <p>Science and Problem Based Learning</p> <p>Project-Based Learning Focal Point: Collaborate</p>	<p>Selected Science Project-Based Learning Articles</p> <p>Chapter 3 Grossman et al., 2021</p> <p>Chapters 1 &amp; 2 Hanuscin &amp; Van Garderen, 2020</p> <p>Chapter 4 Grossman et al., 2021</p> <p><b>Due to Bb (4/1): Part 2 Focused Case Studies</b></p>
<p><b>Week 5 Apr 8</b></p>	<p>Project-Based Learning Focal Point: Iterative</p> <p>Nurturing a Culture of Production, Feedback, Reflection, and Revision</p> <p>Sharing our Draft Designs</p> <p>Project-Based Learning Focal Point: Providing Meaningful Feedback</p> <p>Performance-Based Assessment Practices</p> <p>Rubrics and Ongoing Feedback Cycles</p>	<p>Chapter 5 Grossman et al., 2021</p> <p><b>Bring to Class (4/8): Drafts of Part 3 Integrated PBL and UDL plans (Part 3a &amp; b) to share with peers for feedback prior to implementation</b></p> <p>Chapter 6 Grossman et al., 2021</p> <p>Hall &amp; Salmon (2003)</p> <p><b>Bring to Class (4/8): Drafts of Part 3 Integrated PBL and UDL plans (Parts 3a &amp; b) to share with peers for feedback prior to implementation</b></p> <p><b>Due to Bb: Part 3a Integrating Universal Design For Learning Principles Plan (finalized versions due after class discussion) (15 points)</b></p> <p><b>Due to Bb: Part 3b Developing Project-Based Learning Plan (finalized versions due after class discussion) (20 points)</b></p>

<b>Week 6</b> <b>Apr 15</b>	Developing an Action Plan for Integrating and Implementing Universal Design for Learning and Project-Based Learning Principles	Chapter 7 Grossman et al., 2021
	Networking to Enhance Implementations of our Project-Based Learning Experiences  Focusing on Engaging and Supporting Learners in Authentic Project-Based Learning Experiences with Universal Design for Learning Principles	Chapter 8 Grossman et al., 2021
<b>Week 7</b> <b>Apr 22</b>	Networking to Enhance Implementations of our Project-Based Learning Experiences  Focusing on Supporting Meaningful Collaborations and Providing Effective Disciplinary Rich Feedback	García-Campos et al. (2020) Executive Functions in Universal Design for Learning: Moving Towards Inclusive Education  <b>Bring to Class: In-progress reflections documenting their process with Part 4 Implementing, Assessing, and Analyzing the Project-Based Learning Experience with Integrated Universal Design for Learning Principles</b>
	Focusing on Supporting Meaningful Collaborations to Share Disciplinary Rich Project-Based Learning with Authentic Audiences  Considering Next Steps in Developing Project-Based Learning Experiences	<b>Bring to Class: In-progress reflections documenting their process with Part 4 Implementing, Assessing, and Analyzing the Project-Based Learning Experience with Integrated Universal Design for Learning Principles</b>
<b>Week 8</b> <b>Apr 29</b>		<b>Due to Bb (4/28): Finalized Part 4 Implementing, Assessing, and Analyzing the Project-Based Learning Experience with Integrated Universal Design for Learning Principles</b>  <b>Due to Bb (4/28): Attendance and Participation Self-Evaluation</b>

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

## 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 <https://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://ds.gmu.edu/>).
- Students must follow the university policy stating that all sound emitting devices shall be silenced during class unless otherwise authorized by the instructor.

### *Campus Resources*

- Support for submission of assignments to VIA should be directed to [viahelp@gmu.edu](mailto:viahelp@gmu.edu) or <https://cehd.gmu.edu/aero/assessments>. Questions or concerns regarding use of Blackboard should be directed to <https://its.gmu.edu/knowledge-base/blackboard-instructional-technology-support-for-students/>.
- For information on student support resources on campus, see <https://ctfe.gmu.edu/teaching/student-support-resources-on-campus>.

