



**October 28 & 29
1:00PM-5:00PM PST**

UP INSTITUTE OF CIVIL ENGINEERING

Professorial Chair Colloquium 2021





Session A: October 28, 1:00 PM

Moderator: Homer T. Sadie

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| 1:00-1:10 | Opening Remarks:
Maria Antonia N. Tanchuling , UP ICE Director |
| 1:10-1:22 | Mark Albert H. Zarco
<i>Alfredo Juinio Professorial Chair</i>
Topic: Analysis of load-settlements curves in bi-directional static load tests of bored piles. |
| 1:22-1:34 | Jaime Angelo S. Victor
<i>Ciriaco Professorial Chair in Civil Engineering</i>
Topic: Unconfined Compressive Strength Prediction using Dynamic Cone Penetrometer Test |
| 1:34-1:46 | Alexis Philip A. Acacio
<i>Beta Epsilon Professorial Chair</i>
Topic: Ground Improvement of Unsuitable Backfill Material as a Foundation Support of Low-Rise Structures |
| 1:46-1:58 | Lestelle V. Torio-Kaimo
<i>DMCI Project Developers Professorial Chair</i>
Topic: Effect of Different Alkali Activator in the Geopolymerization of Gold-copper Mine Tailings |
| 1:58-2:15 | Question and Answer |



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Session B: October 28, 2:15 PM

Moderator: Homer T. Sadie

2:15-2:27	Rosabelle Louise A. Caram <i>DCCD Engineering Corporation Professorial Chair</i> Topic: Utilization of Plastic Laminates in Asphalt Cement Mastic
2:27-2:39	Oscar Victor M. Antonio, Jr. <i>Dean Alfredo L. Juinio Professorial Chair</i> Topic: Design and Construction of a Concrete Carbonation Chamber with an Automated Parameter Control System
2:39-2:51	Homer T. Sadie <i>Chancellor Ernesto Tabujara Professorial Chair</i> Topic: Proposed localized Wind-driven Rain Test Parameters for Building Envelopes in Metro Manila
2:51-3:03	Diocel Harold M. Aquino <i>Engr. Ronaldo S. Ison Professorial Chair in Structural Engineering</i> Topic: Factors influencing resilience-building through building regulations
3:03-3:20	Question and Answer



UP INSTITUTE OF CIVIL ENGINEERING

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Session C: October 28, 3:20 PM

Moderator: Kristian M. Azul

3:20-3:32

Kristian M. Azul

Salvador F. Reyes Professorial Chair in Geotechnical Engineering

Topic: Response Spectrum Analysis of a Simulated Magnitude 7.2 Earthquake Event for the West Valley Fault System

3:32-3:44

Fernando J. Germar

Felisberto Reyes Professorial Chair in Engineering

Topic: Seismic Risk Evaluation of Medium-Rise Reinforced Concrete Buildings

3:44-3:56

Pher Errol B. Quinay

Beatriz Basa-Altura Professorial Chair in Civil Engineering

Topic: FEATURE: A Seismic Response Analysis Tool for Urban Areas in the Philippines

3:56-4:10

Question and Answer



UP INSTITUTE OF CIVIL ENGINEERING

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Session D: October 28, 4:10 PM

Moderator: Kristian M. Azul

4:10-4:22

Timothy John S. Acosta

AMH Professorial Chair

Topic: Development of an Application for the Vulnerability Assessment of Philippine Buildings Against Severe Winds

4:22-4:34

Jaime Y. Hernandez Jr.

Antonio G. Tan Giok Kun Professorial Chair in Civil Engineering

Topic: Measurement of the Natural Frequency of Vibration of Columns at the ICE Building for Structural Health Monitoring

4:34-4:46

Eric Augustus J. Tingatinga

DMCI Property Developers Professorial Chair

Topic: Analysis and Design of Concrete Hollow Block Walls Subjected to Blast Loading

