

**Megan Bang**

*Professor of Learning Sciences and Psychology  
Northwestern University  
email: [megan.bang@northwestern.edu](mailto:megan.bang@northwestern.edu)*

**EDUCATION**

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**Northwestern University, Ph.D.** 2006/2009

Specialization: Learning Sciences, certificate in Cognitive Science

Advisors: Bruce Sherin (Chair), Carol Lee, and Douglas Medin

Community Committee Members: Joseph Podlasek, Karen Washinawatok

Doctoral Dissertation: *“Understanding Students’ Epistemologies: Examining Practice and Meaning in Community Contexts”*

**Post-Doctoral Training – TERC, Cheche Konnen Center**

Advisors: Beth Warren and Ann Rosebery

**Williams College, BA** 1997. Major: Political Science with Political Theory concentration Minors: History & African Studies

**PROFESSIONAL EXPERIENCE**

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<i>9/18-present</i>	Professor, Learning Sciences & Psychology, Northwestern University, Evanston.  Affiliated Faculty, Native American and Indigenous Research Center, Northwestern University, Evanston.
<i>1/22-present</i>	Mellon Distinguished Scholar, Center for Imagination in the Borderlands, Arizona State University.
<i>6/18 – 8/22</i>	Senior Vice President, Spencer Foundation, Chicago.
<i>9/15 – 8/18</i>	Associate Professor, Educational Psychology, Learning Sciences & Human Development, Education, Equity, Society Studies, University of Washington-Seattle
<i>9/11 – 8/18</i>	Faculty, University of Washington Institute for Science + Math Education ( <a href="http://sciencemathpartnerships.org/">http://sciencemathpartnerships.org/</a> )
<i>9/11 – 8/18</i>	Director, Native American Education Certificate, University of Washington-Seattle
<i>9/15 – 8/17</i>	Program Director, Learning Sciences and Human Development, University of Washington-Seattle
<i>9/11 – 8/18</i>	Faculty, Secondary Teacher Education Program, University of Washington-Seattle

1/15 – 8/18	Adjunct Faculty, American Indian Studies, University of Washington-Seattle
9/11 – 8/15	Assistant Professor, Educational Psychology, Learning Sciences & Human Development, University of Washington-Seattle
6/99 – 8/11	Director of Education, American Indian Center, Chicago, IL
8/08 – 8/11	Research Associate, TERC, Chèche Konnen Center, Cambridge, MA
6/06 – 8/08	Post-Doctoral Fellow, TERC, Chèche Konnen Center, Cambridge, MA
9/98 – 6/00	Workshop Leader, Chicago Children's Museum, Chicago, IL.
7/00 – 8/02	GED Instructor and Student Services Coordinator, Institute for Native American Development, Truman College (City College of Chicago)
9/00 – 6/02	Instructor, Native American Education Services College, Chicago, IL
5/98 – 9/98	Science/Environmental Justice Teacher at The City School, Boston, MA
6/97 – 6/98	Preschool Teacher, Jamaica Plain Headstart via Jumpstart for Young Children, Inc., Boston, MA
1/96 – 6/96	Teacher at People's Primary School during semester abroad with Augsburg College, Windhoek, Namibia

## **ACADEMIC HONORS**

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- AERA Scholars of Color Mid-Career Award, 2021
- Elected, National Academy of Education, 2021
- Member, Education and Human Resources Advisory Committee, National Science Foundation, 2020-2022
- Member, Advisory Committee for Environmental Research and Education, National Science Foundation, 2020 -2022
- Member, Board on Science Education, National Academy of Science 2018-2021; 2021-2024
- American Education Research Association, Division K, Teaching and Teacher Education, Early Career Award, 2015
- American Education Research Association, Bobby Wright Award for Early Career Contributions to Research in Indigenous Education, 2015
- Outstanding Advising Award – University of Washington, 2013
- Spencer Foundation Dissertation Fellowship, 2004-05
- Cognitive Science Graduate Fellow for Interdisciplinary Research Projects, 2003-2004
- Spencer Foundation Training Fellowship, 2001-2003

## JOURNAL ARTICLES

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\*Peer reviewed publications

+All or some co-authors were graduate students or practitioners in community organizations or schools.

\*+McDaid, N. & Bang, M. (accepted). "Then the Nettle People won't be lonely!": Recognizing plant personhood in an Indigenous STEAM summer program. *Cognition and Instruction*.

Marion Suiseeya, K. R., O'connell, M. G., Leoso, E., Defoe, M. S. B. N., Anderson, A., Bang, M., Beckman, P., Boyer, A.-M., Dunn, J., & Gilbert, J. (2022). Waking from paralysis: Revitalizing conceptions of climate knowledge and justice for more effective climate action. *The ANNALS of the American Academy of Political and Social Science*, 700(1), 166-182.

\* Novack, M., Standley, M., Bang, M., Washinawotok, K., Medin, D., & Waxman, S. (2022). Hands on: Nonverbal communication in Native and Non-Native American parent-child dyads during informal learning. 58(1), 32-42. *Developmental Psychology*.

\*Iliev, R., Medin, D., Bang, M. (2022). Look to the field. [Peer commentary on the paper, "The generalizability crisis by T. Yarkoni]. *Behavioral and Brain Sciences*, 45(e22). doi: <https://doi.org/10.1017/S0140525X21000509>.

Nasir, N., Megan Bang, M., & Yoshikawa, H. (2021). What might we accomplish in 25 years? *Phi Delta Kappan*, 103(2), 54-57. <https://kappanonline.org/reimagining-education-25-years-spencer-nasir-bang-yoshikawa/>

\*Tzou, C., Bang, M., & Bricker, L. (2021). Commentary: Designing science instructional materials that contribute to more just, equitable, and culturally thriving learning and teaching in science education. *Journal of Science Teacher Education*, 32(7), 858-864.

\*Bang, M. (2020). Learning on the move toward just, sustainable, and culturally thriving futures. *Cognition and Instruction*, 38(3), 434-444.

Tzou, C., Starks, E., Meixi, A. R., Ortiz, S. M., Peterson, S., Gladstone, P., Tail, E., Chang, A., Andrew, E., Nevarez, X., Braun, A., & Bang, M. (2020). Codesigning with Indigenous families and educators. *Connected Science Learning*, 2(3).

\*+Tzou, C.T., Rother, D., Starks, E., Meixi, Suarez, E., Rambayon, A., Bell, P., Twito, A., Peterson, S., Ortiz, S. M., & Bang, M. (2020). Trust the process: Developing STEM mindsets through family storytelling. *Connected Science Learning*, 2(1).

Hackett, J., Bang, M., Goulter, A., & Battista, M. (2020). Crossing Risky boundaries: Learning to authentically and equitably co-teach through design and practice. *Teaching and Teacher Education*, 86, 1-20.

- \*+Tzou, C.T., Meixi, Suarez, W., Bell, P., LaBonte, D., Starks, E., & Bang, M. (2019). Storywork in STEM-Art: Making, materiality, and robotics within everyday acts of Indigenous presence and resurgence. *Cognition and Instruction*, 37(3), 306-326.
- \*+ Pugh, P., McGinty, M., & Bang, M. (2019). Relational epistemologies in land based learning environments: Reasoning about ecological systems and spatial indexing in motion. *Cultural Studies of Science Education*, 2(14), 425-448.
- \*+ Ishimaru, A. M., Rajendran, A., Nolan, C. M., & Bang, M. (2018). Community design circles: Co-designing justice and wellbeing in family-community-research partnerships. *Journal of Family Diversity in Education*, 3(2), 38-63.
- \*Marin, A., & Bang, M. (2018). “Look it, this is how you know:” Family forest walks as a context for knowledge-building about the natural world. *Cognition and Instruction*, 36(2), 89-118.
- \* Barajas-López, F., & Bang, M. (2018). Indigenous making and sharing: Claywork in an Indigenous STEAM program. *Equity & Excellence in Education*, 51(1), 7-20.
- \* Bang, M., Marin, A., & Medin, D. (2018). If Indigenous peoples stand with the sciences, will scientists stand with us?. *Daedalus*, 147(2), 148-159.
- \* Philip, T., Bang, M. & Jackson, K. (2018). Articulating the “how,” the “for what,” and the “for whom” in concert: A call to broaden the benchmarks of our scholarship. *Cognition and Instruction*, 36(2), 83-88.
- \*Medin, D., ojalahto, b., Marin, A., & Bang, M. (2017). Systems of (non-) diversity. *Nature Human Behaviour*, 1, 0088.
- \*+Washinawatok, K., Rasmussen, C., Bang, M., Medin, D., Woodring, J., Waxman, S., Marin, A., Gurneau, J., & Faber, L. (2017). Children’s play with a forest diorama as a window into ecological cognition. *Journal of Cognition and Development*, 18(5), 617-632.
- \*Politics of Learning Writing Collective (2017). The learning sciences in a new era of US nationalism. *Cognition and Instruction*, 35(2), 91-102.
- \* Bang, M., & Vossoughi, S. (2016). Participatory design research and educational justice: Studying learning and relations within social change making. *Cognition and Instruction*, 34(3), 173-193.
- \* Ishimaru, A. M., Barajas-López, F., & Bang, M. (2015). Centering family knowledge to develop children’s empowered mathematics identities. *Journal of Family Diversity in Education*, 1(4), 1-21.
- \*Bang, M. (2015). Culture, learning, and development about the natural world: Advances facilitated by situative perspectives. *Educational Psychologist*, 50(3), 220-233.
- \*Bang, M., Faber, L., Gurneau, J., Marin, A., & Soto, C. (2015). Community based design research: Learning across generations and strategic transformations of institutional relations towards axiological innovations. *Mind, Culture, and Activity*, 1-14.

