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CURRENT TITLE

Postdoctoral Research Fellow, Emory Global Diabetes Research Center, Rollins School of Public Health, Emory University

June 2022 – Present. Atlanta, GA

EDUCATION

Emory University, Atlanta, GA

May 2022

Ph.D. in Nutrition and Health Sciences

Dissertation: Role of growth at different age intervals, early life nutrition, and adulthood factors on the development of adult body composition in individuals from low and middle-income countries

Universidad Nacional de Colombia, Bogota, Colombia

January 2017

Master of Sciences in Biochemistry

Thesis: Study of biochemical, anthropometric and serum factors during pregnancy in a longitudinal cohort at Engativa Hospital, Bogota

Universidad Nacional de Colombia, Bogota, Colombia

April 2014

Specialization: Professional Certificate in Food Science and Technology

Universidad Nacional de Colombia, Bogota, Colombia

May 2013

Bachelor in Nutrition and Dietetics

PUBLICATIONS

Peer-reviewed publications

1. **Poveda NE**, Adair LS, Martorell R, Patel SA, Ramirez-Zea M, Bhargava SK, Bechayda SA, Carba DB, Kroker-Lobos MF, Horta BL, Lima NP, Mazariegos M, Menezes AMB, Norris SA, Nyati LH, Richter LM, Sachdev H, Wehrmeister FC, Stein AD. Growth patterns in childhood and adolescence and adult body composition: a pooled analysis of birth cohort studies from five low and middle-income countries (COHORTS collaboration). *BMJ Open*. 2023 Mar 15;13(3):e068427. doi: 10.1136/bmjopen-2022-068427. PMID: 36921951.
2. Patel SA, **Poveda NE**. Measuring Overnutrition in Children: Do We Know Enough? *Indian Pediatr*. 2023 Jan 15;60(1):11-12. PMID: 36639968.

