

# Supplemental Material

*CBE—Life Sciences Education*

Branchaw *et al.*

***Entering Research 2<sup>nd</sup> Edition Development Team***

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## ***Entering Research 2<sup>nd</sup> Edition Activities***

1. Addressing Conflict
2. Aligning Mentor and Trainee Expectations
3. Article Organization, Comprehension, and Recall
4. Case Study: Authorship
5. Case Study: Awkward Mentor
6. Barriers to Effective Communication
7. Bias Literacy: Fair Play Video Game
8. Challenges Facing Diverse Teams
9. Communicating Research Findings 1: Poster Presentations
10. Communicating Research Findings 2: Oral Presentations
11. Communicating Research Findings 3: Developing Your Presentation
12. Communicating Science to the General Public
13. Coping Efficacy
14. Constructive and Destructive Group Behaviors
15. Counter-Storytelling
16. Case Study: Credit Where Credit Is Due
17. Developing a Curriculum Vitae
18. Discussion of the Nature of Science
19. Discussion with Experienced Undergraduate Researchers
20. Diversity in STEM
21. Elevator Sentences
22. Establishing Your Ideal Thesis Committee
23. Ethics Case: Discussion with Mentor
24. Finding a Research Mentor
25. Finding Potential Research Rotation Groups and Mentors
26. Fostering Your Own Research Self-Efficacy
27. Case Study: Frustrated
28. Funding Your Research
29. General Public Abstract
30. Importance of Reading in Graduate School
31. Interviewing for Graduate School
32. Case Study: Keeping the Data
33. Letter of Recommendation
34. Mentor Biography
35. Mentor Interview about Making Research Posters
36. Messages Sent and Received
37. Mini-Case Studies: Sticky Situations
38. Mini-Grant Proposal
39. My Mentoring and Support Network
40. Networking 1: Introduction to Networking
41. Networking 2: What Should Your Network Look Like?
42. Networking 3: Your Brand
43. Networking 4: Planning for Networking Opportunities and Engaging in Purposeful Interactions
44. Case Study: Overwhelmed
45. Personal Statement
46. Prioritizing Research Mentor Roles
47. Privilege and White Fragility

48. Professional Development Plans
49. Reflecting on Your Mentoring Relationship
50. Research Articles 1: Introduction
51. Research Articles 2: Guided Reading
52. Research Articles 3: Practical Reading Strategies
53. Research Careers: The Informational Interview
54. Research Documentation Process
55. Research Documentation: Can You Decipher This?
56. Research Experience Reflections 1: Entering Research?
57. Research Experience Reflections 2: Reflection Exercise
58. Research Experience Reflections 3: Research Experience Exit Interview
59. Research Group Diagram
60. Research Group Funding
61. Research Rotation Evaluation
62. Research Writing 1: Background Information and Hypothesis or Research Question
63. Research Writing 2: Research Project Outline and Scientific Abstracts
64. Research Writing 3: Project Design
65. Research Writing 4: Research Literature Review and Publishing Process
66. Research Writing 5: The Peer-Review Process
67. Research Writing 6: Research Proposal
68. Research Writing 7: Research Paper
69. Case Study: Responding to Feedback
70. Safety Training Checklist
71. Science and Society
72. Science Literacy Test
73. Science or Pseudoscience?
74. Searching Online Databases
75. Case Study: Selection of Data
76. Setting the Stage for Inclusive Discussions
77. Steps to Researcher Independence
78. Stereotype Threat
79. Summer Undergraduate Research Programs
80. The Next Step in Your Career
81. The Power of Social Persuasion
82. Case Study: The Sharing of Research Materials
83. Three Mentors
84. Three-Minute Research Story
85. Tips for Technical Writers
86. Truth and Consequences Article
87. Undergraduate Thesis 1: Components of an Undergraduate Research Thesis
88. Undergraduate Thesis 2: Thesis Writing Discussion Panel
89. Undergraduate Thesis 3: Developing a Thesis Writing Plan
90. Universalism in STEM: Case Study and Analysis
91. Case Study: "Selecting Speakers to Invite to Campus"
92. Visiting Peer Research Groups
93. What Happens to Research Results?
94. Case Study: Whatever you do, don't join our lab.
95. Why Diversity Matters in STEM Research
96. Your Research Group's Focus

## Default Question Block



### NRMN Informed Consent

Thank you for choosing to participate in this survey. Your responses will help us to determine which aspects of mentor training are working well or could be improved.

In order to continue the improvement of and knowledge around mentor training, we would like your permission to use the information collected in this survey for ongoing and future research, including research with collaborators outside of UW–Madison. Your information will be kept confidential and will only be shared with collaborators once all identifying information has been removed.

We would also like your permission to share your name and email with our research collaborators so that they can follow-up with you in the future. This will allow for a longitudinal study which will increase our knowledge about the effectiveness of mentor training programs.