- +McGinty, M., & Bang, M. (2015). Narratives of dynamic lands: science education, Indigenous knowledge and possible futures. *Cultural Studies of Science Education*, 11, 471–475.
- \*Marin, A. & Bang, M. (2015). Designing pedagogies for indigenous science education: Finding our way to storywork. *Journal of American Indian Education*, 54(2), 29-51.
- \*Bang, M. & Marin, A. (2015). Nature-culture constructs in science learning: Human/non-human agency and intentionality. *Journal for Research in Science Teaching*, 52(4), 530-544.
- \*Phillips, K. W., Medin, D., Lee, C. D., Bang, M., Bishop, S., & Lee, D. (2014). How diversity works. *Scientific American*, 311(4), 42-47.
- \*Medin, D. & Bang, M. (2014). The cultural side of science communication. *Proceedings of the National Academy of Sciences*, 111(4), 13621-13626.
- Medin, D., Lee, C. & Bang, M. (2014). Particular points of view. *Scientific American*, 311(4), 44-45.
- \*+Bang, M., Curley, L., Kessel, A., Marin, A., & Suzokovich, E. (2014). Muskrat theories, tobacco in the streets, and living Chicago as indigenous lands. *Environmental Education Research*, 20(1), 37-55.
- Medin, D., & Bang, M. (2013). Culture in the classroom. *Phi Delta Kappan*, 95(4), 64-67.
- Nasir, N., & Bang, M. (2013). Conceptualizing cultural and racialized process in learning. *Human Development*, 55(5-6), 247-249.
- \*+Bang, M., Marin, A., Faber, L., & Suzukovich, E. S. (2013). Repatriating Indigenous technologies in an urban indian community. *Urban Education*, 48(5), 705-733.
- \*+Dehghani, M., Bang, M., Medin, D., Marin, A., Leddon, E., & Waxman, S. (2013). Epistemologies in the text of children's books: Native-and non-Native-authored books. *International Journal of Science Education*, 35(13), 2133-2151.
- \*Bang, M., Warren, B., Rosebery, A. S., & Medin, D. (2012). Desettling expectations in science education. *Human Development*, 55(5-6), 302-318.
- \*+Hermes, M., Bang, M., & Marin, A. (2012). Designing Indigenous language revitalization. *Harvard Educational Review*, 82(3), 381-402.
- \*+Unsworth, S. J., Levin, W., Bang, M., Washinawatok, K., Waxman, S. R., & Medin, D. L. (2012). Cultural differences in children's ecological reasoning and psychological closeness to nature: Evidence from Menominee and European American children. *Journal of Cognition and Culture*, 12(1-2), 17-29.
- \*Bang, M., & Medin, D. (2010). Cultural processes in science education: Supporting the navigation of multiple epistemologies. *Science Education*, 94(6), 1008-1026.
- Bang, M., Medin, D., and Cajete, G., (2009). Improving science education for Native students:

Teaching place through community. *Sacnas News*, 12(1), 8-10.

Bang, M. (2009). [Review of the book *Indigenous knowledge and education: Sites of struggle, strength, and survivance*, edited by M. Villegas, S. R. Neugebauer, & K. R. Venegas.] *Science Education*, 93(5), 958-959.

\*Medin, D.L. & Bang, M. (2008). Perspective taking: Diversity and partnerships. *American Psychological Association*, 22(2).

\*Bang, M., Medin, D. L., & Atran, S. (2007). Cultural mosaics and mental models of nature. *Proceedings of the National Academy of Sciences*, 104(35), 13868-13874.

Bang, M. (2007). [Review of the book *Understanding teacher expertise in primary science: A sociocultural approach*, by A. Traianou.] *Science Education*, 91(6), 1031-1033.

## BOOKS

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\*Medin, D.L. & Bang, M. (2014). *Who's asking?: Native science, Western science and science education*. Cambridge, MA: The MIT Press.

## BOOK CHAPTERS

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\*Bang, M., West, B., Hardison-Stevens, D. & Barajas, F. (accepted). Transforming history: Developing teacher education that contributes to thriving native communities. *Handbook of Research on Teachers of Color*.

\*+ Bang, M., Alfonso, J., Faber, L., Marin, A., Marin, M., Medin, D., Waxman, S., & Woodring, J. (in press). Perspective taking and psychological distance in children's picture books: differences between Native and Non-native authored books. In Nelson-Barber, S. & Chinn, P. W. U. (Eds.) *Indigenous STEM Education: Perspectives from the Pacific Islands, the Americas and Asia*. New York, NY: Springer.

Anderson, J., Bang, M., Brayboy, B. M. J., Cati, V., Gutiérrez, K. D., Hicks, D., ... & Williamson-Lott, J. A. (2021). Agency and Resilience in the Face of Challenge as Civic Action: Lessons Learned from Across Ethnic Communities. In C. D. Lee, G. White, & D. Dong (Eds.) *Educating for Civic Reasoning and Discourse* (pp. 157-189). National Academy of Education.

Lee, C. D., Smirnov, N., Carrington, A., Bang, M., Bass, H., Reisman, A., ... & Turiel, E. (2021). Civic Reasoning and Discourse: Perspectives from Learning and Human Development Research. In C. D. Lee, G. White, & D. Dong (Eds.) *Educating for Civic Reasoning and Discourse* (pp. 53-107). National Academy of Education.

\*Warren, B., Vossoughi, S. Bang, M., Taylor, E., Rosebery, A. (2020). Epistemic heterogeneity and disciplinary learning. In Na'ilah Suad Nasir, Carol D. Lee, & Roy Pea (Eds.) *Handbook of the cultural foundations of learning*. Routledge Press.

- Marin, M., Ambo, T., McDaid-Morgan, N. White Eyes, R., & Bang, M. (2020). Enacting relationships of kinship and care in education and research settings. In A. Ali & T. McCarty (Eds.), *Critical Youth Research in Education: Methodologies of Praxis and Care*. (pp. 243-264). Routledge.
- \*+Montaño-Nolan, C., Bang, M., McDaid-Morgan, N. (2019). Indigenous family engagement: Authentic partnerships for transformative learning. In C. McWayne & F. Doucet (Eds.), *Research on Family School Partnerships: Ethnocultural Diversity and the Home-to-School Link* (pp. 55-73). Springer.
- +Tzou, C., Bell, P., Bang, M., Kuver, R., Twito, A., & Braun, A. (2018). Building expansive family STEAM programming through participatory design research. In V. Lee & L. Phillips (Eds.), *Reconceptualizing Libraries* (pp. 72-93). Routledge.
- \*+ Bang, M., Montaño-Nolan, C., McDaid-Morgan, N. (2018). Indigenous family engagement: Strong families, strong nations. In E. McKinley & L. Smith (Eds.), *Handbook of Indigenous Education* (pp. 789-810). Springer.
- \* Brayboy, B. & Bang, M. (2018). Societal issues facing Indigenous education: Introduction. In E. McKinley & L. Smith (Eds.), *Handbook of Indigenous Education* (pp. 567-574). Springer.
- \*Barajas-López, F. & Bang, M. (2018). Toward Indigenous making and sharing: Implications for mathematics learning. In *Annual Perspectives in Mathematics Education (APME): Rehumanizing Mathematics for Black, Indigenous, and Latinx Students* (pp. 13-22). National Council of Teachers of Mathematics.
- Marin, A. & Bang, M. (2017). Indigenous heritage communities of North America. In K. Pepler (Ed.) *Encyclopedia of Out-of-School Learning*. SAGE press.
- \*Bang, M., Brown, B., Calabrese Barton, A., Rosebery, A., Warren, B. (2017). Toward more equitable learning in science. In: C. Schwarz, C. Passmore, & B. Reiser (Eds.), *Helping students make sense of the world using next generation science and engineering practices*, (pp. 33-58). NSTA Press.
- \*Bang, M. (2016). Towards an ethic of decolonial trans-ontologies in sociocultural theories of learning and development. In I. Esmonde, I., & A. N. Booker (Eds.), *Power and privilege in the learning sciences: Critical and sociocultural theories of learning* (pp. 115-138). Routledge.
- Bang, M. (2016). Learning gardens in an urban indigenous community: Expanding the scope of learning. In E. Hodges Snyder, K. McIvor, & S. Brown (Eds.), *Sowing Seeds in the City* (pp. 257-268). Springer.
- Bang, M. (2016). From backyard plots to harvesting beyond borders: Native perspectives on gardening. In E. Hodges Snyder, K. McIvor, & S. Brown (Eds.), *Sowing Seeds in the City* (pp. 247-256). Springer.
- \*+ Bang, M., Marin, A., Medin, D., & Washinawatok, K. (2015). Learning by observing, pitching in, and being in relations in the natural world. *Advances in Child Development and Behavior*, 49, 303-313.