3. Del Castillo-Matamoros SE, **Poveda NE**. Importance of nutrition in pregnant women. *Rev Colomb Obstet Ginecol*. 2021 Dec 30;72(4):339-345. doi: 10.18597/rcog.3825. PMID: 35134281; PMCID: PMC8833237.
4. **Poveda NE**, Hartwig FP, Victora CG, Adair LS, Barros FC, Bhargava SK, Horta BL, Lee NR, Martorell R, Mazariegos M, Menezes AMB, Norris SA, Richter LM, Sachdev HS, Stein A, Wehrmeister FC, Stein AD; COHORTS Group. Patterns of Growth in Childhood in Relation to Adult Schooling Attainment and Intelligence Quotient in 6 Birth Cohorts in Low- and Middle-Income Countries: Evidence from the Consortium of Health-Oriented Research in Transitioning Societies (COHORTS). *J Nutr*. 2021 Aug 7;151(8):2342-2352. doi: 10.1093/jn/nxab096. PMID: 33982126; PMCID: PMC8436131.
5. **Poveda NE**, Garcés MF, Darghan AE, Jaimes SAB, Sánchez EP, Díaz-Cruz LA, Garzón-Olivares CD, Parra-Pineda MO, Bautista-Charry AA, Müller EÁ, Alzate HFS, Acosta LMM, Sanchez E, Ruíz-Parra AI, Caminos JE. Triglycerides/Glucose and Triglyceride/High-Density Lipoprotein Cholesterol Indices in Normal and Preeclamptic Pregnancies: A Longitudinal Study. *Int J Endocrinol*. 2018 Aug 6;2018:8956404. doi: 10.1155/2018/8956404. PMID: 30158976; PMCID: PMC6109518.
6. Agudelo-Zapata Y, Maldonado-Acosta LM, Sandoval-Alzate HF, **Poveda NE**, Garcés MF, Cortés-Vásquez JA, Linares-Vaca AF, Mancera-Rodríguez CA, Perea-Ariza SA, Ramírez-Iriarte KY, Castro-Saldarriaga CA, Arteaga-Díaz JM, Franco-Vega R, Ángel-Müller E, Parada-Baños AJ, Caminos JE. Serum 25-hydroxyvitamin D levels throughout pregnancy: a longitudinal study in healthy and preeclamptic pregnant women. *Endocr Connect*. 2018 May;7(5):698-707. doi: 10.1530/EC-18-0055. Epub 2018 Apr 17. PMID: 29666170; PMCID: PMC5952242.
7. Sandoval-Alzate HF, Agudelo-Zapata Y, González-Clavijo AM, **Poveda NE**, Espinel-Pachón CF, Escamilla-Castro JA, Márquez-Julio HL, Alvarado-Quintero H, Rojas-Rodríguez FG, Arteaga-Díaz JM, Eslava-Schmalbach JH, Garcés-Gutiérrez MF, Vrontakis M, Castaño JP, Luque RM, Diéguez C, Nogueiras R, Caminos JE. Serum Galanin Levels in Young Healthy Lean and Obese Non-Diabetic Men during an Oral Glucose Tolerance Test. *Sci Rep*. 2016 Aug 23;6:31661. doi: 10.1038/srep31661. PMID: 27550417; PMCID: PMC4994037.
8. **Poveda NE**, Garcés MF, Ruiz-Linares CE, Varón D, Valderrama S, Sanchez E, Castiblanco-Cortes A, Agudelo-Zapata Y, Sandoval-Alzate HF, Leal LG, Ángel-Müller E, Ruíz-Parra AI, González-Clavijo AM, Diéguez C, Nogueiras R, Caminos JE. Serum Adipsin Levels throughout Normal Pregnancy and Preeclampsia. *Sci Rep*. 2016 Feb 1;6:20073. doi: 10.1038/srep20073. PMID: 26832661; PMCID: PMC4735521.
9. Garcés MF, **Poveda NE**, Sanchez E, Sánchez ÁY, Bravo SB, Vázquez MJ, Diéguez C, Nogueiras R, Caminos JE. Regulation of NucB2/Nesfatin-1 throughout rat pregnancy. *Physiol Behav*. 2014 Jun 22;133:216-22. doi: 10.1016/j.physbeh.2014.05.042. Epub 2014 Jun 4. PMID: 24905431.
10. Garcés MF, Peralta JJ, Ruiz-Linares CE, Lozano AR, **Poveda NE**, Torres-Sierra AL, Eslava-Schmalbach JH, Alzate JP, Sánchez AY, Sanchez E, Angel-Müller E, Ruíz-Parra AI, Diéguez C, Nogueiras R, Caminos JE. Irisin levels during pregnancy and changes associated with the development of preeclampsia. *J Clin Endocrinol Metab*. 2014 Jun;99(6):2113-9. doi: 10.1210/jc.2013-4127. Epub 2014 Mar 14. PMID: 24628554.

Other publications

1. Jiménez Soto AZ, Triana Reyes CA, Flórez Nieto CE, Camargo Lemos DM, Cadena Gaona EM, Ardila Pinto FG, Hernández Montoya YA, Bermúdez Forero J, Rosas Vargas LJ, Sánchez Céspedes LM, Sepúlveda LA, Zea León MdP, Benjumea Rincón MV, Galindo Borda M, **Poveda Rey NE**, Cobos de Rangel O, Sarmiento Dueñas OL, Herrán Falla OF, Ramírez Vélez R, Del Castillo Matamoros SE, González Cifuentes SA, Forero Torres Y. Documento general de análisis Encuesta Nacional de la Situación Nutricional en Colombia - ENSIN 2015. Bogotá (Colombia): Instituto Colombiano de Bienestar Familiar; 2019. ISBN: 978-958-623-200-7. p. 683.
2. Jiménez Soto AZ, Cadena Gaona EM, Bermúdez Forero J, Rosas Vargas LJ, Benjumea Rincón MV, **Poveda Rey NE**, Sarmiento Dueñas OL, Ramírez Vélez R, Del Castillo Matamoros SE, González Cifuentes SA, Forero Torres Y. Encuesta Nacional de la Situación Nutricional ENSIN 2015. Resumen Ejecutivo Primeros Resultados de la Encuesta de la Situación Nutricional en Colombia ENSIN 2015. Bogotá (Colombia): Instituto Colombiano de Bienestar Familiar; 2019. ISBN: 978-958-623-200-5. p. 64.

