



# Sergio Armando Medina González, PhD

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## PROFILE

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PhD in Chemical Process Engineering with a strong background in decision making strategies development for Industrial and Academic sectors. Strong experience in complementary topics of chemical engineering including mathematical programming for optimization of supply chain, production processes, sustainable energy generation, continuous manufacturing for the pharmaceutical industry and development/management of distribution, reuse and recycle of water cycles. H-index 8, over 20 publications.

## POSITION

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Chair of Industrial and Bioengineering Department, July 2022-Present, School of Engineering and Science, Tecnológico de Monterrey, Campus Chihuahua

## EDUCATION

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### PhD & MSc

Universitat Politècnica de Catalunya, February 2019  
Dissertation: "A contribution to support Decision Making in Water/Energy Supply Chain Optimisation"

## RESEARCH EXPERIENCE

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**Senior Research Associate**, Autonomous University of Chihuahua,

Advisor: Prof. Samuel Pérez 2021-2022

- Bioprocess control, Industry 4.0, Real time optimization, Mathematical Modelling, Continuous Tablet manufacturing

**Senior Research Associate**, Purdue University,

Advisor: Prof. Gintaras V. Reklaitis 2019-2020

- Analysis of complex problems by systems theory, Process Control, Real time optimization, Mathematical Modelling, Continuous Tablet manufacturing

**Research Associate**, University College London,

Advisor: Prof. Lazaros Papageorgiou 2018-2019

- Analysis of complex problems by systems theory, Multi-Objective Optimization, Process optimization under uncertainty, Mathematical Modelling, Strategies for the systematic solution identification, Sustainable process development.

## PROFESSIONAL SERVICE

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### Peer-Reviewer,

- Computers and Chemical Engine
- ACS Sustainable Chemistry and Engineering
- Industrial & Engineering Chemistry Research

### Memberships,

- Local committee for the 27<sup>th</sup> European Symposium on Computer Aided Process Engineering, Barcelona, Spain
- Centre for Process Systems Engineering, London, UK
- National System of Researchers, Level 1 (SNI-1)