- +Bang, M., Curley, L., Kessel, A., Marin, A., & Suzokovich, E. (2015). Muskrat theories, tobacco in the streets, and living Chicago as Indigenous lands. In K. McCoy, E. Tuck, E., & M. McKenzie (Eds.) *Land Education: Rethinking pedagogies for place from Indigenous, postcolonial, and decolonizing perspectives*. Routledge.
- Bang, M. (2015). Indigenous students. In D. Gunstone (Ed.), *Encyclopedia of Science Education*. Springer.
- \*Hermes, M. & Bang, M. (2014). Theory and advocacy for language revitalization in the United States. In *Handbook of Educational Linguistics* (pp.158-170). Routledge.
- \*Abrams, E., Yore, L., Bang, M. Brayboy, B., Castagno, A., Kidmann, J., Huei, L., Villanueva, M., Wang, M., Webb, P., & Yen, C. (2014). Culturally relevant schooling in science for Indigenous learners worldwide: Stressing the all in science literacy. In N. G. Lederman & S. K. Abell (Eds.), *Handbook of Research on Science Education* (pp. 671-697). Routledge.
- +Medin, D., ojalehto, b., Waxman, S., & Bang, M. (2013). Relations: language, epistemologies, categories and concepts. In E. Margolis & S. Laurence, (Eds.), *The Conceptual Mind: New Directions in the Study of Concepts* (pp. 349-378). The MIT Press.
- +Medin, D., ojalehto, b., Marin, A., & Bang, M. (2013). Culture and epistemologies: putting culture back into the ecosystem. In M. Gelfand, CY Chiu, & Y-Y. Hong (Eds.), *Advances in Culture and Psychology Series* (pp.177-217). Oxford University Press.
- +Leddon, E., Waxman, S.R., Medin, D.L, Bang, M. & Washinawatok, K. (2012). One animal among many? Children's understanding of the relation between humans and nonhuman animals. In G. Hayes & M. Bryant (Eds.), *Psychology of Culture. In Psychology of Emotions, Motivations and Actions: Focus on Civilizations and Cultures Series*. (pp. 105-126).Hauppauge, NY: Nova Science Publishers.
- Bang, M. (2012). Indigenous knowledge and science education. In Banks, J. A. (Ed.), *Encyclopedia of Diversity in Education* Volume 1 (pp. 1165-1170). SAGE Publications.
- +Bang, M., Medin, D., Washinawatok, K., and Chapman, S. (2010). Innovations in culturally-based science education through partnerships and community. In M. Khine & I. Saleh (Eds.) *New Science of Learning: Cognition, Computers and Collaboration in Education* (pp. 569-592). Springer.

## **REPORTS, WHITE PAPERS, BRIEFS, & MEDIA**

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- Bang, M., Bricker, L., Darling-Hammond, L., Edgerton, A., Grossman, P., Gutiérrez, K., ... & Vossoughi, S. (2021). Summer Learning and Beyond: Opportunities for Creating Equity. *Learning Policy Institute*.
- Levine, F. J., Nasir, N. I. S., Ríos-Aguilar, C., Gildersleeve, R. E., Rosich, K. J., Bang, M., ... & Holsapple, M. A. (2021). Voices from the Field: The Impact of COVID-19 on Early Career Scholars and Doctoral Students. *American Educational Research Association (AERA)*.



- Anderson, J. D., Bang, M., Brayboy, B. McK. J., de los Ríos, C. V., Gutiérrez, K. D., Hicks, D., Ho, L., Lee, C. D., Lee, S. J., Santiago, M., Walker, V. S., Williamson-Lott, J. (2021). Agency and Resilience in the Face of Challenge as Civic Action: Lessons Learned from Across Ethnic Communities. In C. D. Lee, G. White, and D. Dong (Eds). *Educating for Civic Reasoning and Discourse*. National Academy of Education.
- Bang, M. & Tzou, C. (2020, Dec 2). What it Means to Learn Science. Interview with Jill Anderson, Harvard EdCast. <https://the-harvard-edcast.simplecast.com/episodes/what-it-means-to-learn-science>
- Morales-Doyle, D., Vossoughi, S., Vakil, S., & Bang, M. (2020). In an era of pandemic and protest, STEM education can't pretend to be apolitical. [Editorial]. Truthout. <https://truthout.org/articles/in-an-era-of-pandemic-and-protest-stem-education-cant-pretend-to-be-apolitical/>
- McCoy, M., Elliott-Groves, E., Sabzalian, L., & Bang, M. (2020). Restoring Indigenous systems of relationality. Expert witness to resilient future question: How can we live respectfully with the land and with one another? Center for Humans and Nature. <https://www.humansandnature.org/restoring-indigenous-systems-of-relationality>
- Bang, M., McDaid-Morgan, N., & Tsoodle, A. (2020). Creating science learning environments in which Indigenous students can thrive. NSTA blog. <https://www.nsta.org/blog/creating-science-learning-environments-which-indigenous-students-can-thrive>
- Bang, M. (2020, May). *Midwifing the Next World*. #RogueAERA. Online.
- Ishimaru, A.M., Bang, M., Valladares, M.R., Nolan, C.M., Tavares, H., Rajendran, A., Chang, K. (2019). Recasting families and communities as co-designers of education in tumultuous times. Boulder, CO: National Education Policy Center. Retrieved from <http://nepc.colorado.edu/publication/family-leadership>.
- Brayboy, B. McK. J., Solyom, J.A., Chin, J.A. Tachine, A., Bang, M., Bustamante, N., Ben, C., Myles, C. Poleviyuma, Tom, M., Abuwandi, S., Richmond, A. (2017). RISE: A Study of Indigenous boys and men. Paper prepared for RISE: Boys and men of color, Philadelphia, PA.
- Ishimaru, A.M., Bang, M. & Family Leadership Design Collaborative. (2016). Towards a transformative research and practice agenda for racial equity in education. Family Leadership Design Collaborative white paper. College of Education, University of Washington: Seattle, WA.

## **CURRICULA & PROFESSIONAL DEVELOPMENT**

- Bell, P., Bang, M., Wilson, N. & Wardrip, P. (2015, May 21). You're doing it wrong: Critiques of design based research in the field. Webinar for MacArthur Foundation's Digital Media & Learning Hub on Design-Based Research. Available online: <http://dmlcommons.net/my-calendar/?mc id=27>

Bell, P., Bang, M., Wilson, N. & Wardrip, P. (2015, April 23). Co-design and collaboration in design based research. Webinar for MacArthur Foundation's Digital Media & Learning Hub on Design- Based Research. Available online: <http://dmlcommons.net/my-calendar/?cid=all&mc id=26>

### **MANUSCRIPTS UNDER PEER REVIEW OR IN PREPARATION**

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\*Bang, M. (2019). Developing learning environments that cultivate just and sustainable forms of interaction: Engaging inter-dependence, roles and recognizing gifts.

\*+Bang, M., Tzou, C., Welch, M., and Shiehl, S. (2019). Developing a model of field based science education with early elementary students, families, and teachers.

\*+Guerra, M, Tzou, C. & Bang, M. (2019). Learning and identity in field based conversation education for under-graduate students.

\*+Bang, M., Pugh, P., & Medin, D. (2018). Emergent complex systems reasoning?: Cross-cultural differences in reasoning about eating relationships between kinds.

\*+Bang, M., Gurneau, J., Medin, D., Marin, A., Washinawatok, K. & Woodring, J. (2019) Children's reasoning about forest ecosystem.

\*+Bang, M., Medin, D., Woodring, J., Washinawatok, K., & Marin, A. (2019). Cross cultural parent-child sensemaking about forest ecosystems: Perspective taking and attentional directives that shape differences in cultural ways of knowing.

\*+Bang, M., Medin, D., Marin, M. & McGinty, M. (2019). Youth reasoning about perturbations in ecological systems.

### **FUNDED RESEARCH AND PROJECTS**

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Bang, M. (2021). Collaborative Research: Intergenerational Learning, Deliberation, and Decision Making For Changing Lands and Waters. National Science Foundation. Funded 9/1/2021-8/31/2026 (\$1,386,110).  
Project Role: PI  
Co-PIs: Filiberto Barajas-Lopez, Marjorie James, Anna Lees, Jordan Shananaquet  
Preparation Responsibilities: Co-Author

Bang, M. (2021). Improving the STEM Preparation of K-5 Pre-service Teachers through a Project-based, Interdisciplinary Approach. National Science Foundation. Funded 10/1/2021-9/30/2025 (\$1,881,288).  
Project Role: Co-PI PI: Carrie Tzou, Co-PIs: Leah Bricker, Bryan White, Veronica McGowan Preparation Responsibilities: Co-Author

Bang, M. (2021). SCC-CIVIC-PG Track B: Strengthening Resilience of Ojibwe Nations across Generations (STRONG): Sovereignty, Food, Water, and Cultural (in)Security.