Manuscripts under review

1. **Poveda NE**, Adair LS, Martorell R, Patel SA, Ramirez-Zea M, Stein AD. Early life predictors of body composition trajectories from adolescence to mid-adulthood. *Submitted to The American Journal of Human Biology*
2. Jhaveri NR, **Poveda NE**, Kachwaha S, Ghosh S, Escobar-Alegria J, Kappos K, Avula R, Menon P, Nguyen PH, Young MF. Opportunities and barriers for maternal nutrition behavior change: An in-depth qualitative analysis of pregnant women and their families in Uttar Pradesh, India. *Submitted to Frontiers in Nutrition*

Manuscripts in progress

1. **Poveda NE**, Elliot M, Mehta N, Cunningham S. A synthetic cohort to study obesity from childhood to mid-adulthood: a matching approach of two nationally representative cohorts in the United States.
2. **Poveda NE**, Adair LS, Martorell R, Patel SA, Ramirez-Zea M, Del Castillo-Matamoros SE, Stein AD. Individual and contextual predictors of body mass index and waist circumference in Colombian adults: A multilevel analysis of the National Nutrition Survey 2015.
3. **Poveda NE**, Patel SA et al. Comparison of obesity indices in predicting future risk of cardiovascular risk factors in South Asian adults: The CARRS Study.
4. **Poveda NE**, Elliot M, Mehta N, Nielsen J, Cunningham S. Obesity dynamics across different stages of development: An analysis of three nationally representative cohorts in the US
5. Wang Z, **Poveda NE**, Nielsen J, Cunningham S. Patterns of Chronic Disease Multimorbidity in the U.S. and the Role of Weight Status.
6. Jones-Antwi R, Aguayo L, **Poveda Rey, N**, Cunningham, S. Race identity and chronic disease: Obesity and diabetes among bi-racial and multi-racial adults.

CONFERENCE PRESENTATIONS

1. **Poveda NE**, Elliot M, Mehta N, Cunningham S. A synthetic cohort to study obesity from childhood to mid-adulthood: a matching approach of two nationally representative cohorts in the United States. Population Association of America Annual Meeting. April 2023, New Orleans, LA. (Oral presentation).
2. Jones-Antwi R., Aguayo L., **Poveda Rey, N.**, Cunningham, S. Race identity and chronic disease: Obesity and diabetes among bi-racial and multi-racial adults. American Heart Association Epi Lifestyles. February 2023. Moderated Poster Presentation.
3. **Poveda NE**, Stein AD. Individual and contextual predictors of body mass index and waist circumference in Colombian adults: A multilevel analysis of the National Nutrition Survey 2015. *Population Association of America Annual Meeting*. April 2022, Atlanta, GA. (Oral presentation).
4. **Poveda NE**, Kachwaha S, Avula R, Menon P, Nguyen P, Young MF. In-depth understanding of a maternal nutrition program implementation in Uttar Pradesh India: Frontline workers experiences and perceptions. *Micronutrient Forum 5 Global Conference 2020: Building New Evidence and Alliances for Improving Nutrition*. November 2020, Virtual (Poster)
5. **Poveda NE**, Caminos-Pinzón JE, Ángel-Müller E, Ruiz-Parra AI, Rubio-Romero JA, Parada-Baños AJ, Garzón-Olivares CD, Garcés-Gutiérrez MF, Rojas-Rodríguez FG, Diaz-Cruz LA, Sanchez-Serna E, Nogueiras-Pozo R. Gestational Age Specific Reference Intervals and Distance Curves during Pregnancy in a Longitudinal Cohort Study in Bogota, Colombia. *The Endocrine Society 99th Annual Meeting and Expo*. April 2017, Chicago, IL. (Poster)
6. **Poveda NE**, Caminos-Pinzón JE, Ángel-Müller E, Ruiz-Parra AI, Garcés-Gutiérrez MF, Leal-Ayala G, Gonzalez-Clavijo AM, Sanchez-Serna E, Nogueiras-Pozo R. Serum Adipsin Levels throughout Normal Pregnancy and Preeclampsia in Women. *Endocrine Society 97th Annual Meeting and Expo*. March 2015, San Diego, CA. (Poster)

