

## INTRODUCTION TO THE URSSA SURVEY

Hello!

This survey, the Undergraduate Research Student Self-Assessment survey, or URSSA, asks about your research program and your experience of doing science research. You are being asked to fill out this survey because, as a participant, you are in a unique position to provide feedback on what you learned from the experience, supply information about program effects, and offer suggestions for improvement.

This online survey will take about ten minutes to fill out and asks you to rate what you learned from participating in your most recent research experience and how it has contributed to your academic success and influenced thinking about your future.

Please know that filling out this survey is voluntary and that all responses are confidential.

Thank you!

Ethnography & Evaluation Research  
University of Colorado, Boulder

## INFORMATION ABOUT YOU

What is your sex?

I am female

I am male

What is your race? (Select one or more)

American Indian or Alaskan Native

Asian

Black or African American

Native Hawaiian or Other Pacific Islander

White

Other (please specify)

What is your ethnicity? (Choose one)

Hispanic or Latino/Latina

Not Hispanic or Latino/Latina

## INFORMATION ABOUT YOU

What year are you in school?

Freshman/rising sophomore

Sophomore/rising junior

Junior/rising senior

Senior

Other (please specify)

What is your primary major? (Please select from the choices in the drop-down menu)

If "other" please specify:

How did you find out about research opportunities on this campus? (Select all that apply)

- I knew this institution offered research opportunities to undergraduates before coming here
- I found out about research opportunities from a professor
- I found out about research opportunities from an academic advisor
- I found out about research opportunities from a department announcement (flyer, email, website, etc.)
- I found out about research opportunities from an undergraduate research program announcement (flyer, email, website, etc.)
- I found out about research opportunities from a presentation given by faculty members about their research
- I found out about research opportunities from a presentation given by students about their research
- I found out about research opportunities from WebGURU
- Other

If "other" please specify:

## INFORMATION ABOUT YOU

What motivated you to do research? (Select all that apply)

- I wanted to explore my interest in science
- I wanted to gain hands-on work experience in research
- I wanted to find out what it was like to do research
- I wanted to do research to clarify which field I wanted to study
- I wanted to do research to clarify whether graduate school would be a good choice for me
- I wanted to do research to clarify whether I wanted to pursue a science research career
- I wanted a good intellectual challenge
- I wanted to work more closely with a particular faculty member based on previous class experience
- I wanted to do research because of the program's strong reputation
- I wanted to do research to get letters of recommendation
- I wanted to do research to enhance my application to graduate/medical school
- I wanted to do research to enhance my résumé
- Other

If "other" please specify:

How much do you agree or disagree with the following statements:

	Strongly disagree	Disagree	Agree	Strongly agree
I chose this college/university, in part, because it offers undergraduate research opportunities	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
I chose this college/university, in part, because of this/a specific research program	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

How many times have you participated in ACADEMIC YEAR research?

- I have not participated in academic year research
- One semester, or one quarter
- Two semesters, or two quarters
- Three semesters, or three quarters
- Four semesters, or four quarters
- Five semesters, or five quarters, or more

How many times have you participated in SUMMER research?

- I have not participated in summer research
- One summer
- Two summers
- Three summers

## INFORMATION ABOUT YOU

For your most recent research experience, did you do research in your primary major?

- Yes
- No

If your most recent research experience was not in your primary major, in what discipline did you do research? (Please specify)

What was the funding source supporting your most recent research experience?

If "other" please specify:

How important was the stipend/money you were paid in allowing you to do research?

- Not at all important
- Slightly important
- Important
- Very important

Are you a "visiting researcher" --doing research away from your home institution?

- Yes
- No

Are you an international student?

- Yes
- No

During the coming year, we will be asking you to fill out some other surveys for this evaluation. It would be very helpful to us if you would be willing to provide your date of birth and provide a response to the following question so that we may track your responses over time. Again, all of your responses are confidential.

MM DD YYYY  
 What is your date of birth?  /  /

What street did you grow up on?

## THE RESEARCH PROGRAM

The following ask about aspects of the research program.