If you have any questions or concerns please contact the UW–Madison Mentoring Research Team at [evaluation@med.wisc.edu](mailto:evaluation@med.wisc.edu).

Thank you!

**Please check the box below indicating which you would like to give permission for:**

- Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring and I agree to allow for my name and email to be shared with collaborators for future longitudinal studies.
- Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring but request that no identifying information be shared outside of the UW–Madison team.
- No, I do not give permission for the information collected to be used for ongoing and future research on mentoring.

First Name:

Last Name:

Institution:

Number of participants:

What was your facilitator role during this implementation?

- I was the sole facilitator
- I co-facilitated
- Combination of both

List co-facilitators in the space provided below:

### FAU1

Thank you for pilot testing activities that have been developed and adapted for *Entering Research, version 2*. We are very interested in your constructive feedback on how we can further improve the activities that you facilitated. Please be as specific as possible when responding to the questions below.

#### Part 1: Activity Feedback

Please indicate if activities listed on the left were implemented during your implementation and then rate the activity in the following areas. To review the learning objectives for any activity, move your cursor over the activity name.

	Was the activity implemented?		Did you have enough time to facilitate the activity?		Were the facilitator notes clear and complete?		Were the stu materials/hai clear and con
	Yes	No	Yes	No	Yes	No	Yes
[Insert ER2 Activity #1]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity #2]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity...]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Other adapted/new ERv2 activity not listed (write in activity name) <input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

For the following questions, please provide comments to explain your ratings in the above table. Comments can be general regarding your implementation as a whole or specific regarding individual activities. If providing comments about a specific activity, please include the activity's name. (EG Three Professors activity – did not have enough time to complete activity, would recommend 5 more minutes).

Comments on time allocated for activities:

Comments on clarity and completeness of facilitator notes:

Comments on clarity and completeness of student materials/handouts:

### Part 2: Activity Effectiveness

**From your perspective, how effective was the activity in helping mentees gain knowledge and/or improve their ability to do research? To review the learning objectives for any activity, move your cursor over the activity name.**

	Very Ineffective 1	Ineffective 2	Neither 3	Effective 4	Very Effective 5
[Insert ER2 Activity #1]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity #2]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity...]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Other adapted/new ERv2 activity not listed (write in activity name)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Comments on how effective each activity was in helping mentees gain knowledge and/or improve their ability to do research:

Any additional comments?

## Demographics

Which race(s) do you identify with?

- American Indian or Alaskan Native
- Asian
- Black or African American
- Native Hawaiian or Pacific Islander
- White
- Other (please specify)
- Prefer not to report

Are you Hispanic or Latino?

- No I am not Hispanic or Latino
- Yes I am Cuban
- Yes I am Mexican or Chicano
- Yes I am Puerto Rican
- Yes I am Other Hispanic or Latino (please specify)
- Prefer not to report

Which of the following best describes your gender identity?

- Male
- Female
- Transgender
- Intersex
- Other (please specify)
- Prefer not to report

Thank you!



## Default Question Block



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Thank you!

**Please check the box below indicating which you would like to give permission for:**

- Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring and I agree to allow for my name and email to be shared with collaborators for future longitudinal studies.
- Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring but request that no identifying information be shared outside of the UW–Madison team.
- No, I do not give permission for the information collected to be used for ongoing and future research on mentoring.

### Introduction

You have been invited to complete this survey because you participated in a course or workshop that used activities from a curriculum called *Entering Research*. The next set of questions will ask you about your experiences with these "Entering Research activities"; please answer each question honestly.

## SECTION 1: Trainee Background

First Name:

Last Name:

Email:

Institution:

Prior to participating in this workshop, did you have research experience?

- Yes  
 No

If yes, which categories best describe your research experience?

- I provided general support to a research team (eg made solutions, washed glassware, ordered supplies)
- I participated in a classroom-based research project (e.g. a research project embedded in a course, rather than a research group)
- I was an assistant to an independent researcher (eg helped a graduate student with experiments or data analysis)
- I conducted my own independent research project
- Other (please describe)

Please provide a general description of your previous research experience. Include time frame, research area, type of position and a brief description of duties. (E.g. Fall 2015, one semester research experience in a neuroscience lab, mixing solutions & ordering supplies, providing general research support).

Are you currently involved in a research experience?

- Yes

No

How effective would you rate each of these Entering Research activities in helping you to gain knowledge and/or improve your ability to do research? To review the learning objectives for any activity, move your cursor over the activity name.

	Did you participate in the activity?			From your perspective, please rate how effective this activity was in helping you gain knowledge and/or improve your ability to do research?				
	Yes	No	I don't remember	Very ineffective	Ineffective	Neither ineffective or effective	Effective	Very effective
[Insert ER2 Activity #1]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity #2]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
[Insert ER2 Activity...]	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

What aspects of this activity did you find the most useful?