- Funded 1/1/2021-12/31/2021 (\$50,000).  
Project Role: collaborator
- Bang, M. (2018). Cultural Mindset and Toolkits: Professional Learning. Gates Foundation. Funded 2018-2020 (\$100,000).  
Project Role: Co-Principal Investigator  
PI: Stephanie Fryberg Co-Pi: Mary Murphy  
Preparation Responsibilities: Co-Author
- Bang, M. (2017). Learning in Places: Developing Field Based Science Education. National Science Foundation – DRK-12.  
Funded 7/1/2017-6/30/2021 (\$2.9 million). NSF REC- 1720578  
Project Role: PI, Co-PI: Carrie Tzou, MaryMargaret Welch, Sharon Siehl  
Preparation Responsibilities: Author  
Community Partners: Seattle Public Schools, Tilth Alliance
- Bang, M. (2017). Complex socio-ecological systems reasonings: An investigation of the impact of culture and experience on reasoning about complex socio-ecological phenomena among students from diverse backgrounds. National Science Foundation – AISL.  
Funded 9/1/2017-8/31/2021 (\$1.9 million). NSF REC- 1713368  
Project Role: PI, Co-PI: Douglas Medin  
Preparation Responsibilities: Author  
Community Partners: American Indian Center
- Bang, M. (2017). Cultural Mindset and Toolkits: Professional Learning. (\$600,000) Raikes Foundation. Funded 2017-2019.  
Project Role: Co-Principal Investigator  
PI: Stephanie Fryberg  
Preparation Responsibilities: Co-Author
- Bang, M. (2016). Since Time Immemorial Professional Development Grant (\$71,753). Funded 2016-2017.  
Project Role: Co-Principal Investigator, PI: Kristen French, WWU  
Preparation Responsibilities: Co-Author  
Partners: Western Washington University, 12 School Districts
- Bang, M. (2016). Doris Duke Conservation Scholars Research Grant (\$34,378). Funded 2016-2017.  
Project Role: Principal Investigator  
Preparation Responsibilities: Author  
Partners: College of the Environment
- Bang, M. (2016). Native American Boys and Men: A review and synthesis of the literature (\$17,883). Funded 2016-2017.  
Project Role: Co-Principal Investigator, PI: Bryan Brayboy, ASU  
Preparation Responsibilities: Co-Author
- Bang, M. (2015). Robotics Backpacks for Family Learning: Transforming science center-library

- partnerships to support family engineering learning. National Science Foundation. Funded 2015-2018. (\$1,993,064).  
 Project Role: Co-Principal Investigator, PI: Carrie Tzou  
 Preparation Responsibilities: Co-Author  
 Community Partners: Seattle Public Schools, Seattle Public Libraries, Red Eagle Soaring
- Bang, M. (2015). Transforming the Field of Family Engagement: Redesigning Research, Measures and Practice for Equity in Education. Kellogg Foundation. Funded 2015-2018 (1,680,000).  
 Project Role: Co-Principal Investigator  
 PI: Ann Ishamaru  
 Preparation Responsibilities: Co-Author
- Bang, M. (2016). Cultural Mindset and Toolkits: Professional Learning. Raikes Foundation. Funded 2016-2017.  
 Project Role: Co-Principal Investigator  
 PI: Stephanie Fryberg  
 Preparation Responsibilities: Co-Author
- Bang, M. (2014). Indigenous Teacher Education Program. Bill and Melinda Gates Foundation – Investing in Native Student Success. Funded 2014-2015 (\$50,000).  
 Project Role: Co-Principal Investigator  
 PI: Elizabeth West  
 Preparation Responsibilities: Co- Author
- Bang, M. (2014). Building Capacity & Cultivating Innovation: Learning Agendas in Native Education.– Investing in Native Student Success.  
 Requested (\$100,000).  
 Project Role: Principal Investigator  
 Preparation Responsibilities: Author
- Bang, M. (2013) Expansive Meanings and Makings in ArtScience. National Science Foundation-CORE.  
 Funded 10/1/2013-4/1/2017 (\$1.5 million). NSF REC-1348462  
 Project Role: Co-Principal Investigator, Other PIS: Beth Warren and Ann Rosebery  
 Preparation Responsibilities: Co-Author  
 Community Partners: Red Eagle Soaring Youth Theater Company, Broad Institute, Boston Arts Academy
- Bang, M. (2013). Building Capacity & Cultivating Innovation: Learning Agendas in Native Education.– Investing in Native Student Success.  
 Funded 2013-2014 (\$100,000).  
 Project Role: Principal Investigator  
 Preparation Responsibilities: Author
- Bang, M. (2013). Future Native Teachers Initiatives. Washington Education Association. Funded 2013-2015 (\$14,000).  
 Project Role: Principal Investigator  
 Preparation Responsibilities: Author

- Bang, M. (2013). Indigenous Teacher Education Program. Bill and Melinda Gates Foundation – Investing in Native Student Success. Funded 2013-2014 (\$50,000).  
 PI: Elizabeth West  
 Preparation Responsibilities: Co- Author
- Bang, M. (2012). Indigenous Teacher Education Program. Bill and Melinda Gates Foundation – Investing in Native Student Success. Funded 2013-2014 (\$50,000).  
 PI: Elizabeth West  
 Preparation Responsibilities: Co- Author
- Bang, M. (2011). Collaborative Research: Cultural Epistemologies and Science-related Practices: Living and Learning in Relationships. National Science Foundation – EHR REESE. Funded 9/1/11-8/31/14 (\$1 million). NSF REC-1205758.  
 Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin, Sandra Waxman  
 Preparation Responsibilities: Co- Author  
 Community Partners: American Indian Center of Chicago, Menominee Nation
- Bang, M. (2011). Collaborative Research: Culturally Based Citizen Science: Rebuilding Relationships to Place. National Science Foundation – AISL. Funded 9/1/11-8/31/14 (\$1.5 million). NSF REC-1208209.  
 Project Role: Principal Investigator, CO-PIS: Douglas Medin, Karen Washinawatok  
 Preparation Responsibilities: Co-Author  
 Community Partners: American Indian Center of Chicago, Menominee Nation
- Bang, M. (2009). Native American science education. Johnson Endeavor Foundation. Funded: 2009-2010 (\$150K). REC- 0750655.  
 Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin  
 Preparation Responsibilities: Co-Author  
 Community Partners: American Indian Center of Chicago
- Bang, M. (2008). Collaborative Research: Renewal: The Cultural Context of Native-American Science Education. National Science Foundation. Funded 9/1/08-8/30/11 (\$1.2 million). NSF REC-0815112.  
 Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin, Karen Washinawatok  
 Preparation Responsibilities: Co-Author  
 Community Partners: American Indian Center of Chicago, Menominee Nation, Tribal School
- Bang, M. (2008). Collaborative Research: The Role of Culture and Experience in Children's Understanding of the Biological World. National Science Foundation. Funded 9/1/08-8/30/11 (\$980K). REC-0814850  
 Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin, Karen Washinawatok, Sandra Waxman  
 Preparation Responsibilities: Co-Author  
 Community Partners: American Indian Center of Chicago, Menominee Nation, Tribal School

Bang, M. (2008). Collaborative Research: A Cross Cultural View of Biological Thought. National Science Foundation.

Funded: 5/15/08-5/14/11 (\$980K). REC- 0750655.

Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin, Karen Washinawatok, Sandra Waxman

Preparation Responsibilities: Co-Author

Community Partners: American Indian Center of Chicago, Menominee Nation

Bang, M. (2007). Students of Color Navigating Learning Environments: Portraits of Racialized Dilemmas. TERC.

Funded: 2007-2009 (\$20K).

Project Role: Co-Principal Investigator, CO-PIS: Carol Wright

Preparation Responsibilities: Co-Author

Bang, M. (2007). Indigenous Ways of Knowing & STEM: A Conference Focused on the Successes, Tensions, & Possibilities for Learning. National Science Foundation.

Funded: 2009 (\$75K). REC 0749576.

Project Role: Principal Investigator

Preparation Responsibilities: Author

Community Partners: American Indian Center of Chicago, Harvard Project on American Indian Economic Development

Bang, M. (2005). Collaborative Research: Cultural Context of Learning: Native American Science Education. National Science Foundation.

Funded: 9/05-8/08 (\$1.4 million). REC- 0750655.

Project Role: Co-Principal Investigator, CO-PIS: Douglas Medin, Karen Washinawatok,

Preparation Responsibilities: Co-Author

Bang, M. (2004). Cultural Models of Nature. Spencer Foundation.

Funded: 2004-2005 (\$40K). REC 0749576.

Project Role: CO-Principal Investigator, PI: Douglas Medin

Preparation Responsibilities: Co-Author

## **COURSES TAUGHT**

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### **Northwestern University**

- SESP 403: Introduction to the Learning Sciences (for MA & PHD students)
- SESP 202: Community Based Research & Educational Justice

### **University of Washington** (overall most recent ratings on 5.0 scale)

- EDPSY 503: Culture, Learning, and Human Development (4.7)
- EDPSY 582B: Advanced Methods Seminar: Ethnography of Human Development and Learning (4.9)
- EDPSY 581C; Community Based Methods in Research (4.8)
- EDPSY 537: Teaching Science with Indigenous Students, Families and Communities (Hybrid on-line course) (4.6)
- EDPSY 580: Indigenous Pedagogies (4.5)

- EDPSY 581A: Place Based Education: Meanings of Land, Culture, and Race in the Natural World (4.8)
- EDTEP 560 Teaching for Learning 1 (Teacher Education Class) (5.1)
- EDTEP 561 Teaching for Learning 2 (Teacher Education Class) (4.7)
- EDC&I 581: Design Based Research Methods 1 (4.8)
- EDC&I 582: Design Based Research Methods 2 (4.9)

### **Other Institutions**

- Northwestern University: Educational Research Methods (Teaching Assistant)
- Northwestern University: Learning and Understanding: A Cognitive Science Approach (Teaching Assistant)
- Northwestern University: Social Context of Teaching and Learning
- Northwestern University: Native American Education
- Native American Education Services College: Introduction to Culture, Cognition, and Human Development
- Native American Education Services College: Dynamics in Worldview and Philosophy

## **PROFESSIONAL SERVICE**

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### **Positions by vote or appointment**