RESEARCH EXPERIENCE

- June 2022 – Present **Postdoctoral Fellow, Emory Global Diabetes Research Center, Rollins School of Public Health, Emory University.** Participation in two research projects: 1) Obesity dynamics during the first three decades of life in the United States, and 2) Study of multimorbidity patterns in the United States from early to late adulthood, through the analysis of seven nationally representative population cohorts and the construction of synthetic cohorts.
- August 2018 – May 2022 **PhD Candidate, Doctoral Program in Nutrition and Health Sciences, Emory University**
- Dissertation, Nutrition and Health Sciences PhD Program, Emory University (Atlanta, GA).** Role of growth at different age intervals, early life nutrition, and adulthood factors on the development of adult body composition in individuals from low and middle-income countries.

Research Rotation, Nutrition and Health Sciences PhD Program, Emory University (Atlanta, GA), Mar – Jun 2021. Epidemiology research rotation to examine the associations between growth in four age intervals (prenatal, birth to age two years, mid-childhood, adulthood) and two dimensions of adult human capital (school attainment and Intelligence Quotient) in six birth cohorts from five low and middle-income countries. As part of this rotation, I led the writing process as the first author of a peer-reviewed publication, where I developed the literature review, I wrote first draft of the paper and kept a constant communication with the epidemiologist that conducted the statistical analysis and the principal investigators at each study site. I also contributed to the editing of successive drafts, organization of results, and preparation of all documents required for the submission and publication.

Research Rotation, Nutrition and Health Sciences PhD Program and Global Health Department, Emory University (Atlanta, GA), Jan - Aug 2020. Epidemiologic data analysis to examine the performance of eight obesity indices in prospectively predicting the risk of cardiovascular risk factors in a community-based cohort of South Asian adults (The CARRS Study). As part of this project I developed the analysis plan, improved my data analysis skills using SAS for the creation of a coding book, recoding of variables, analysis of baseline characteristics using survey procedures, correlation analysis, application of GEE procedures and creation of SAS macros to run the models, and adjustment of data (creation of deciles, quintiles, log-transformation of skewed variables and back-transformation for the final report of results). Additionally, during this rotation I was able to think critically in terms of defining the appropriate statistical analysis for the research question and aim, and to apply scientific and academic writing to report study findings.

Research Rotation, Nutrition and Health Sciences PhD Program, Emory University and IFPRI: International Food Policy Research Institute (Atlanta, GA and Uttar Pradesh, India), Mar – Nov 2019 and Summer 2020. I worked on a project of Emory University in collaboration with IFPRI and Alive & Thrive to carry out a qualitative study to get a deep understanding of a maternal nutrition program implementation at the district, block, village and household levels in Uttar Pradesh India. We conducted 124 in-depth interviews to key stakeholders such as pregnant women, family members (husbands, mothers-in law), community members, front line workers, supervisors, and program staff at block and state levels. Through this research rotation I developed both qualitative research skills and field project management skills such development of research question and aims, building of study and field protocols, writing of IRB proposal, development of questionnaires for in-depth interviews, coordination with collaborators, development of field data collection schedule and budget of field work,

hiring and training of research assistants among others. I also contributed in the analysis phase of household members interviews developing coding books, using a qualitative data analysis software (MAXQDA) and applying a behavioral change framework (COM-B model) to report study findings.

July 2012 – July 2018

Basic and Clinical Sciences Investigator, Universidad Nacional de Colombia (Bogota, Colombia). Endocrinology and Basic Nutrition Group (Colciencias GrupLac ID: COL0064208), Department of Physiology, Faculty of Medicine.

Principal Investigator: Professor Jorge Eduardo Caminos-Pinzón, Ph.D.
Investigated: neuroendocrine physiology in animal models and humans, gene expression and regulation of metabolism in animal and human models, human biomarker analysis in obesity and metabolic disorders, gene expression and regulation in pregnancy in animal and human models, and biomarker analysis during human pregnancy. Collaborated with the Departments of Obstetrics and Gynecology, Internal Medicine and Endocrinology.