How satisfied or dissatisfied were you with the following aspects of the research program:

	Not applicable	Very dissatisfied	Somewhat dissatisfied	Somewhat satisfied	Very satisfied
The application process	jn	jn	jn	jn	jn
Descriptions of research mentors' projects posted on the program website in helping me choose a research project	jn	jn	jn	jn	jn
Ease in locating a research mentor	jn	jn	jn	jn	jn
Ease in securing a research position	jn	jn	jn	jn	jn
Laboratory space	jn	jn	jn	jn	jn
Laboratory equipment	jn	jn	jn	jn	jn

## THE RESEARCH PROGRAM

How satisfied or dissatisfied were you with the following aspects of the research program:

	Not applicable	Very dissatisfied	Somewhat dissatisfied	Somewhat satisfied	Very satisfied
Support and guidance from program staff	jn	jn	jn	jn	jn
Support and guidance from my research mentor	jn	jn	jn	jn	jn
Support and guidance from other research team members	jn	jn	jn	jn	jn
Weekly research group meetings	jn	jn	jn	jn	jn
Financial support	jn	jn	jn	jn	jn
Housing	jn	jn	jn	jn	jn
Field trips	jn	jn	jn	jn	jn
Group social activities	jn	jn	jn	jn	jn

Please feel free to comment on the value to you of any of these aspects of the research program.

## RESEARCH PROGRAM ACTIVITIES

The following ask about formal program activities you may have engaged in during your research experience.

### GRADUATE SCHOOL AND CAREER INFORMATION

How MUCH did the following program activities help clarify your career plans?

	Did not do this activity	No help at all	A little help	Much help	Very much help
Session(s) offered on choosing a graduate school program	ja	ja	ja	ja	ja
Session(s) offered on applying to graduate school	ja	ja	ja	ja	ja
"Graduate School Night"	ja	ja	ja	ja	ja
Session(s) offered on careers in your field	ja	ja	ja	ja	ja
"Career Day"	ja	ja	ja	ja	ja
Information provided by the career counseling center	ja	ja	ja	ja	ja
Field trips	ja	ja	ja	ja	ja

Please feel free to comment on the value to you of any of these program activities.

## RESEARCH PROGRAM ACTIVITIES

### TRAINING SESSIONS

How MUCH did the following activities support your learning?

	Did not do this activity	Not at all	A little	A good amount	A great deal
Workshop(s) on science writing and presentation	ja	ja	ja	ja	ja
Training in library/internet/database search methods	ja	ja	ja	ja	ja
Safety training	ja	ja	ja	ja	ja
Ethics seminar(s)	ja	ja	ja	ja	ja
Training in human subjects regulations	ja	ja	ja	ja	ja
Training in animal subjects regulations	ja	ja	ja	ja	ja
Training in Institutional Review Board (IRB) processes	ja	ja	ja	ja	ja

Were you required to get Institutional Review Board (IRB) certification to conduct research?

- Not applicable
- Yes
- No

Please feel free to comment on the value to you of any of these aspects of the research program.

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

The following asks you to rate types of benefits that you may have gained from your most recent research experience.

### Gains in THINKING AND WORKING LIKE A SCIENTIST: *APPLICATION OF KNOWLEDGE TO RESEARCH WORK*

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Understanding how science research is done	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Understanding how to collect scientific data	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Analyzing data for patterns	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Interpreting results from analyzing scientific data	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Figuring out the next step in the research project	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Problem-solving in general	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Formulating a research question that could be answered with data	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Identifying limitations in research methods and designs	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Identifying flaws in the interpretation of data	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

## Gains in THINKING AND WORKING LIKE A SCIENTIST: *GAINS IN UNDERSTANDING*

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Understanding the theory and concepts guiding my research project	jn	jn	jn	jn	jn
Understanding the connections among scientific disciplines	jn	jn	jn	jn	jn
Understanding the relevance of research to my coursework	jn	jn	jn	jn	jn
Understanding concepts in depth	jn	jn	jn	jn	jn
Extending my knowledge	jn	jn	jn	jn	jn
Solidifying my knowledge	jn	jn	jn	jn	jn

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

### PERSONAL GAINS RELATED TO RESEARCH WORK

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Confidence in my ability to do research	jn	jn	jn	jn	jn
Confidence in my ability to contribute to science	jn	jn	jn	jn	jn
Comfort in discussing scientific concepts with my research mentor	jn	jn	jn	jn	jn
Comfort in discussing scientific concepts with other research students	jn	jn	jn	jn	jn
Comfort in working collaboratively with others	jn	jn	jn	jn	jn
Confidence in my ability to do well in future science courses	jn	jn	jn	jn	jn

