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Nationality : Mexican

Bilingual : English & Spanish

**EDUCATION**

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**Ph.D., Learning Sciences and Policy**, University of Pittsburgh, Pittsburgh, PA.

Advisor: Christian D. Schunn

*In progress*

**B.Sc.**, Chemical Engineering, National Autonomous University of Mexico. 2013

Advisor: Luis D. Miranda

Honors Thesis: *Synthesis of Dehydroalanines using Palladium catalysts for a domino reaction study*

**RESEARCH**

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**Research publications**

**Vincent-Ruz, P.**, & Schunn, C. D. (2017). The increasingly important role of science competency beliefs for science learning in girls. *Journal of Research in Science Teaching*. doi:10.1002/tea.21387

Mijangos M. V., González-Marrero J., Miranda L. D., **Vincent-Ruz P.**, Lujan-Montelongo A., Olivera-Díaz D., et al. (2012). Microwave-assisted C-3 selective oxidative radical alkylation of flavones. *Org. Biomol. Chem.*, 10(15), 2946–2949. <http://doi.org/10.1039/C2OB25249J>

**Publications forthcoming & in preparation**

Cannady, M., **Vincent-Ruz P.**, Chung J., Schunn C. D. (*in review Science Education*) Scientific Sensemaking: Intellectual resources that predict content learning

**Vincent-Ruz P.**, Schunn C. D. (*in review International Journal of Science Education*)

Identity profiles relationship to students' future science choices

**Vincent-Ruz P.**, Grabowski J. J., Schunn C. D. (*in review CURQuarterly*)

The Impact of Early Participation in Undergraduate Research Experiences on Multiple Measures of Student Success

**Vincent-Ruz P**, Binning K, Schunn C. D., Grabowski J. J., (*in review*  
*Chemical Education Research & Practice*)

The Effect of Math SAT on Women's Chemistry Competency Beliefs

**Vincent-Ruz P**, Page L., Schunn C. D., (*in prep*)

The Effect of Early Undergraduate Research Experiences on STEM degree attainment

**Survey  
Development  
and  
Validation**

**Vincent-Ruz, P.**, Dorph, R., Cannady, M. A., & Schunn, C., (*in prep*)  
Measures Technical Brief: Science Identity.

Chung, J., Cannady, M. A., Schunn, C., Dorph, R., & **Vincent-Ruz, P.**,  
(2016) Measures Technical Brief: Scientific Sensemaking.  
Retrieved from: <http://www.activationlab.org/wp-content/uploads/2016/02/SensemakingReport-3.2-20160331.pdf>

**NATIONAL & INTERNATIONAL CONFERENCE PRESENTATIONS**

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**Upcoming  
Presentations  
& Talks**

**National Association for Research in Science Teaching  
Association 2018**

**Conference  
Talks**

**National Association for Research in Science Teaching  
Association 2017**

San Antonio, TX

Talk: The Effect of SAT Math scores on women's Self-Efficacy and its implications for Chemistry Learning

**American Educational Research Association 2017**

San Antonio, TX

Talk: Identity profiles relationship to students' future science choices

**American Educational Research Association 2016**

Washington, DC

Talk: The Increasingly Important Role of Science Competency Beliefs for Science Learning in Girls

**Poster Presentations**      **REASON Spring School on Scientific Reasoning and Argumentation 2015**  
LMU, Munich  
Poster: Measuring the Skills that Predict Learning in Middle School Science

**9° Reunion of the Mexican Academy of Organic Chemistry 2013**  
Universidad Veracruzana  
Poster: Synthesis of Dehydroalanines using Palladium catalysts for a domino reaction study

## **AWARDS & SCHOLARSHIPS**

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**Research Assistant Appointment (during PhD)**      Assistant to C.D. Schunn in the (US) National Science Foundation-funded *Interventions that Matter*  
Fall 2016- Current  
Role: to investigate the factors and interventions that impact student's college persistence as well as what supports minoritized populations success in college.

Assistant to C.D. Schunn in the (US) National Science Foundation-funded *Studying the Malleability and Impact of Science Learning Activation Project*  
Fall 2014- Spring 2016  
Role: to investigate the impact and malleability of science learning activation. Study findings will support understanding of the malleable factors associated with persistent success in science learning and science career interest and, in turn, support future intervention development efforts.

## **RESEARCH SKILLS**

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- Survey construction and validation
- Manipulation and Analysis of Data

## **ADVANCED STATISTICAL TRAINING & SOFTWARE KNOWLEDGE**

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**Statistical Skills** Experience with complex multivariate statistical analyses, including:

- Multiple and logistic regression
- Analysis of Variance and Covariance
- Latent Class Analysis
- Hierarchical Linear Modeling
- Factor analysis
- Item Response Theory Analysis
- DIF Analysis
- Coarsened Exact Matching

**Statistical Software Knowledge** Proficiency with statistical software:

- R (Intermediate)
- SPSS (Advanced)
- IRTPro (Intermediate)
- Excel (Advanced)

## **TEACHING EXPERIENCE**

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Present responsibilities are **underlined in bold**.

**University of Pittsburgh** **Professional Development for High School Teachers on Curriculum Design and Implementation of Design Based Learning experiences. Spring 2017**

Professional Development for High School Teachers on Curriculum Design and Implementation of Design Based Learning experiences. Spring 2016

**Colegio Francés del Pedregal (Mexico)** Chemistry Teacher in 9<sup>th</sup> grade. 2013-2014 School term

## **DEPARTMENTAL SERVICE**

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Graduate Student Representative of the School of Education Dean Search Committee 2016

Graduate Student Representative of the Learning Sciences and Policy Program,  
University of Pittsburgh 2015-2017  
Co-coordinator for LSAP-ADP Colloquium Series 2015-2016

## OUTREACH

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**Public Engagement** Grand Award Judge Pittsburgh Regional Science Fair  
2016: Social and Behavioral Sciences

Guest at *The Collapsed Wavefunction Podcast*  
"Rethinking Chemophobia" August 2015

Curator: @wethehumanities twitter account on the  
week of August 10th-16th 2015

Grand Award Judge at ISEF 2015: Chemistry

Grand Award Judge Pittsburgh Regional Science Fair  
2015: Chemistry