**Notice of mandatory reporting of sexual assault, sexual harassment, interpersonal violence, and stalking:** As a faculty member, I am designated as a “Non-Confidential Employee” and must report all disclosures of sexual assault, sexual harassment, interpersonal violence, and stalking to Mason’s Title IX Coordinator per [University Policy 1202](#). If you wish to speak with someone confidentially, please contact one of Mason’s confidential resources, such as [Student Support and Advocacy Center](#) (SSAC) at 703-380-1434 or [Counseling and Psychological Services](#) (CAPS) at 703-993-2380. You may also seek assistance or support measures from Mason’s Title IX Coordinator by calling 703-993-8730 or emailing [titleix@gmu.edu](mailto:titleix@gmu.edu).

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

## Evaluation Guide

### ***Directions***

#### ***Part 3: Integrated Universal Design for Learning and Project-Based Plans (35 points)***

Students will identify a discipline-specific content area to emphasize to create their universal design for learning, project-based learning experience. In Part 3, students will clearly articulate how they will intentionally integrate universal design for learning and project-based learning design principles. Although Part 3a and Part 3b are outlined separately to support students reflective design process during the planning phases, students will work to bring synergy between the two frameworks. Students will use an iterative design process to share their UDL and PBL plans with peer groups and course instructor(s) for enhancing feedback prior to implementation.

#### ***Part 3a: Developing Integrating Universal Design for Learning Principles Plan (15 points)***

Students will identify universal design for learning strategies to enhance the project-based learning environment for their learners. Students will use the blank universal design for learning guideline organizer to document the specific pedagogical practices they will leverage during the project-based learning experience to support universal design for learning goals for learners who are (a) purposeful and motivated, (b) resourceful and knowledgeable, and (c) strategic and goal directed. Specifically, students will use the universal design for learning guidelines (<https://udlguidelines.cast.org/>) to design and articulate project-based learning experiences that provide multiple means of *engagement, representation, and action and expression*. Students will integrate at least one concrete suggestion for each of the nine Universal Design for Learning Guidelines.

### ***Evaluation Guide Part 3a***

Student plans will be evaluated on the components outlined in the following table. Accordingly, project plans should provide evidence of how the student integrated the universal design for learning principles.

Points	Components
/3	<p>The student used the universal design for learning principles to design and articulate project-based learning experiences that provide multiple means of <i>engagement</i>.</p> <ul style="list-style-type: none"> <li>• Plans provided options for <i>recruiting interest</i> using at least one of the following options:               <ul style="list-style-type: none"> <li>○ Optimized individual choice and autonomy</li> <li>○ Optimized relevance, value, and authenticity</li> <li>○ Minimized threats and distractions</li> </ul> </li> <li>• Plans sustained <i>effort and persistence</i> using at least one of the following options:               <ul style="list-style-type: none"> <li>○ Heightened salience of goals and objectives</li> <li>○ Varied demands and resources to optimize challenge</li> <li>○ Fostered collaboration and community</li> <li>○ Increased mastery-oriented feedback</li> </ul> </li> <li>• Plans promoted <i>self-regulation</i> using at least one of the following options:</li> </ul>

	<ul style="list-style-type: none"> <li>○ Promoted expectations and beliefs that optimize motivation</li> <li>○ Facilitated personal coping skills and strategies</li> <li>○ Developed self-assessment and reflection</li> </ul>
<p>___/3</p>	<p>The student used the universal design for learning principles to design and articulate project-based learning experiences that provide multiple means of <i>representation</i>.</p> <ul style="list-style-type: none"> <li>• Plans provided options for <i>perception</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Offered ways of customizing the display of information</li> <li>○ Offered alternatives for auditory information</li> <li>○ Offered alternatives for visual information</li> </ul> </li> <li>• Plans provided options for <i>language and symbols</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Clarified vocabulary and symbols</li> <li>○ Clarified syntax and structure</li> <li>○ Supported decoding of text, mathematical notation, and symbols</li> <li>○ Promoted understanding across languages</li> <li>○ Illustrated through multiple media</li> </ul> </li> <li>• Plans provided options for <i>comprehension</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Activated or supply background knowledge</li> <li>○ Highlighted patterns, critical features, big ideas, and relationships</li> <li>○ Guided information processing and visualization</li> <li>○ Maximized transfer and generalization</li> </ul> </li> </ul>
<p>___/3</p>	<p>The student used the universal design for learning principles to design and articulate project-based learning experiences that provide multiple means of <i>expression</i>.</p> <ul style="list-style-type: none"> <li>• Plans provided options for <i>physical action</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Varied the methods for response and navigation</li> <li>○ Optimized access to tools and assistive technologies</li> </ul> </li> <li>• Plans provided options for <i>expression and communication</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Used multiple media for communication</li> <li>○ Used multiple tools for construction and composition</li> <li>○ Built fluencies with graduated levels of support for practice and performance</li> </ul> </li> <li>• Plans promoted <i>executive functions</i> using at least one of the following options: <ul style="list-style-type: none"> <li>○ Guided appropriate goal-setting</li> <li>○ Supported planning and strategy development</li> <li>○ Facilitated managing information and resources</li> <li>○ Enhanced capacity for monitoring progress</li> </ul> </li> </ul>
<p>___/3</p>	<p>The student used the descriptive analysis of their whole class to identify specific environmental and pedagogical enhancements for meaningfully engaging and</p>