PROFESSIONAL EXPERIENCE

Sep 2020 – Dec 2020

Consultant, Project between National University of Colombia and Colombian Institute of Family Welfare (ICBF)

- Provided technical support to ICBF in the development of stage one of the National Survey of Nutrition Status in Colombia (ENSIN) in its fourth version
- Led the thematic component of breastfeeding and complementary feeding of ENSIN
- Supported the detection of needs and the construction of the technical proposal for the design of the fourth version of the ENSIN
- Developed protocol of the component and questionnaires to capture information about feeding practices of infants and young children

Feb 2018 – Jul 2018

Consultant, Agreement between National University of Colombia and Bogota District Planning Secretary (Bogota, Colombia)

- Provided technical advisory and professional services to carry out local technical liaison in the process of evaluation and reformulation of the public policy of food and nutrition security for Bogota 2018-2031” (Bogota, Colombia).
- Facilitated the local liaison with technical referents of the food and nutrition security committees of three localities of Bogota
- Participated and supported activities of local food and nutrition security committees

- Accompanied and supported activities to collect information from local leaders and the community for the evaluation and formulation of the district food and nutrition security food policy

Jul 2017 – Dec 2017 **Consultant, National University of Colombia and Colombian Institute of Family Welfare (ICBF) (Bogota, Colombia)**

- Co-led the technical development of the component of breastfeeding and complementary feeding of the National Survey of Nutrition Status in Colombia (ENSIN 2015), during the analysis phase.
- Provided technical advisory to carry out analysis and worked jointly with the leading statistician of the component
- Contributed to writing and interpreting results, and developing tools to socialize findings
- Led technical discussions related to the component of breastfeeding and complementary feeding and established different inter-sectorial and inter-institutional liaisons to validate the analysis

Jul 2017 – Nov 2017 **Nutritionist and Dietitian, National University of Colombia (Bogota, Colombia)**

- Provided technical support in the formulation and implementation of 21 territorial food and nutrition security plans in the Department of Cundinamarca and their harmonization with primary health care strategies and areas of agri-food and social development
- Provided advice and support to five municipalities to advance in the process of formulation or reformulation of their food and nutrition security plans
- Facilitated the reactivation of the municipal committees of food and nutrition security, generating positioning of the issue
- Supported the development of action plans with each of the municipalities

Sep 2016 – Dec 2016 **Consultant, Agreement between National University of Colombia and Colombian Institute of Family Welfare (ICBF) (Bogota, Colombia)**

- Advised the technical development of the component of breastfeeding and complementary feeding of the National Survey of Nutrition Status in Colombia (ENSIN 2015), during the execution phase of the survey
- Developed and proposed the analysis plan of the component
- Participated in technical meetings to define and select the indicators to measure feeding practices of infants and young children in Colombia
- Supported the process of supervision in the field to ensure the technical quality of the information collected

- May 2015 – Jul 2016 **Nutritionist and Dietitian, National University of Colombia (Bogota, Colombia).** Project: Identification of potential therapeutic targets for human obesity through analysis of the transcriptome of the stomach and rat ileum.
- Recruited healthy and obese volunteers
 - Applied comprehensive anthropometric evaluation, frequency of consumption and assessed nutritional status of healthy and obese men
 - Educated individuals in eating and healthy living habits
 - Participated in development, execution, and analysis of study results, data entry as well as manuscript and poster preparation
 - Collaborated in design of research projects
- May 2013 – Oct 2015 **Nutritionist and Dietitian, National University of Colombia (Bogota, Colombia).** Project: Value of serum biomarkers in predicting maternal and perinatal outcomes of pregnant women and a six-month postpartum follow up
- Provided pregnant women nutritional assessment and follow-up of weight gain parameters during gestation and in the postpartum period
 - Offered food and nutrition education to pregnant and lactating women and provided dietary and nutritional recommendations about breastfeeding and complementary feeding
 - Collaborated with multidisciplinary health care professionals
 - Assisted in the development and investigation of several serum biomarkers for the diagnosis and prediction of maternal and perinatal outcomes
 - Participated in research activities such as database management, literature review, laboratory tests and contribution as co-author in different academic publications and abstracts