What aspects of this activity could be improved?

### Overview Questions & Learning Assessment

How would you rate the following:

	Poor	Fair	Neutral	Good	Excellent
Your experience with the activities in this workshop	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Overall, how effective were the facilitators in guiding discussion during this workshop?

Very ineffective       Ineffective       Neither ineffective or effective       Effective       Very Effective

How likely are you to recommend participation in the activities included in this workshop?

Very Unlikely       Unlikely       Undecided       Likely       Very Likely

Overall, was your participation in this workshop a valuable use of your time?

- Yes
- No

Overall, how would you rate your current level knowledge and skills as a researcher?

	Novice			Intermediate				Advanced			
	0	1	2	3	4	5	6	7	8	9	10
Current level of knowledge & skills											

Any additional comments?

Do you identify a first-generation college student? A first-generation college student is a student whose parents ***did not*** attend college.

- Yes, I am a first-generation college student
- No, I am not a first-generation college student
- I am not sure

Did you transfer to your undergraduate institution from a 2-year college or another university?

- Yes
- No

Training stage:

- 1st year undergraduate
- 2nd year undergraduate
- 3rd year undergraduate
- 4th year undergraduate
- 5th year undergraduate
- Post baccalaureate
- 1st year graduate student
- 2nd year graduate student
- 3rd year graduate student
- 4th year graduate student
- 5th year graduate student
- Other

## Section 2: Demographics

Age:

Which race(s) do you identify with?

- American Indian or Alaskan Native
- Asian
- Black or African American
- Native Hawaiian or Pacific Islander
- White
- Other (please specify)
- Prefer not to report

Are you Hispanic or Latino?

- No I am not Hispanic or Latino
- Yes I am Cuban
- Yes I am Mexican or Chicano
- Yes I am Puerto Rican
- Yes I am Other Hispanic or Latino (please specify)
- Prefer not to report

Which of the following best describes your gender identity? Please check all that apply:

- Male
- Female
- Transgender
- Intersex
- Other (please specify)
- Prefer not to report

Thank you!



## Facilitating Entering Research Workshop Agenda

<b>Day 1 - Introduction to Entering Research &amp; Facilitation</b>	
8:00 - 8:30 am	Welcome and Networking with Continental Breakfast
8:30 - 9:00 am	Overview of Workshop/Introductory Activity
9:00 - 9:20 am	Entering Research (a brief history)
9:20 - 9:50 am	Using “Backward Design” to Develop a Curriculum Step 1: a. Identify & b. Prioritize Learning Objectives
9:50 - 10:20 am	Step 2: Implementation Plan: Constraints & Opportunities
10:20 - 10:35 am	<b>BREAK</b>
10:35 - 11:10 am	Step 3: Identifying and Selecting Activities (Introduction)
11:10 - 11:25 am	Steps 4 & 5: Learning Assessment & Implementation Evaluation Tools
11:25 am - 12:10 pm	Demonstration: Facilitating, Not Lecturing
12:10 - 12:15 pm	Practice Facilitation: Introduction
12:15 - 1:00 pm	<b>Working LUNCH (prep time for practice facilitation)</b>
1:00 - 2:30 pm	Practice Facilitation: Rounds 1 - 3
2:30 - 2:45 pm	<b>BREAK</b>
2:45 - 3:45 pm	Practice Facilitation: Rounds 4 - 5
3:45 - 4:15 pm	Practice Facilitation Debrief
4:15 - 4:30 pm	Day 1 Homework & Next Steps: Prioritizing Learning Objectives and Nesting into Course/Program Goals (Step 1b)
<b>Day 2 - Developing Your Curriculum and Implementation Plan</b>	
8:00 - 8:20 am	Welcome and Review with Continental Breakfast
8:20 - 8:30 am	Day 1 Homework: Pair & Share
8:30 - 9:30 am	Work Time: Selecting and Aligning Learning Activities with Objectives
9:30 - 10:30 am	Work Time: Selecting Assessment and Evaluation Tools with Objectives
10:30 - 11:00 am	<b>BREAK &amp; Group Photo</b>
11:00 am - 12:00 pm	The CIMER Assessment Platform (CAP)
12:00 - 1:00 pm	<b>LUNCH</b>
1:00 - 1:15 pm	Ongoing Support & Community for Entering Research Facilitators
1:15 - 2:00 pm	Check In: How’s it going? Where are you stuck? How can we help?
2:00 - 3:15 pm	Work Time: <i>Do it now, before you go home and don’t have time!</i>
3:15pm - 3:30 pm	Wrap Up & Workshop Evaluation

## Default Question Block



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## 1. How valuable was each of the following topics/activities during Day 1 of the workshop?