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

### Gains in BECOMING A SCIENTIST

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Ability to work independently	jn	jn	jn	jn	jn
Developing patience with the slow pace of research	jn	jn	jn	jn	jn
Understanding what everyday research work is like	jn	jn	jn	jn	jn
Taking greater care in conducting lab procedures	jn	jn	jn	jn	jn

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

### Gains in SKILLS

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Writing scientific reports or papers	jñ	jñ	jñ	jñ	jñ
Making oral presentations	jñ	jñ	jñ	jñ	jñ
Defending an argument when asked questions	jñ	jñ	jñ	jñ	jñ
Explaining my project to people outside my field	jñ	jñ	jñ	jñ	jñ
Preparing a poster	jñ	jñ	jñ	jñ	jñ
Keeping a detailed lab notebook	jñ	jñ	jñ	jñ	jñ

## BENEFITS GAINED FROM RESEARCH EXPERIENCE

### Gains in SKILLS (continued)

How much did you GAIN in any of the following areas as a result of your most recent research experience?

	I did not do this activity	No gain	A little gain	Good gain	Great gain
Conducting observations in the lab or field	jñ	jñ	jñ	jñ	jñ
Using statistics to analyze data	jñ	jñ	jñ	jñ	jñ
Calibrating instruments needed for measurement	jñ	jñ	jñ	jñ	jñ
Working with computer software	jñ	jñ	jñ	jñ	jñ
Working with computer models	jñ	jñ	jñ	jñ	jñ
Understanding journal articles	jñ	jñ	jñ	jñ	jñ
Conducting database/internet searches	jñ	jñ	jñ	jñ	jñ
Managing my time	jñ	jñ	jñ	jñ	jñ

## YOUR RESEARCH EXPERIENCE

The following ask about the nature and quality of your research experience, and about any changes in your attitudes or behaviors toward learning and working as a researcher.



During your research experience HOW MUCH did you:

	Not applicable	Not at all	A little	A good amount	A great deal
Engage in real-world science research	100	100	100	100	100
Feel like a scientist	100	100	100	100	100
Think creatively about the project	100	100	100	100	100
Try out new ideas on your own	100	100	100	100	100
Try out new procedures on your own	100	100	100	100	100
Feel responsible for the project	100	100	100	100	100
Work extra hours because I was excited about the research	100	100	100	100	100
Interact with scientists from outside your school	100	100	100	100	100
Feel a part of a scientific community	100	100	100	100	100

YOUR RESEARCH EXPERIENCE

Please rate the following:

	Not applicable	Poor	Fair	Good	Excellent
My working relationship with my research mentor	100	100	100	100	100
My working relationship with research team members	100	100	100	100	100
The amount of time I spent with my research mentor	100	100	100	100	100
The advice my research mentor provided about careers	100	100	100	100	100
The advice I received about graduate school	100	100	100	100	100
The culture of research on this campus	100	100	100	100	100
The research experience overall	100	100	100	100	100

YOUR RESEARCH EXPERIENCE

As part of my most recent research experience (select all that apply):

	Yes	No
I presented a talk or poster to other students and faculty	<input type="checkbox"/>	<input type="checkbox"/>
I <i>plan</i> to present a talk or poster related to this research to other students and faculty in the future	<input type="checkbox"/>	<input type="checkbox"/>
I presented a talk or poster at a professional conference	<input type="checkbox"/>	<input type="checkbox"/>
I <i>plan</i> to present a talk or poster related to this research at a professional conference in the future	<input type="checkbox"/>	<input type="checkbox"/>
I attended a conference	<input type="checkbox"/>	<input type="checkbox"/>
I <i>plan</i> to attend a conference related to this research in the future	<input type="checkbox"/>	<input type="checkbox"/>
I wrote or co-wrote a paper that was published in a refereed, academic journal	<input type="checkbox"/>	<input type="checkbox"/>
I <i>plan</i> to write or co-write a paper related to this research for a refereed, academic journal in the future	<input type="checkbox"/>	<input type="checkbox"/>
I wrote or co-wrote a paper that was published in an undergraduate research journal	<input type="checkbox"/>	<input type="checkbox"/>
I <i>plan</i> to write or co-write a paper related to this research for an undergraduate research journal	<input type="checkbox"/>	<input type="checkbox"/>
I won an award or scholarship based on my research	<input type="checkbox"/>	<input type="checkbox"/>

If you presented a talk or a poster at a professional conference, please name the conference:

If you wrote or co-wrote a paper that was published in a refereed, academic journal, please name the journal:

## WHAT DID YOU DISCOVER?

The following ask about what you learned about yourself and doing research work.