TEACHING EXPERIENCE

- Spring 2023 **Guest Lecture, Georgia State University (Atlanta, GA)**
Course: Global Public Health Nutrition Issues
Presentation: Undernutrition and the Double Burden of Malnutrition
- Spring 2022 **Co-Instructor, Emory University (Atlanta, GA)**
Course: GH-503 – Quantitative Data Collection
Responsibilities:
- Overall grading: final review and grading of course assignments
 - Serve as co-instructor during lab sessions
 - Coordination with and supervision of 3 Teaching Assistants (Master students)
 - Hold weekly office hours
 - Taught 1 lecture

Fall 2021

Teaching Associate, Emory University (Atlanta, GA)

Course: GH-523 – Quantitative Data Analysis in Global Health

Responsibilities:

- Taught 3 lectures
- Served as co-instructor during lab sessions
- Managed Canvas platform for the course
- Held office hours
- Acted as contact for student questions
- Reviewed and graded weekly labs
- Provided first set of reviews and comments to problem sets

Fall 2020

Teaching Assistant, Emory University (Atlanta, GA)

Course: EPI-591L – Nutritional Epidemiology

Responsibilities:

- Managed Canvas platform for the course
- Taught the anthropometry module
- Held office hours
- Acted as primary contact for student questions
- Graded take-home exercises

Spring 2020

Teaching Assistant, Emory University (Atlanta, GA)

Course: GH-545 – Nutritional Assessment

Responsibilities:

- Assisted in developing course syllabus
- Managed Canvas platform for the course
- Lead the laboratory sessions and exercises every week
- Helped to coordinate the guest speakers for lectures
- Taught the anthropometry module
- Held weekly office hours and reviewed sessions prior to exams
- Acted as primary contact for student questions
- Wrote questions for quizzes and exams
- Developed grading rubrics and improved take-home exercise keys
- Graded take-home exercises and mid-term exam
- Collaborated in all the preparation of material, activities and lectures during the transition to online sessions after spring break (given the pandemic shutdown)

FELLOWSHIPS, HONORS & AWARDS

Spring 2022 Outstanding Graduate Teaching Associate Award, Laney Graduate School, Emory University

Fall 2021	Atlanta Science Communication Fellowship. Science ATL - Engineers of Atlanta Science Festival
2018 – 2022	Fulbright/Colciencias scholarship. Doctoral training. Fulbright Colombia and Ministry of Science and Technology, Colombia
2015 – 2016	Honor list (Top GPA). Master of Sciences. Universidad Nacional de Colombia
2016	Meritorious Thesis. Master of Sciences. Universidad Nacional de Colombia
2014-2016	Scholarship for graduate studies. Master of Sciences. Universidad Nacional de Colombia
2013	Cum Laude. Bachelor in Nutrition and Dietetics. Universidad Nacional de Colombia
2008 – 2012	Honor list (Top GPA). Bachelor in Nutrition and Dietetics. Universidad Nacional de Colombia

PROFESSIONAL ACTIVITIES & MEMBERSHIPS

Fall 2021	Student Advisory Board Member for the Professional Development and Career Planning Office, Laney Graduate School, Emory University
2019 - 2020	Secretary, Nutrition and Health Sciences Student Organization, Laney Graduate School, Emory University
2018 - 2020	Co-editor, Nutrition and Health Sciences Student Newsletter, Laney Graduate School, Emory University
2019	Recruitment Planning Committee, Nutrition and Health Sciences PhD Program, Laney Graduate School, Emory University

Peer reviewer for *BMC Pregnancy and Childbirth*, *European Journal of Pediatrics*, *Lancet*, *Journal of Nutrition*, *Lancet Regional Health - Southeast Asia*, *Journal of Developmental Origins of Health and Disease*, *Biomedica - Journal of National Institute of Health (Colombia)*

Member of *American Society of Nutrition*, *Population Association of America*

TRAINING & SKILLS

Training

- Fall 2021: Training in Science Communication. Science ATL - Engineers of Atlanta Science Festival
- Spring 2021: National Institutes of Health “Becoming a Resilient Scientist Series” Training Program

Software: R, SAS, Stata, Mplus, Microsoft Office

Languages: Spanish (Native); English (High Proficiency)