	Not at All Valuable 1	Somewhat Valuable 2	Valuable 3	Very Valuable 4	Extremely Valuable 5	N/A
Overview of Workshop	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Introduction to Entering Research, 2nd edition	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Using Backward Design to Develop a Curriculum	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Identifying and Selecting ER2 Curricular Activities on the CIMER website	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
ER Trainee Learning Assessment & Course/Program Evaluation Tools	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Facilitating, Not Lecturing (Facilitation Modeling)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Practice Facilitation	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Day 1 Homework (Establishing & Prioritizing Learning Goals)	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

## 2. How valuable was each of the following topics/activities during Day 2 of the workshop?

	Not at all Valuable 1	Somewhat Valuable 2	Valuable 3	Very Valuable 4	Extremely Valuable 5	N/A
Referencing Activity Review Sheet (Pre-Work) in building your curriculum	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Curriculum Development Packet	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Sharing and Prioritizing Learning Objectives in Pairs	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Implementation Planning: Opportunities & Constraints	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Selecting and Aligning Activities with Learning Objectives	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Selecting and Aligning Implementation Evaluation/Learning Assessment Tools with Program/Course Goals	Not at all Valuable ①	Somewhat Valuable ②	Valuable ③	Very Valuable ④	Extremely Valuable ⑤	N/A
Curriculum Development Work Time	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Discussion of Challenges & Strategies	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Ongoing support for Entering Research Facilitators	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

### 3. Please rate the following aspects of the workshop.

	Poor 1	Fair 2	Good 3	Very Good 4	Excellent 5	N/A
Facilitation of the Activities during the Workshop	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The Entering Research Curriculum	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Participant Materials	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Workshop Leaders	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Workshop Pacing	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Workshop Length	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The Workshop Overall	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

To what extent do you feel you met each of the following workshop objectives?

	Not at all	A little	A moderate amount	A lot	A great deal
Identify areas of trainee development for your program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Select learning objectives for your program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Identify curricular materials for your program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

	Not at all	A little	A moderate amount	A lot	A great deal
Select evaluation and assessment tools for your program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Develop an implementation plan for your program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Identify challenges you may face	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Learn strategies to address challenges you may face	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Become familiar with resources & community available to Entering Research facilitators	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**4. Please indicate your CONFIDENCE in your ability to do the following BEFORE attending this workshop and NOW:**

	Not at all Confident 1	2	3	Moderately Confident 4	5	6	Extremely Confident 7	N/A
To utilize the available Entering Research curricula and supporting resources - BEFORE	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To utilize the available Entering Research curricula and supporting resources - NOW	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To facilitate research mentee training using the process-based approach - BEFORE	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To facilitate research mentee training using the process-based approach - NOW	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

	Not at all Confident 1	2	3	Moderately Confident 4	5	6	Extremely Confident 7	N/A
To implement research mentee training at your home institution - BEFORE	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To implement research mentee training at your home institution - NOW	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To use metrics and tools to assess the effectiveness and impact of research mentee training - BEFORE	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To use metrics and tools to assess the effectiveness and impact of research mentee training - NOW	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To understand the implementation process - BEFORE	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
To understand the implementation process - NOW	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Please indicate how much you agree or disagree with the following:

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
The time spent on building my curriculum was a valuable use of my time	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
The time spent in small group discussions/sharing was a valuable use of my time.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

At what stage was the curriculum plan for your program *prior* to attending the Facilitating Entering Research workshop?

- I was starting from scratch - I did not have a syllabus or curriculum plan.
- I had a draft syllabus or curriculum plan that I wanted to complete or modify.
- I had a complete syllabus or curriculum plan that I had used many times and wanted to revise/improve.

Please indicate how complete your plans are for each of the following: (0 = not complete; 100 = complete)

0    10    20    30    40    50    60    70    80    90    100

Your Curriculum  
Plan

Your Evaluation Plan

Your Implementation  
Plan

What, if anything, could we have done differently that would have helped your progress with your curriculum, evaluation, and/or implementation plans?

Have your implementation plans changed as a result of attending this workshop?

- Yes
- No

If yes, please explain any changes in your implementation plans:

**5. What were the greatest strengths of the workshop or what did you find most helpful?**

**6. What could the planners do to improve this workshop?**

**7. What are the barriers to successfully implementing training at your institution?**

**8. Please describe any additional support or resources you would need in order to effectively implement training.**

**9. Anything else?**

Are you interested in participating in future and ongoing research on mentee training and the Entering Research curriculum?

- Yes, please contact me with additional information
- No, thanks

**Name:**

(Your name and other identifying information will only be used for tracking purposes if you participate in other NRMN trainings. This information will not be shared beyond our collaborators.)