	supporting the <i>whole class</i> throughout the project-based learning experience. The specific environmental and pedagogical enhancements aligned with the identified learning strengths, preferences, and needs articulated in Part 1. The student included a rationale for each universal design for learning strategy suggested and used course literature to justify proposed strategies
___/3	The student identified specific environmental and pedagogical enhancements for each <i>focused case study learner</i> . The specific environmental and pedagogical enhancements aligned with the identified learning strengths, preferences, and needs articulated in Part 2. The student provided a rationale for each universal design for learning strategy suggested and used course literature to justify proposed strategies.
<i>expected</i>	The student used APA citations throughout the rationale as appropriate. The student used pseudonyms, initials, or case numbers throughout Part 3a and Part 3b as appropriate.

**Part 3b: Developing Project-Based Learning Plan (20 points)**

Students will create a personally relevant project-based unit plan grounded in project-based learning goals. Students will use project-based learning principles to develop a discipline-specific learning experience based on identified learning strengths, needs, and preferences articulated in Part 1 and Part 2. Students will develop a project-based learning experience grounded in PBL goals that are (a) discipline specific, (b) collaborative, (c) authentic, and (d) iterative. Students will explicitly detail how they plan to integrate the core practices framing project-based learning experiences.

*Evaluation Guide Part 3b*

Student plans will be evaluated on the components outlined in the following table. Accordingly, project plans should provide evidence of how the student integrated the project-based learning principles.

Points	Components
___/5	<p>The student used the project-based learning guide to design and articulate <i>disciplinary-specific</i> PBL experiences.</p> <ul style="list-style-type: none"> <li>• Plans oriented learners to subject area content knowledge, skills, and learning standards;</li> <li>• Plans leveraged disciplinary specific higher order thinking skills; and</li> <li>• Plans engaged learners in disciplinary practices (Grossman et al., 2021, p. 31).</li> </ul> <p>The student provided a rationale for each <i>disciplinary-specific</i> project-based learning goal in their plan and used course literature to justify proposed strategies.</p>
___/5	<p>The student used the project-based learning guide to design and articulate <i>authentic</i> PBL experiences.</p> <ul style="list-style-type: none"> <li>• Plans supported learners’ personal connections to the work and</li> <li>• Plans supported learners in making contributions to the world (Grossman et al., 2021, p. 31).</li> </ul>

	The student provided a rationale for each <i>authentic</i> project-based learning goal in their plan and used course literature to justify proposed strategies.
___/5	<p>The student used the project-based learning guide to design and articulate <i>iterative</i> PBL experiences.</p> <ul style="list-style-type: none"> <li>• Plans encouraged learners to reflect and revise,</li> <li>• Plans provided learners with opportunities to receive and give supportive feedback regarding their work, and</li> <li>• Plans showed how learners’ progress and feedback would be documented and monitored (Grossman et al., 2021, p. 31).</li> </ul> <p>The student provided a rationale for each <i>iterative</i> project-based learning goal in their plan and used course literature to justify proposed strategies.</p>
___/5	<p>The student used the project-based learning guide to design and articulate <i>collaborative</i> PBL experiences.</p> <ul style="list-style-type: none"> <li>• Plans offered and supported learners’ choices and</li> <li>• Plans supported learners’ collaborations (Grossman, et al., 2021, p. 31).</li> </ul> <p>The student provided a rationale for each <i>collaborative</i> project-based learning goal in their plan and used course literature to justify proposed strategies.</p>
<i>expected</i>	<p>The student used APA citations throughout the rationale as appropriate.</p> <p>The student used pseudonyms, initials, or case numbers throughout Part 3b as appropriate.</p>