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|--------------|--|
| 2020 (fall)  | Education and Human Resources Advisory Committee, National Science Foundation  |
| 2020 (fall)  | Advisory Committee for Environmental Research and Education, National Science Foundation   |
| 2018-present | Member, Board on Science Education, National Academy of Sciences   |
| 2018-present | Editorial Board, <i>Equity &amp; Excellence</i>  |
| 2016-present | Executive Editor <i>Cognition and Instruction</i>  |
| 2014-present | Editorial Board <i>Curriculum Inquiry</i>  |
| 2014-present | Editorial Board <i>Journal of the Learning Sciences</i>  |
| 2013-present | Editorial Board <i>Mind, Culture, and Activity</i>   |
| 2011-present | Editorial Board <i>Journal of American Indian Education</i>  |
| 2015-2017    | Intellectual House Academic Programming Committee, UW, provost appointed.  |
| 2012-2017    | Native Faculty Leadership Council Representative, Native American Faculty and Staff Association of the University of Washington. |
| 2013-2015    | Coordinator NARST Strand 2: Science Learning: Contexts, Characteristics, and Interactions.                                       |
| 2012-2014    | Secretary/Treasurer, Indigenous Peoples of the Americas SIG, AERA.   |

### **National & International**

- |              |  |
|--------------|--|
| 2019-present | Member, National Academies of Education, Committee on Civic Reasoning and Discourse  |
| 2017-2018    | Member, National Academies Research Counsel Study, Designing Citizen Science to Support Science Learning                             |
| 2016-present | Advisory Board Member, Equity pathways, NSF funded project. PIs: Angela Calabrese Barton, Louise Archer, Lynn Dierking, Emily Dawson |

2016-present Advisory Board Member, State Science Supervisors Partnership, NSF funded project. PIs Bill Penuel, Phil Bell

2016-present Board Member, Grassroots Indigenous Multimedia

2016-2018 Board Member, Na'ah Illahee Fund

2015-2017 Technical Advisor, National Institute of Health, Tribal Advisory Committee

2016-2017 National Science Foundation Committee, Combating Sample WEIRDNESS

2014- present COOAST Advisory Board, International NSF Funded Citizen Science Project

March, 2015 Invited keynote. Transforming Science Education: Leading with Equity, Community, and Partnerships. Council of State Science Supervisors.

March, 2015 Invited keynote. Towards equitable science teaching and learning: Seeing and engaging students' diverse ways of knowing. National Science Education Leadership Association

2014-2015 Editor Special Issue of Cognition & Instruction, Co-Editor Shirin Vossoughi.

2012-2015 Advisory Board Member, Science Teacher Education Program, Salish Kootenai College.

2010-2016 Learning Scientist, Pacific Climate Education Partnership (NSF Funded project PI: Sharon Nelson Barber).

2012-2015 Advisory Board Member, E2Textiles, NSF funded project. PIs: Yasmin Kafai and Bryan Brayboy.

2011-2015 Advisory Board Member, American Migrations, NSF funded project, PI: Josh Radinsky

2012-2015 Advisory Board Member, ArtScience, NSF funded project, PI: Beth Waren and Ann Rosebury.

2010-2012 Inquiry Group Member for CAISE (Center for the Advancement of Informal Science Education), PI: Kevin Crowley.

2009-2011 Advisory Board Member, American Institute of Research Study of URM serving institutions commissioned by NSF, PI: Carlos Rodriguez.

2012 Synthesizer, STEM Smart: Lessons Learned from Successful Schools, National Science Foundation.

2012 Panelist, National Academies of Education invited conference.

2012-2013 Co-editor Special Issue of Human Development, Editor Nailah Nasir.

2010-2012 Mentor scholar, Fisher folk in the Philippines, NSF funded research project.

2009-2011 Committee Member, Minority Dissertation Award AERA.

2008-2010 Chair, Exemplary Dissertation Award AERA.

### **WA State**

2015-2017 WA Department of Early Childhood Leadership Ad Hoc Committee for State Wide Professional Development.

2015 Lead facilitator Thrive by Five Early Childhood Teacher Preparation Council Retreat

2015 Keynote and workshop provider at Wenatchee Early Achievers Institute organized by the National Center on Quality Teaching and Learning.

2014-2016 Workshop presenter for Schools Out Washington Conference.

2013-present Provided professional development presentations at multiple OSPI convenings of district directors of science education and the roll out of the Next Generation Science Standards.



- 2014-2016 Leadership team: NOAA *Advancing Climate Literacy through Investment in In-service and Pre-service Science Educators* (ACLIPSE), with Lawrence Hall of Science, Western Washington University, and Rutgers University.
- 2014-2016 Steering Committee - Next Generation STEM Teacher Preparation in Washington State (NextGen STEM TP-WA) - consortium of Washington State Colleges and Universities in partnership with Washington's Office of the Superintendent of Public Instruction (OSPI).
- 2012-2014 Provided professional development at local community organizations in-kind including: United Tribes of All Indians, Taholah Schools, Quinault Nation, Western Washington Indian Education Association
- 2013-2014 Co-organized workshops with OSPI Director of Science Education and Office of Indian Education for rolling out NGSS in Washington state. Involved in developing the state roll out strategy for schools serving Native students.
- 2013-2014 Presented and facilitated at the Washington Education Association Future Native Teachers initiative.

### **University of Washington**

- 2016-2018 Teacher Education Programs Council Member
- 2016-2017 Member, EDPOL Search Committee for Equity, Leadership, and Learning Position, University of Washington.
- 2015-2017 Program Director, Learning Sciences and Human Development, UW
- 2015-2016 Chair, Diversity Committee, Faculty Governance, College of Education, University of Washington.
- 2013-2014 Member, Search Committee for New Technologies for Equitable Teaching and Learning, University of Washington.
- 2013-2014 Diversity Committee, Faculty Governance, College of Education, University of Washington.
- 2012-2013 Member, Search committee for Instructional Excellence faculty position, University of Washington.
- 2013-2018 Advisory Board Member, Seattle Teacher Residency Program.
- 2013-2018 Steering Committee, Doris Duke Conservation Scholars Program at the University of Washington (DDCSP@UW), in the College of the Environment.
- 2012-present Advisory Board Member, IWRI Center for Excellence, NIH funded project, PI: Karina Walters.
- 2011-present Advisory Board Member, COAST, NSF funded project, PI: Julia Parish.

### **PEER REVIEWER FOR**

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#### **National Research Council**

#### **National Academies of Science**

#### **Journals**

- American Educational Research Journal (reviewed multiple manuscripts)
- American Journal of Education
- Child Development (reviewed multiple manuscripts)
- Cognition (reviewed multiple manuscripts)

- Cognition and Instruction (reviewed multiple manuscripts)
- Cultural Psychology (reviewed multiple manuscripts)
- Curriculum Inquiry
- Educational Researcher (reviewed multiple manuscripts)
- International Journal of Science Education (reviewed multiple manuscripts)
- Journal of American Indian Education (reviewed multiple manuscripts)
- Journal of Geoscience Education
- Journal of the Learning Sciences (reviewed multiple manuscripts)
- Journal of Research in Science Teaching (reviewed multiple manuscripts)
- Mind, Culture, and Activity (reviewed multiple manuscripts)
- Review of Education Research (reviewed multiple manuscripts)
- Review of Research in Education (reviewed multiple manuscripts)
- Science Education (reviewed multiple manuscripts)

### **Conferences**

- American Educational Research Association (AERA) conference
- International Society of the Learning Sciences conference
- Society for Research in Science Teaching Conference

### **Funding Agencies**

- National Science Foundation (*served on multiple panels*)
- National Endowment for the Arts

### **INVITED KEYNOTES**

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Bang, M. (2022, March). What now? Science education that contributes to just, sustainable, and culturally thriving futures. Unity & Inclusion for Global Scientific Literacy. NARST International Conference, Vancouver, BC.

Bang, M. (2021). Sociopolitical Issues in Mathematics and Science Education. Special Interest Group Business Meeting, Annual Meeting of the American Educational Research Association, virtual.

Bang, M. (2021, October). Cultivating Just, Sustainable, and Culturally Thriving Futures Now: Research Beyond Coloniality and Capitalism. North American Association for Environmental Education Annual Research Symposium, virtual.

Bang, M. (2021, April). Developing Science Education for Just, Sustainable, and Culturally Thriving Futures. Chicago Symposium Series on Excellence in Teaching Mathematics and Science: Research and Practice, University of Illinois at Chicago.

Bang, M. (2020, June). A New Kind of Science Education. Labor and Education Forum. AAAS Science and Technology Fellows Symposium: From Concept to Action: A Pathway to Climate Justice.

- Bang, M. (2020, June). Coming of Age in the Time of the Twin Pandemics and Earth's Healing. Chicago Citywide Graduation Celebration.
- Bang, M. (2019, September). Designing Formative Assessments to See Student and Families Ways of Knowing. National Council on Measurement in Education.
- Bang, M. (2019, October). Seeing students sensemaking and possible futures. National Center for Research in Policy and Practice.
- Bang, M. (2019, July). Indigenous science education and cultivating just, sustainable and culturally thriving futures. North American Association for Environmental Education.
- Bang, M. (2019, June). Indigenous Thriving in Higher Education. Association for Higher Education.
- Bang, M. (2018). Socio-ecological Reasoning and NGSS. Presentation to the State Science Supervisors at Council of State Science Supervisors Annual Meeting.
- Bang, M. (2018, September). NGSS and cultivating just, sustainable and culturally thriving futures. Hawaii State Department of Education Science Summit.
- Bang, M. (2017, November). STEAM education towards socio-ecological justice. Teachers of Color and Allies Summit at the University of Colorado Boulder.
- Bang, M. (2014, August). Seeing and Engaging Indigenous Knowledge Systems in Early Childhood Science Education. Keynote address for the Washington State Summit on Tribal Early Childhood Education.
- Bang, M. (2014, June). Expanding design research towards just futures: Culture, learning, community, land. Keynote address for the International Conference of the Learning Sciences.
- Bang, M. (2012). Resisting the Nature/Culture Bisection: Science Teaching and Learning in Indigenous Communities. In Medin, D. (Chair) Symposium conducted at the International Congress of Psychology, Capetown, South Africa.
- Bang, M. (2012, August). Cultural variations in epistemological orientations: Impacts on knowledge, meanings, and reasoning about the natural world. Invited Plenary. Physics Education Research Conference.
- Bang, M. (2012, May). Relational Epistemologies: Impacts on knowledge, meanings and constructions of the natural world. Association of Psychological Sciences. Invited Presidential Session. Chicago, IL.