Rate how much you agree or disagree with the following statements.

AS A RESULT OF MY MOST RECENT RESEARCH EXPERIENCE:

	I already knew this	Strongly disagree	Disagree	Agree	Strongly agree
I discovered I like research	jñ	jñ	jñ	jñ	jñ
I discovered I want a career in science	jñ	jñ	jñ	jñ	jñ
I discovered research work can be tedious	jñ	jñ	jñ	jñ	jñ
I discovered research takes a lot longer than expected	jñ	jñ	jñ	jñ	jñ
I discovered research work takes patience and perseverance	jñ	jñ	jñ	jñ	jñ
I discovered difficulties and setbacks are part of research work	jñ	jñ	jñ	jñ	jñ
I discovered that scientific facts can change	jñ	jñ	jñ	jñ	jñ
I discovered that scientific theories can change	jñ	jñ	jñ	jñ	jñ

What did you discover about the process of scientific research?

What did you discover about the nature of science?

RESEARCH EXPERIENCE AND THOUGHTS ABOUT YOUR FUTURE

The following ask about your career intentions and the ways in which participating in research may have influenced your thinking about your future.

Please answer the following regarding your participation in research and intentions for graduate school:

	Not applicable	Before I entered college	Before I did research	Because of my research experience	Research experience had no influence my plans
I plan(ned) to go to graduate school in a science, mathematics, engineering or technology (STEM) field (excluding medicine)	jn	jn	jn	jn	jn
I plan(ned) to get a medical degree	jn	jn	jn	jn	jn
I plan(ned) to get a professional degree (i.e., in law, dental medicine, veterinary medicine, etc.)	jn	jn	jn	jn	jn

Other degree plan(ned). Please specify whether this plan was: formulated before you entered college; before doing research; as a result of your research experience; or whether research experience had no influence on your plans.

## RESEARCH EXPERIENCE AND THOUGHTS ABOUT YOUR FUTURE

Rate how much you agree or disagree with the following statements:

	Strongly disagree	Disagree	Agree	Strongly agree
Research experience confirmed my interest in my field of study	jn	jn	jn	jn
Research experience introduced me to a new field of study I want to pursue	jn	jn	jn	jn
Research experience clarified for me which field of study I want to pursue	jn	jn	jn	jn
I believe that my research experience has prepared me for senior coursework	jn	jn	jn	jn
I believe that my research experience has prepared me for doing a senior honors thesis	jn	jn	jn	jn
I believe that my research experience has prepared me for graduate school	jn	jn	jn	jn
I believe that my research experience has prepared me for a job	jn	jn	jn	jn
My résumé has been enhanced by my research experience	jn	jn	jn	jn

## RESEARCH EXPERIENCE AND THOUGHTS ABOUT YOUR FUTURE

Please indicate your decision-making process regarding your participation in research and intentions for graduate school:

	Not applicable	Much less likely	Somewhat less likely	Somewhat more likely	Much more likely
How LIKELY are you to enroll in a graduate program leading to a <i>Ph.D. degree in a STEM field</i> (excluding M.D./Ph.D. research) than you were before participating in research?	jn	jn	jn	jn	jn
How LIKELY are you to enroll in a graduate program leading to a <i>combined M.D./Ph.D. degree</i> than you were before participating in research?	jn	jn	jn	jn	jn
How LIKELY are you to enroll in a graduate program leading to a <i>medical degree</i> than you were before participating in research?	jn	jn	jn	jn	jn
How LIKELY are you to enroll in a graduate program leading to a <i>professional degree</i> (i.e., in law, dental medicine, veterinary medicine, etc.) than you were before participating in research?	jn	jn	jn	jn	jn

Other : Briefly describe any other degree considerations and any influence research experience has had on your intentions for graduate school:

How did your research experience influence your thinking about future career and graduate school plans?

## FEEDBACK ABOUT THE RESEARCH PROGRAM

What would have made your research experience better?

What would improve the undergraduate research program?

## FEEDBACK ON THIS SURVEY

Were any of the survey questions unclear? Please specify which question(s) and what was confusing to you.

Other comments about this survey?

That's it! Thank you for filling out this survey!