**What is your title?** (choose all that apply)

Tenure Track

- Assistant Professor
- Associate Professor
- Professor

Non Tenure Track

- Assistant Scientist or Researcher
- Associate Scientist or Researcher
- Scientist or Researcher
- Clinical Instructor
- Lecturer or Instructor

Administration

- Dean
- Associate Dean
- Assistant Dean
- Training Program Director

Trainee

- Post Doctoral Fellow
- Clinical Fellow
- Graduate Student
- Other (please specify)

**What percentage of your job is dedicated to implementing mentee training?**



**Are you Hispanic or Latino?**

- No I am not Hispanic or Latino
- Yes I am Cuban
- Yes I am Mexican or Chicano
- Yes I am Puerto Rican
- Yes I am Other Hispanic or Latino (please specify)
- Prefer not to report

**With which race(s) do you identify?** (choose all that apply)

- American Indian or Alaskan Native
- Asian
- Black or African American
- Native Hawaiian or Pacific Islander
- White
- Other (please specify)
- Prefer not to report

**Which of the following best describes your gender identity?** (choose all that apply)

- Male
- Female
- Transgender
- Intersex
- Other (please specify)
- Prefer not to report

**Thank you!**

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## Default Question Block



### NRMN Informed Consent

Thank you for choosing to participate in this survey. Your responses will help us to determine which aspects of mentor training are working well or could be improved.

In order to continue the improvement of and knowledge around mentor training, we would like your permission to use the information collected in this survey for ongoing and future research, including research with collaborators outside of UW-Madison. Your information will be kept confidential and will only be shared with collaborators once all identifying information has been removed.

We would also like your permission to share your name and email with our research collaborators so that they can follow-up with you in the future. This will allow for a longitudinal study which will increase our knowledge about the effectiveness of mentor training programs.

If you have any questions or concerns please contact the UW-Madison Mentoring Research Team at [evaluation@med.wisc.edu](mailto:evaluation@med.wisc.edu).

Thank you!

**Please check the box below indicating which you would like to give permission for:**

Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring and I agree to allow for my name and email to be shared with collaborators for future longitudinal studies.

Yes, I agree to allow the information collected to be used for ongoing and future research on mentoring but request that no identifying information be shared outside of the UW-Madison team.

No, I do not give permission for the information collected to be used for ongoing and future research on mentoring.

Name:

What is your current institution/organization?

Have you changed institutions/organizations since attending the facilitator workshop?

Yes, please list former institution/organization:

No

What is your title? [choose all that apply]

Tenure Track

Assistant Professor

Associate Professor

Professor

Non Tenure Track

Assistant Scientist or Researcher

Associate Scientist or Researcher

Scientist or Researcher

Clinical Instructor

Lecturer or Instructor

## Administration

Dean

Associate Dean

Assistant Dean

Training Program Director

## Trainee

Post Doctoral Fellow

Clinical Fellow

Graduate Student

 Other (please specify)

Why did you originally choose to attend the facilitator training workshop?

Since attending the Facilitating Entering Research workshop, have you implemented any form of mentee training using activities from *Entering Research*?

Yes

No, but have plans to implement

No

Please fill out the below table with the number of each type of training you have implemented/plan to implement each year since attending the Facilitating Entering Research workshop. If you did not implement any mentee training for that year, enter "0"

	2017	2018	2019
Standalone/1 -2 day workshop	<input type="text"/>	<input type="text"/>	<input type="text"/>
Workshop series (3 or more workshops)	<input type="text"/>	<input type="text"/>	<input type="text"/>
Course/Seminar offered for credit	<input type="text"/>	<input type="text"/>	<input type="text"/>

	2017	2018	2019
Multi-week seminar as part of Summer Research Program (e.g., NSF REU)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

How are your mentee training implementations supported? check all that apply?

Institutionally funded

Extramurally funded

Other (please specify):

What is/are the funding mechanism(s) supporting your mentee training program? Check all that apply:

NIH, Bridges to the Baccalaureate

NIH, IMSD

NIH, MARC-USTAR

NIH, PREP

NIH - RISE

NIH - Bridges to the Doctorate

NIH - BUILD

NIH - MRSEC

NIH - INBRE

NIH - T32

NSF - REU

NSF - CAREER

NSF - RTG

NSF - CREST

NSF -LSAMP

NSF - EPSCoR

NSF - NRT

Department of Education

Howard Hughes Medical Institute (HHMI)

Other (please specify):

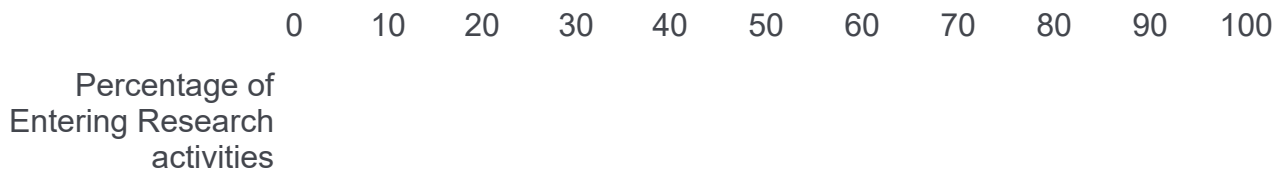
What career/trainee stage(s) are your implementations designed for? Check all that apply:

Undergraduate students

Graduate students

Other

Of the implementations that used the Entering Research curriculum, what percentage (on average) of the activities that you used were from the Entering Research curriculum?