### **INVITED TALKS**

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- Bang, M. (2022, May). Cultivating Pedagogical Sovereignty: Designing, Implementing and Studying Land and Water Based Learning Environments. Libra Scholar Series: Abolitionist Education. University of Southern Maine.

- Bang, M. (2022, April). Cultivating Pedagogical Sovereignty: Designing, Implementing and Studying Land and Water Based Learning Environments. Indigenous Education Speakers' Series. University of Wisconsin-Madison.
- Bang, M. (2022, March). Mind, Technology, & Society Invited Speaker Series. University of California, Merced.
- Bang, M. (2022, March). Reciprocal Relationship Building. (Re)Cultivating & (Re)Newing Reciprocal Research. Native-University Collaborative Research Workshop Series. Idaho State University.
- Bang, M. (2021, May). Colloquia. University of California, Santa Cruz.
- Bang, M. (2021, April). Nature-culture Relations and Indigenous Ways of Knowing. Center for Innovative Teaching, Research, and Knowing, University of California Santa Barbara.
- Bang, M. (2021, April). Reimagining Field Based Science Education Towards Cultivating Just, Thriving, and Sustainable Worlds. College of Information Studies Dean's Lecture Series, University of Maryland.
- Bang, M. (2021, April). Nature-culture Relations and Engaging Multiple Ways of Knowing. RISE Center Seminars on Inclusion, Arizona State University.
- Bang, M. (2021, January). Engaging Power, Ethics, and Multiple Ways of Knowing in Science Education. Bevan Series on Sustainable Fisheries, University of Washington School of Aquatic and Fishery Sciences.
- Bang, M. (2020, November). Institute of Education Sciences Predoctoral Interdisciplinary Research Training Proseminar Series, New York University.
- Bang, M. (2020, June). *Centering Equity in Reopening Schools? Carefully Navigating the Twin Pandemics*. Workshop on Guidance for K-12 Education on Responding to COVID-19. The National Academies of Sciences, Engineering, and Medicine.
- Bang, M. (2019, November). *Designing Learning for Cultural Variation in Emergent Complex Systems Reasoning*. National Science Foundation's Environmental Education Symposium: How People Come to Understand Complexity in Socio-Environmental Systems.
- Bang, M. (2019, November). *Towards Critical Socio-Ecological Science Education*. UIC's Learning Sciences Research Institute's (LSRI) Speaker Series.
- Bang, M. & Medin, D. (2019, October). *Just Science Education*. First Annual Lecture, Boston University Wheelock College of Education & Human Development.
- Bang, M. & Medin, D. (2019, October). Guide-star Atelier Session. Boston University Wheelock College of Education and Human Development.

- Bang, M. (2019, January). Designing for heterogeneity in the 21<sup>st</sup> century learning: Towards critical socio-ecological science education. Indiana University.
- Bang, M. (2018, October). Science education that cultivates just, sustainable, and culturally thriving futures. University of Michigan.
- Bell, P. & Bang, M. (2018, September). Equity and NGSS. Hawaii P-20 Partnerships for Education Science Summit.
- Bang, M. (2018, July). Climate Change Education. Washington State Department of Education Conference with Education Leaders Across the State.
- Bang, M. (2018, February). Urban land based science education: towards critical socio-ecological decision making in science education. Hugo Rossi Lecture Series. University of Utah.
- Bang, M. (2017, November). Culture, Learning, and Science Education. Workshop on Science Investigations and Engineering Design Experiences in Grades 6-12. The National Academies of Sciences, Engineering, and Medicine
- Bang, M. (2017, October). Indigenous STEAM education and the challenges of the 21st century. WSU Suwyn Family Lecture Series, Washington State University
- Bang, M. (2017, October). Science Education that Matters: Nature-Culture Relations for the 21<sup>st</sup> Century. Stanford University.
- Bang, M. (2017, September). Why does it matter? Shifting theoretical foundations and routine research practices. Sackler Symposium of the National Academies of Sciences.
- Bang, M. (2017, June). Keynote: Towards Land/Water Based District Transformations. American Indian/Indigenous Teacher Education Conference. Northern Arizona University, Flagstaff, AZ.
- Bang, M. (2017, May). Heterogeneity in Science Learning and Teaching. University of Texas, Austin.
- Bang, M. (2016, May). Native Education Towards Nation Building. University of Oregon.
- Bang, M. (2016, April). Towards Land Based Education for Climate Change. University of Arizona.
- Bang, M. (2016, March). Land Based Science Education. University of Alaska.
- Bang, M. (2016, January). Resolving the Historical Trauma of Education: Towards Healing Our Relationships with Land and Water. Northwestern University.
- Bang, M. (2015, November). Culture, Learning, and Development: Native children in Early Childhood Learning Environments. First People, First Steps: Washington Early Childhood Alliance.

- Bang, M. (2015, April). Research Methods and Partnerships: On Issues of Culture and Broadening Participation. National Science Foundation Methods @ Midday Series.
- Bang, M. (2014, December). Learning by Observing in the Natural World. University of California – Santa Barbara.
- Bang, M. & Bell, P. (2014, December). "Supporting Educational Equity & Social Justice in NGSS." Invited presentation at the Office of the Superintendent of Public Instruction meeting, Implementation Thinking Forward: Moving into Washington State Science Learning Standards (NGSS), Seattle, WA.
- Bang, M. (2014, October). Culture, Complex Ecological Thought, and Science Education. Stanford University.
- Bang, M. (2014, October). Towards Indigenous Pedagogies of Relational Mobility in Science Education: Elsewhere to Spatial and Temporal Enclosures of Settler-Colonialism. Cornell University.
- Bang, M. (2014, November). Culture, Complex Ecological Thought, and Science Education. University of Michigan.
- Bang, M. (2014, December). Nature-Culture Relations: Parent-Child Dyads Co-constructing Meanings. University of California-Santa Cruz.
- Bang, M. (2013, October). Community Based Design Research. Annual Learning Sciences Seminar. University of Colorado, Boulder.
- Bang, M. & Warren, B. (2012, October). Desettling Expectations in Science Education. San Diego State University. Distinguished Lecture Series. Center for Research in Mathematics and Science Education.
- Bang, M. (2012, October). Science Education and Community Based Design Research. Annual Learning Sciences Seminar. University of Colorado, Boulder.
- Bang, M. (2011, October). Repatriating Science Teaching and Learning in Indigenous Communities: Towards Educational Self-Determination, Transformative Praxis, and Land-Based Pedagogies. University of Washington School of Social Work.
- Bang, M. (2011). Socio-historic context and culture: Central mediating dimensions for public understanding of science. Invited presentation at Public Understanding and Public Engagement with Science Conference funded by NSF.
- Bang, M. (2010, April). Expanding the possibilities of students' navigation and meaning making of bordered territories: STEM education towards sustainability. Invited presidential session American Education Research Association, Denver, CO.

Bang, M. (2010, Fall) Relational Perspectives, Culture, and Meaning Making. Invited Colloquia at Michigan State University.

Bang, M. (2009, October) Psychological Distance, Culture Orientations, and Science Learning. Invited Colloquia at University of Illinois.

Bang, M. (2009, May) Improving Science Education for Native Students: Changes in Teacher Education. Invited Colloquia at University of Michigan as part of the Teacher Education Initiative Seminar Series.

**PEER-REVIEWED CONFERENCE PRESENTATIONS & PAPERS (last 10 years)**

Schweingruber, H., Dibner, K., Bang, M., & Garcia, M. (2021, April). National Academies of Sciences (NAS) Board of Science Education (BOSE) Contribution to Science Education as a Public Good. Presented at NARST 94<sup>th</sup> Annual International Conference, virtual.

Bang, M., Tzou, C., Siehl, S., Nolan, C., Pugh, P., Sherry-Wagner, J., Benita, C., Bricker, L., & McGowan, V. (2021, April). Centering Power, Historicity, and Nature-Culture Relations in Place-Based Science Education. Paper presented at NARST 94<sup>th</sup> Annual International Conference, virtual.

Nasir, N., Alim, H.S., Bellino, M., Ball, A., Bang, M., Barron, B., Hand, V., Heath, S., Moje, E., Paris, D., Pea, R., Peele-Eady, T., Rosebery, A., Stevens, R., Taylo, E., Winn, M., Vossoughi, S., Warren, B., & Wong, C. (2021, April). Creating Expansive and Equitable Learning Environments: Elaborating the RISE Learning Principles: Learning Across Contexts. Annual Meeting of the American Educational Research Association, virtual.