4:46-5:05

Question and Answer



UP INSTITUTE OF CIVIL ENGINEERING

Professorial Chair Colloquium 2021

Session E: October 29, 1:00 PM

Moderator: Maxell P. Lumbera

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| 1:00-1:10 | Opening Remarks:
Maria Antonia N. Tanchuling , UP ICE Director |
| 1:10-1:22 | Hilario Sean O. Palmiano
<i>David M. Consunji Professorial Chair</i>
Topic: Validation of a Customized Local Traffic Simulator (LocalSim) |
| 1:22-1:34 | Jose Regin F. Regidor
<i>Ambrosio Magsaysay Professorial Chair in Engineering</i>
Topic: Pedestrian Safety Assessment Within Public Elementary School Zones in Quezon City Using Star Rating for Schools |
| 1:34-1:46 | Ricardo G. Sigua
<i>Dr. Olegario G. Villoria Jr. Professorial Chair on Transportation/Logistics</i>
Topic: Study of Motorcycle Rider Casualties at Signalized and Unsignalized Intersections |
| 1:46-1:58 | Karl B. N. Vergel
<i>Quintin and Norma Calderon Professorial Chair</i>
Topic: Estimation of Transportation Energy Demand of the Philippines |
| 1:58-2:15 | Question and Answer |



UP INSTITUTE OF CIVIL ENGINEERING

Professorial Chair Colloquium 2021

Session F: October 29, 2:15 PM

Moderator: Maxell P. Lumbera

2:15-2:27

Ma. Brida Lea D. Diola

Levy V. Espiritu Professorial Chair in Civil Engineering

Topic: Waste Management Information System in the Philippines thru Mobile and Web-based Applications

2:27-2:39

Maria Antonia N. Tanchuling

Maynilad Professorial Chair

Topic: Characterization of Microplastics in Taguig River and Its Contribution to Pollution Loading to Laguna Lake

2:39-2:51

Maxell P. Lumbera

Jorge M. Consunji Professorial Chair in Engineering

Topic: Issues, Challenges and Strategies for the Implementation of Roof-based Rainwater Harvesting Systems

2:51-3:03

Noriza T. Sadie

Ciriaco Professorial Chair in Civil Engineering

Topic: Development of a Climate Change Vulnerability and Impact Assessment Framework for Common Construction Projects In Metro Manila - A Case Study on Three Different Types of Construction Projects



UP INSTITUTE OF CIVIL ENGINEERING

Professorial Chair Colloquium 2021

Session F: October 29, 2:15 PM

Moderator: Maxell P. Lumbera

3:03-3:15

Augustus C. Resurreccion

Holcim Professorial Chair

Topic: Determining the Optimum Operational Parameters of a 100-L Electrochemical Arsenic Remediation (ECAR) Reactor

3:15-3:35

Question and Answer



UP INSTITUTE OF CIVIL ENGINEERING

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Session G: October 29, 3:35 PM

Moderator: Marjorie T. David

3:35-3:47

Eugene C. Herrera

Maynilad UP Centennial Professorial Chair

Topic: Temporal dynamics and drivers of lake ecosystem metabolism using high resolution observations in a shallow, tropical, eutrophic lake (Laguna Lake, Philippines)

3:47-3:59

Guillermo Q. Tabios III

Angel Alejandrino Professorial Chair

Topic: Sediment Yield Studies of Pulangi River Basin, Bukidnon

3:59-4:11

Roberto Soriano

Dr. Leonardo Q. Liongson Professorial Chair

Topic: Field Observations to Define the Boundary Conditions and Salinity Structure in a Coastal Sand Dune Aquifer

4:11-4:23

Imee Bren O. Villalba

Federico E. Puno Professorial Chair

Topic: Modelling the Effects of Varying Typhoon Tracks on Storm Surges in Manila Bay using ADCIRC



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Session G: October 29, 3:35 PM

Moderator: Marjorie T. David

4:23-4:35

Marjorie T. David

DMCI Project Developers Professorial Chair 2

Topic: Comparative Analysis of Parametric Cyclone Models and Relations for Radius of Maximum Winds for Storm Surge Simulations: Case of Typhoon Meranti 2016

4:35-4:47

Richmark N. Macuha

Federico E. Puno Professorial Chair B

Topic: Demonstration of Useful Tools in Baseline Information Building for Water Resources Projects Under the New Normal

4:47-5:05

Question and Answer

5:05-5:15

Closing Remarks:

Valentin A. Reyes, UP ERDFI President