How often did your trainings address each of the following Areas of Trainee Development, including activities outside of the Entering Research curriculum? Hold your mouse over each area of trainee development for a brief definition.

	Never 1	Sometimes 2	About half the time 3	Most of the time 4	Always 5
<a href="#">Research Comprehension &amp; Communication Skills</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
<a href="#">Practical Research Skills</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
<a href="#">Research Ethics</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
<a href="#">Researcher Identity</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
<a href="#">Researcher Confidence &amp; Independence</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
<a href="#">Equity &amp; Inclusion Awareness &amp; Skills</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

	Never 1	Sometimes 2	About half the time 3	Most of the time 4	Always 5
<a href="#">Professional &amp; Career Development Skills</a>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

In general, how would you rate the overall quality of your implementations?

Very low                      Low                      Average                      High                      Very high

Why have you not implemented mentee training? check all that apply

No institutional funding/support for mentee training

Not enough interest in mentee training

My mentee training program has ended (e.g., grant funding was not renewed)

Other (please specify):

How helpful was attending the Facilitating Entering Research workshop in preparing you to implement this training?

Extremely unhelpful      Unhelpful      Neither unhelpful or      Helpful      Extremely helpful  
1                      2                      helpful                      4                      5  
3

How confident do you feel in your ability to implement mentee training, thinking back to before attending the Facilitating Entering Research workshop, and now after implementing mentee training?

	Not at all Confident 1	2	3	Moderately Confident 4	5	6	Extremely Confident 7	N/A
Before attending the facilitator training	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Now after implementing	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

How prepared did you feel to implement mentee training after attending the Facilitating Entering Research workshop?

A great deal

A lot

A moderate amount

A little

Not at all

Did you participate in Pilot Testing of Entering Research, either before or after attending the Facilitator Training?

Yes

No

Not sure

Have you joined our MyNRMN Facilitators of Entering Research online community?

Yes

No

How useful has this community been in supporting your implementations?

Not at all useful

Slightly useful

Moderately useful

Very useful

Extremely useful

How could this online community better support you? List topics you would like addressed or other ways that the online community can continue to support your implementation efforts.



Is there anything else that you would like to share with us about the process of implementing mentee training or how we can support your mentee training implementations?

Are you interested in participating in future and ongoing research on mentee training and the Entering Research curriculum?

Yes, please contact me with additional information

No, thanks

Which race(s) do you identify with?

American Indian or Alaskan Native

Asian

Black or African American

Native Hawaiian or Pacific Islander

White

Other (please specify)

Prefer not to report

Are you Hispanic or Latino?

No I am not Hispanic or Latino

Yes I am Cuban

Yes I am Mexican or Chicano

Yes I am Puerto Rican

Yes I am Other Hispanic or Latino (please specify)

Prefer not to report

Which of the following best describes your gender identity?