Levy, O., Henderson, J., Bang, M., Emdin, C., McDermott, M., McKenzie, M., & Niepold F. (2021, April). Educators Take Action on Climate Change and Sustainability. Invited Speaker Session, Annual Meeting of the American Educational Research Association, virtual.

Jahnke, H., Johnston, P., Bang, M., Crazy Bull, C., Dukelow, K., Maaka, M., Nelson-Barber, S., & Smith, L. (2021, April). What Happens When Indigenous Women Scholars Become Activists: Possibilities and Perils. Invited Speaker Session, Annual Meeting of the American Educational Research Association, virtual.

Bang, M. (2021, April). Chair for *A Vision for the Future of STEM at the National Science Foundation: A Conversation with Karen Marrongelle*. Annual Meeting of the American Educational Research Association, virtual.

Elliott-Groves, E. & Bang, M. (2021, April). *Ending Indigenous Suicide: Understanding Food and Land Systems as Fundamental to Indigenous Livelihoods*. Roundtable, Annual Meeting of the American Educational Research Association, virtual.

McDaid-Morgan, N., Bang, M., Guerra, M. (2020, July) *Living stories in teaching and learning for remaking nature-culture relations* [Paper in Symposium]. ICLS Annual Meeting, Nashville, TN, virtual.

- Villanosa, K., McDaid-Morgan, N., Bruce, F., Barajas-Lopez, F., Bang, M. (2020, July) *Politically- and ethically-driven reflective practice: An ideational resource for remaking intergenerational relations* [Paper in Symposium]. ICLS Annual Meeting, Nashville, TN, virtual.
- Uttamchandani, S., Shrodes, A., Lizarraga, J., Cortez, A., Paré, D., Shanahan, M., Sengupta, P., Bang, M., & Hoadley, C. (2020, June). *Attending to Gender and Sexuality in Learning: Lessons From Scholarship By, For, and With LGBTQ+ People*. Presented at the International Conference of the Learning Sciences. Nashville, Tennessee.
- Marin, A., Halle-Erby, K., Bang, M., McDaid-Morgan, N., Guerra, M., Nzinga, K., \*, M., Elliott-Groves, E., & Booker, A. (2020, June). *The Power of Storytelling and Storylistening for Human Learning and Becoming*. Presented at the International Conference of the Learning Sciences. Nashville, Tennessee.
- Bang, M., Booker, A., Villanosa, K., Nolan, C., Peterson, S., Ramayon, A., Braun, A., Ortiz, S. M., Bell, P., Pugh, P., Sherry-Wagner, J., \*, M., Vossoughi, S., McDaid-Morgan, N., Bricker, L., Bruce, F., Guerra, M., Tzou, C., & Starks, E. (2020, June). *Exploring the Dynamics and Potentials of Reimagining and Engaging Intergenerational Learning*. Presented at the International Conference of the Learning Sciences. Nashville, TN.
- McDaid-Morgan, N. and Bang, M. (2019, November) *“Then the Nettle People won’t be lonely”*: *Recognizing the personhood of plants in an Indigenous STEAM summer program*. Presented at the Association of Moral Education Conference. Seattle, WA.
- Novack, M., Standley, M., Bang, M., Washinawotok, K., Medin, D., Waxman, S. (2019, October). *Hands on or Hands off? Native- and Non-Native American Parent-Child Dyads’ Gestures and Actions in Forest Diorama Play*. Poster presented at Cognitive Development Society, Louisville, KY.
- Baker-Oglesbee, A., McDaid-Morgan, N., Bruce, F., Soto, C., Bang, M. (2019, May) *(Re)Introduction to Community-Based Design Research*. Presented at Urban Indian Education Conference. Chicago, IL.
- Bang, M. (2019, April). *Science Education and Civics in the 21<sup>st</sup> Century” Critical Socio-ecological Reasoning and Decision Making*. Paper presented at AERA. Toronto, ON.
- Bang, M. & Barajas, F. (2019, April). *Towards Transforming Systems of Education Serving Native Communities: Native Education Certificate Program*. Paper presented at AERA. Toronto, ON.
- Bang, M., Tzou, C., Johnson, A., Mengist, N., Neldum, M., Nolan, C.M., Pugh, P., Siehl S., Sherry-Wagner, J., Tsoodle, A. (2019, April). *Designing with teachers, families, and communities for heterogeneity in field-based science learning*. Poster session presented at the American Education Research Association (AERA) Conference. Toronto, ON.
- Bang, M., Tzou, C., Nolan, C., Pugh, P. (2019, April). *Designing with teachers, families, and communities for heterogeneity in field-based science learning*. Poster session presented at the American Education Research Association (AERA) Conference. Toronto, ON.



- Marin, A., Nolan, C., McDaid-Morgan, N., Bang, M. (2019, April) *Walking Pedagogies and Indigenous Resurgence in Learning Environments*. Paper presented at the American Education Research Association (AERA) Conference. Toronto, ON.
- Bang, M., McDaid-Morgan, N. (2019, April) *Supporting Youth Sense-making of Political and Ethical Possibilities of Heterogeneous Nature-culture Relations*. Presented at the American Education Research Association (AERA) Conference. Toronto, ON.
- Bang, M., McDaid-Morgan, N., Guerra, M. (2019, April) *Engaging Native youth in learning and making change*. Presented at the American Education Research Association (AERA) Conference. Toronto, ON.
- Melendez, J. W., Radinsky, J., Vossoughi, S., Marin, A. M., Bang, M., Nolan, C. M., Phillips, N. C., Lund, V. K., Gonzales, W., Allen, S., Bild, D., Bruton, I., Carmichae, J., Martell, E., Schmidt, A., Jurow, A. S., & Hall, R. (2018). *Community-Based Design Partnerships: Examples from a New Generation of CHAT/DBR*. Presented at the International Conference of the Learning Sciences. London, UK.
- Suárez, E., Tzou, C., Bang, M., \*, M., Roque, R., Pinkard, N., McDermott, R., Barron, B., Goldman, S., Luce, M., Veal, T., Conlin, L., Bell, P., & Martin, C. K. (2018). *Designing for Axiological Innovation within Family-Centered Learning Environments*. Presented at International Conference of the Learning Sciences. London, UK.
- McGinty, M., McDaid-Morgan, N., Tsoodle, A., Bang, M. (2018). *Models of Collaboration Between Environmental Education Providers and Indigenous Communities*. Presented at the North American Association for Environmental Education Annual Conference. Spokane, WA.
- Marin, A., Bang, M. & Nolan, C. (2018). *Community Based Place Designing: Innovations in Design Practices for Expansive Science Education*. Paper presented at the International Conference of the Learning Sciences, London, England.
- Bang, M. & Meixi. (2018). *The Hummingbird Story. Navigating ethical multiplicities of heterogeneous nature-culture relations in learning environments*. Paper presented at the International Conference of the Learning Sciences, London, England.
- Bang, M. (2018). *Towards Indigenous Collective Continuance Through Designing Our Own Learning Environments*. Paper presented at the American Educational Research Association (AERA) Annual Meeting, New York, NY.
- Bang, M. (2018). Designing learning for just, sustainable, and culturally thriving futures: Engaging complex social-ecological systems in place. Paper presented at the American Educational Research Association (AERA) Annual Meeting, New York, NY.
- Bang, M. (2018). Science Education Towards Justice, Sustainability, and Cultural Thriving Communities in the 21<sup>st</sup> Century. Paper presented at the American Educational Research Association (AERA) Annual Meeting, New York, NY.

- Lee, V. R., Tzou, C., Bang, M., Bell, P., Stromholt, S., Price, N., Ng, M., Kafai, Y., Telhan, O., Davis, R., Steele, K.-F., Adleberg, B., Kahn, J., Hall, R., Phillips, A., Hansen, J., Recker, M., & Barron, B. (2017). *Libraries as Emerging Spaces for Computer-Supported Collaborative Learning in Schools and Communities*. Presented at the International Conference on Computer Supported Collaborative Learning, Philadelphia, PA.
- Bang, M. (2017). Complex Ecological Systems and Storymaking: Native Youth Learning About Changing Lands and Waters. Presentation at National Association of Research in Science Teaching (NARST) Annual Conference, San Antonio, TX.
- Tzou, C., Bang, M. & Bell, P. (2017). Tech Tales: Connecting Robotics with Family Storytelling. Presentation at National Association of Research in Science Teaching (NARST) Annual Conference, San Antonio, TX.
- Warren, B., Bang, M., Rosbery, A. & Pugh, P. (2017). Artscience: Participative thinking, feeling and making *with* socio-ecological phenomena. Paper presented at the American Educational Research Association (AERA) Annual Meeting, San Antonio, TX.
- Barajas, F. & Bang, M. (2017). Towards Indigenous Making. Poster presentation at the American Educational Research Association (AERA) Annual Meeting, San Antonio, TX.
- Bang, M. (2017). Stories of Changing Lands and Waters for Collective Continuance. Paper presented at the American Educational Research Association (AERA) Annual Meeting, San Antonio, TX.
- Bang, M., Pugh, P., & McGinty, M. (2017). Field Based Science Education & NGSS. Paper presented at the American Educational Research Association (AERA) Annual Meeting, San Antonio, TX.
- Bang, M. & Ishimaru, A.M. (2017, April). Co-designing family & community wellness and educational justice: Findings from the Family Leadership Design Collaborative. Symposium at the American Educational Research Association Conference, San Antonio, TX.
- Bang, M. (2016) Participatory Design Research. Paper presented at the American Anthropological Association, Minneapolis, MN.
- Bang, M. (2015). Designing Learning about Climate Change: Beyond Fear and Loathing in Settler-Colonial Societies. Paper presented at the annual American Education Research Association, Chicago, IL
- Warren, B., Rosebery, A., and Bang, M. (2015). Expansive Meanings and Makings in the Human Micro-Biome. Paper presented at the annual American Education Research Association, Chicago, IL.
- Bang, M. (2015). Urban Land-Based Pedagogies: Featured Chicago Symposium. Paper presented at the annual American Education Research Association, Chicago, IL.

- Bang, M. (2015). Restorying Relations to Land in Science Education: Youth Symposium. Paper presented at the annual American Education Research Association, Chicago, IL.
- Myles, C. & Bang, M. (2015). Teacher Sense-making about epistemic practices in science learning. Poster presented at the annual American Education Research Association, Chicago, IL.
- + Bang, M. Marin, A., Gurneau, J., Faber, L. (2015) *Remaking Relations: Ten Years of Community Based Design Research: Shifting Power Relations*. Presented at the International Conference of the Learning Sciences. Boulder, Co.
- Olson, I. D., Marin, A., Medin, D. L., Hirsh, A., Levy, S. T., Bang, M., Pugh, P., McGinty, M., & Wilensky, U. (2014). Learning and Thinking in Practice: Complex Systems Thinking "In the Wild". Presented at the International Conference of the Learning Sciences. Colorado, CO.
- Warren, B., Rosebery, A., and Bang, M. (2014). Expansive Meanings and Makings in Art Science. Presented at the International Conference of the Learning Sciences, Boulder, Co.
- +Bang, M., Pugh, P., & Medin, D. (2014). Emergent complex systems reasoning?: Cross-cultural differences in reasoning about eating relationships between kinds. Paper presented at the International Conference of the Learning Sciences, Boulder, Co.
- +Bang, M., Faber, L., and Gurneau, J. (2014). Remediating ontologies: Storying relations to land in science education, views through digital arts. Paper presented at the annual American Education Research Association, Philadelphia.
- +Bang, M., Faber, L., and Gurneau, J. (2014). Remediating ontologies: Science Education, Digital Storymaking and Narratives of Land. Paper presented at the annual Ethnography in Education Research Forum, Philadelphia.
- Bang, M. & Marin, A. (2014). Nature-Culture Constructs in Science Learning: Human-non-human agency and intentionality. Paper presented at the annual meeting of the National Research on Science Teaching Conference, Pittsburgh.
- +Bang, M., Gurneau, J. & Medin, D. (2014). Seeing Children's Model Based Understandings of Forest Ecosystems: Drawing and Complex Ecological Thought. Paper presented at the annual meeting of the National Research on Science Teaching Conference, Pittsburgh.
- Ebert, E., Bell, P., Windschitl, M. Bang, M. (2014 , December 10). "Meet the Next Generation Science Standards." Workshop presented at the 29<sup>th</sup> Annual Washington Education Research Association (WERA) Conference, Seattle, WA.
- Bang, M. (2013). On Indigenous futurity: Towards new imaginings of place and learning. Discussant paper presented at the annual meeting of the American Education Research Association, San Francisco.
- Bang, M. (2013). Seeing and Engaging Relational Epistemologies: Changing Nature-Culture Relations in Science Education. Paper presented at the annual meeting of the American Education Research Association, San Francisco.

- Hermes, M. & Bang, M. (2013). Language Revitalization Practice Into Theory. Paper presented at the annual meeting of the American Education Research Association, San Francisco.
- Marin, A & Bang, M (2013). The Nature of Attentional Directives and Relationships with the Natural World. Paper presented at the annual meeting of the American Education Research Association, San Francisco.
- Bang, M. (2013). Differences between Native and Non-Native Authored Children's Books and Their Impacts on Sensemaking in the Natural World. Paper presented at the annual meeting of the National Research on Science Teaching Conference, Puerto Rico.
- Bang, M. (2013). Seeing and Engaging Relational Epistemologies: Changing Nature-Culture Relations in Science Education. Symposium conducted at Society for Anthropological Sciences, Mobile, AL.
- Bang, M. (2012). "We know from our elders there are spirits in there [River]": Reconstructing Science Education Towards Lived Survivance, Sovereignty, and Sustainability. Symposium conducted at the annual meeting of the American Educational Research Association. Vancouver.
- +Bang, M., Curley, L., Kessel, A., Marin, A. & Suzokovich, E. (2012). Muskrat Theories, Tobacco in the Streets, and Living Chicago as Indigenous Lands. Symposium conducted at the annual meeting of the American Educational Research Association. Vancouver.
- +Marin, A. & Bang, M. (2012). Mediating Meanings and Pedagogy through Storywork: Teacher's Storytelling of Land-Based Experience. Symposium conducted at the National Research in Science Teaching Conference.
- Bang, M. (2011). Seeing swales and rethinking navigation: Problems of reification and cartesian coordinates in socio-cultural research. Symposium conducted at the annual meeting of the American Educational Research Association. New Orleans, LA.
- Bang, M. (2011). Repatriating Indigenous Technologies in a Community Based Science Program. Symposium conducted at the annual meeting of the American Educational Research Association. New Orleans, LA.
- Bang, M., Marin, A., & Medin, D. (2011). Relational epistemologies in Indigenous communities: Implications for rethinking science learning trajectories. Symposium conducted at the annual meeting of the Jean Piaget Society. Berkeley, CA.
- +Bang, M., Alfonso, J., Bellenger, A., Curley, L., Faber, L., Kessel, A., Marin, A., Medin, M., Soto, C., Suzukovich, E., & Strack, G. (2011). Community Based Design Research: Transforming Teaching and Learning and Rebuilding Community Capacity. Poster presented at the annual meeting of the American Educational Research Association. New Orleans, LA.

- +Marin, A., Bang, M., & Medin, D. (2011). Ascribing internal states to non-human kinds: A comparison of Native American and European American authored children's books. Poster presented at the annual meeting of the Jean Piaget Society. Berkeley, CA.
- Bang, M. (2010) Tobacco in the Streets: Land Based Pedagogies in Urban Indian Communities. Symposium conducted at the American Educational Studies Association, Denver, CO.
- Bang, M. (2010). Increasing Rigor and Generativity in Learning: Connections Between the Disciplines, Children's Lived Experience and Everyday Knowledge. Symposium conducted at International Conference of the Learning Sciences, Chicago, IL.
- +Marin, A. & Bang, M. (2010). Storied Transformations in Science Teaching: Teacher's Sights of Theory Regeneration. Symposium conducted at American Educational Research Association, Denver, CO.
- Bang, M. & Wright, C. (2009). The Archaeology of Racialized Dilemmas: Excavating Oppositional Binaries. Symposium conducted at University of Iowa Critical Race Theory Conference.
- Bang, M. & Wright, C. (2008). The Archaeology of Racialized Dilemmas: Excavating Oppositional Binaries. Symposium conducted at Critical Race Theory Conference. University of Illinois Chicago.
- Bang, M. & Medin, D. (2008). Community-Based Design of Science Learning Environments: Engaging with and Implementing Relational Epistemologies. Symposium conducted at AAAS, Boston, MA. Invited Session.
- Bang, M. & Medin, D. (2008). Transforming oppositional binaries through professional learning: Working historically raced and cultured meanings, relationships and experiences with science and science education. Symposium conducted at American Educational Research Association: New York, NY.
- +Bang, M., Dodge, C., Medin, D., Podlasek, J., Soto, C. & Unsworth, S. (2007). Relations and Orientations to the Natural World: Implications for the Design of Learning Environments. Symposium conducted at the Society for Research in Child Development, Boston, MA.
- Warren, B., Bang, M., Wright, C., Rosebery, A., Hudicourt-Barnes, J. & Nemirovsky, D. (2008). *Learning-in-Practice: Coordinating Angles of Vision and Voice in Professional Communities*. Symposium conducted at American Educational Research Association: New York, NY.
- Bang, M. & Wright, C. (2008). *Navigating Oppositional Binaries: Raced & Cultured Dimensions of Learning*. Symposium conducted at the American Educational Research Association: New York, NY.
- +Bang, M., Medin, D., Soto, C., & Kessel, A. (2007). *Community Based Design of an After-School Program in an Urban Indian Community*. Symposium conducted at the National Indian Education Association Conference.

+Bang, M., Dodge, C., Medin, D., Podlasek, J., Soto, C. & Unsworth, S. (2007). *Relations and Orientations to the Natural World: Implications for the Design of Learning Environments*. Symposium conducted at American Educational Research Association, Chicago, IL

+Bang, M., Dodge, C., Medin, D., Podlasek, J., Soto, C. & Unsworth, S. (2007). *Native Children's Community Based Biological Knowledge: Implications for the Design of Learning Environments*. Symposium conducted at the Society for Research in Child Development.

Bang, M. Brayboy, B., & Medin, D. AERA Professional Development Workshop: Perspectives on Ecological Frameworks for Examining Learning and Development as Cultural Practices. Led Case Circle: *From Biology Learning in Native Communities to the Design of Science Learning Environments*. Course delivered at American Educational Research Association Annual Conference, Chicago, IL 2007.

### **PROFESSIONAL MEMBERSHIPS**

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- American Education Research Association: Various SIG memberships
- National Association of Research in Science Teaching
- National Indian Education Association
- American Association for the Advancement of Science
- International Society of the Learning Sciences
- Cognitive Science Society
- Society for Research in Child Development
  - Native Children's Research Exchange
- American Indian Science and Engineering Society