Male

Female

Transgender

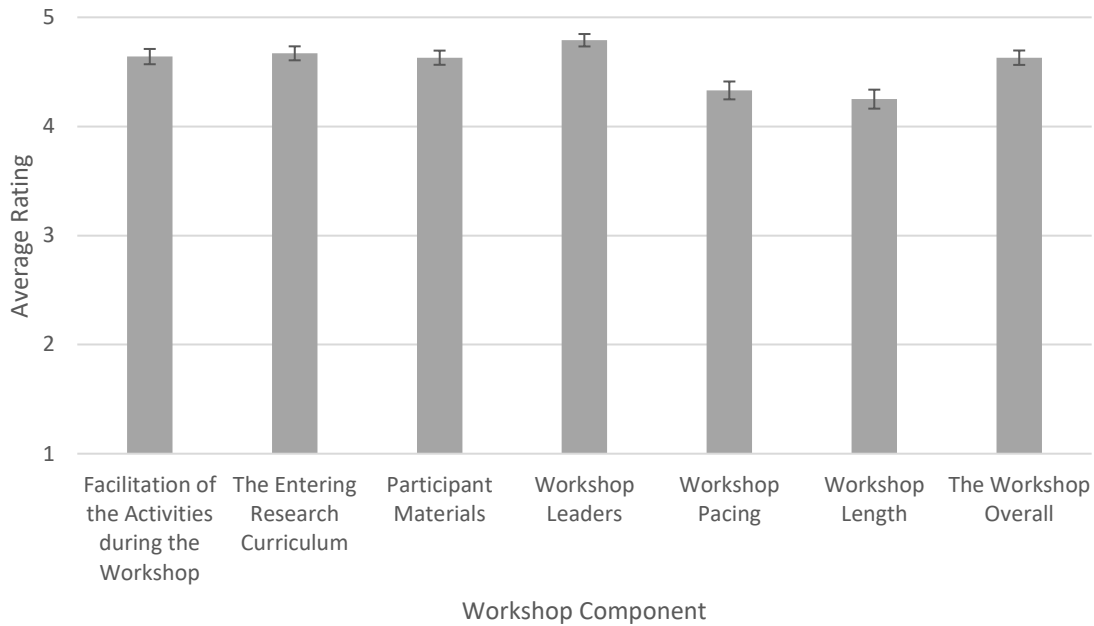
Intersex

Other (please specify)

Prefer not to report

Thank you!

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**Figure S1 – ER Facilitator Training Workshop Component Ratings** Participants’ overall rating of the Facilitator Training Workshop. Participants were asked to “please rate the following aspects of the workshop.” Responses could range from 1 (*poor*) to 5 (*excellent*). Error bars represent the standard error of the mean. ( $N = 92$ )

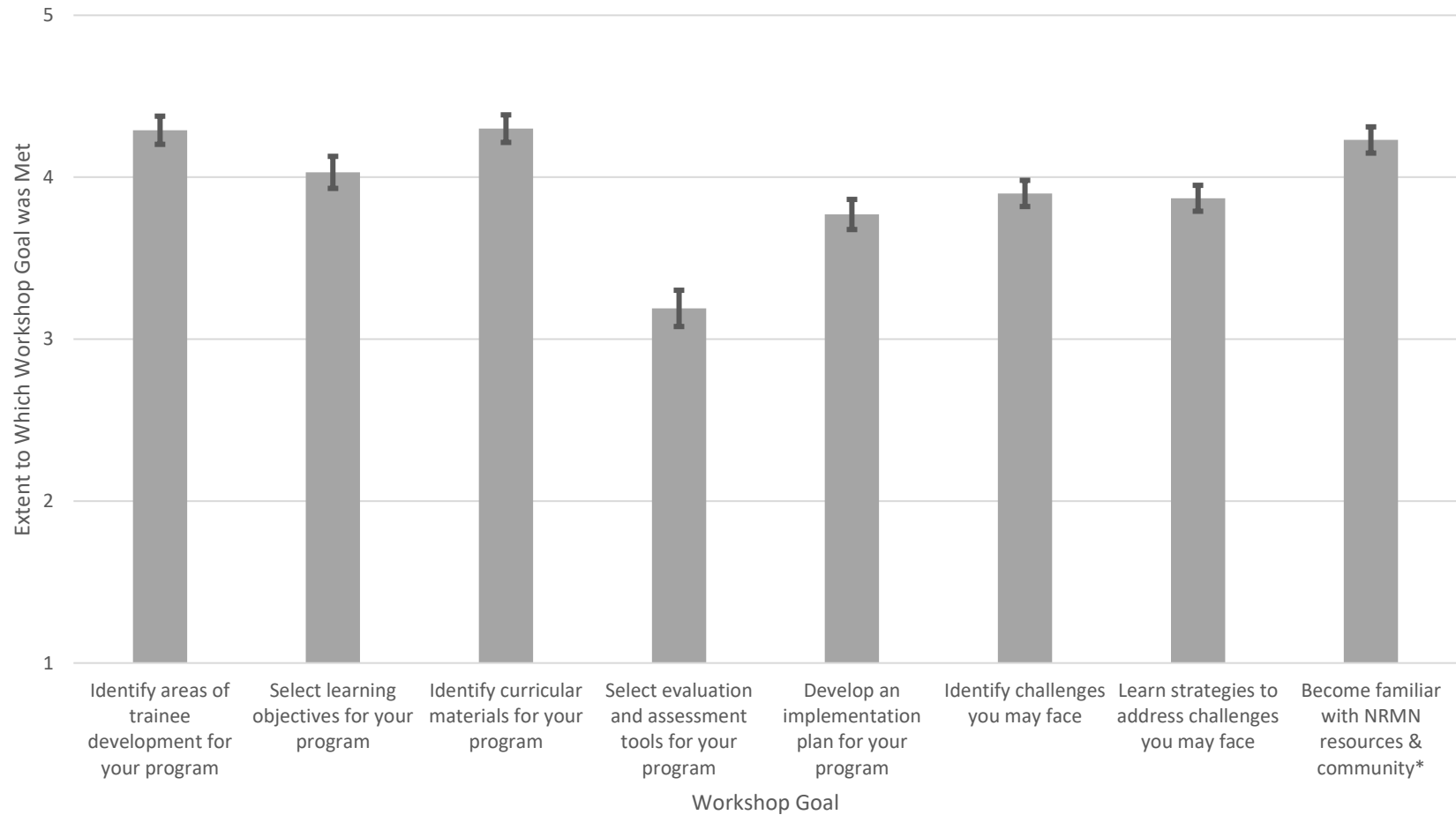
Table S1

## Perceived Value of Workshop Activities

Workshop Goals Specific Activities	Total N	Workshop				Overall M (SE)
		1 M (SE) (N = 17)	2 M (SE) (N = 28)	3 M (SE) (N = 21)	4 M (SE) (N = 28)	
<b>Identifying Areas of Trainee Development</b>						
<i>Introduction to Entering Research, version 2</i>	89	4.24 (.202)	4.43 (.120)	3.95 (.170)	3.92 (.169)	4.15 (.082)
<i>Navigating the Curriculum</i>	88	4.38 (.155)	4.56 (.123)	4.19 (.164)	4.29 (.153)	4.36 (.074)
<b>Practicing Facilitation</b>						
<i>Facilitating, Not Lecturing (Facilitation Modeling)</i>	89	4.29 (.206)	4.32 (.179)	4.14 (.186)	4.13 (.192)	4.22 (.094)
<i>Discussion of Facilitation Challenges</i>	14	3.86 (.254)	---	---	---	3.86 (.254)
<i>Practice Facilitation</i>	90	4.47 (.151)	4.71 (.101)	4.38 (.201)	4.25 (.243)	4.47 (.091)
<b>Identifying Learning Objectives and Activities for Programs</b>						
<i>Day 1 Homework: Activity Review</i>	66	4.24 (.291)	3.93 (.145)	3.48 (.190)	---	3.86 (.118)
<i>Using Activity Review (Homework) in building your curriculum</i>	75	---	3.86 (.168)	3.67 (.174)	3.35 (.248)	3.63 (.118)
<i>Using Backward Design to Develop a Curriculum</i>	24	---	---	---	3.71 (.185)	3.71 (.185)
<i>Day 1 Homework (Establishing &amp; Prioritizing Learning Goals)</i>	25	---	---	---	3.88 (.233)	3.88 (.233)
<i>Sharing and Prioritizing Learning Objectives in Pairs</i>	25	---	---	---	3.60 (.231)	3.60 (.231)
<i>Selecting and Aligning Activities with Learning Objectives</i>	26	---	---	---	3.92 (.199)	3.92 (.199)
<b>Evaluation &amp; Assessment Tools</b>						
<i>Evaluation &amp; Assessing Trainees</i>	45	---	---	4.05 (.161)	4.00 (.181)	4.02 (.121)
<i>Planning your Evaluation</i>	21	---	---	3.43 (.130)	---	3.43 (.130)
<i>Selecting and Aligning Implementation Evaluation/Learning Assessment Tools with Program/Course Goals</i>	23	---	---	---	3.74 (.220)	3.74 (.220)
<b>Implementation Plan</b>						
<i>Building your Curriculum</i>	64	4.63 (.155)	4.41 (.122)	3.76 (.181)	---	4.25 (.097)
<i>Planning your Implementation</i>	63	3.73 (.316)	3.70 (.158)	3.52 (.164)	---	3.65 (.114)

<i>Implementation Planning: Opportunities &amp; Constraints</i>	26	---	---	---	3.62 (.193)	3.62 (.193)
<i>Curriculum Development Packet</i>	25	---	---	---	3.80 (.216)	3.80 (.216)
<i>Curriculum Development Work Time</i>	25	---	---	---	4.52 (.209)	4.52 (.209)
<b>Challenges &amp; Strategies</b>						
<i>Brainstorming: Challenges &amp; Strategies</i>	62	3.64 (.308)	3.64 (.187)	3.55 (.198)	---	3.61 (.125)
<i>Discussion of Challenges &amp; Strategies</i>	85	4.00 (.210)	3.68 (.212)	3.89 (.169)	4.17 (.206)	3.92 (.105)
<b>Resources &amp; Community</b>						
<i>Ongoing support for Entering Research Facilitators</i>	82	4.00 (.253)	4.12 (.156)	3.89 (.186)	4.32 (.170)	4.11 (.092)

*Note.* Questions where there is no response indicate that the question was not asked as part of that workshop implementation. Responses could range from 1 (*not at all valuable*) to 5 (*Extremely valuable*). CIMER = Center for the Improvement of Mentored Experiences in Research ([www.cimerproject.org](http://www.cimerproject.org)) *SE* = Standard error of the mean.



**Figure S2 – ER Facilitator Training Workshop Objective Ratings** Participants were asked “To what extent do you feel you met each of the following workshop objectives?” Responses could range from 1 (*not at all*) to 5 (*a great deal*). \*This question was changed to “become familiar with resources & community available to *Entering Research* facilitators” for the third and fourth workshops included in analysis. Error bars represent the standard error of the mean. ( $N = 91$ )