

# 13th International Conference on Multiple Objective Programming and Goal Programming

28-31 Oct 2019

Marrakech, Morocco

## MOPGP'2019

## Program



## **MOPGP'2019** is organized by

- University of Lille, France & INRIA Lille Nord Europe, France
- GDR RO, GDR MACS, France
- EMI, Morocco
- ZTours, Morocco

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- Tapabrata Ray (University of New South Wales, Australia)
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- Mehdi Toloo (Technical University of Ostrava, Czech Republic)
- Alexis Tsoukias (Université Paris-Dauphine, France)
- Daniel Vanderpooten (Université Paris-Dauphine, France)
- Farouk Yalaoui (UTT, France)
- Margaret Wiecek (Clemson University, USA)
- Jian Wu (Shanghai Maritime University, China)
- Zeshui Xu (Sichuan University, China)
- Constantin Zopounidis (Technical University of Crete, Greece)

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# Program at glance

## October 28 Welcome and registration

10h – 12h Registration at Palm Plaza Hotel lobby

14h – 17h Registration at Palm Plaza Hotel lobby

## October 29

8h30	Opening Session	
	Room <b>Les Orangers 1</b>	Room <b>Les Orangers 2</b>
9h00	Multi-objective continuous optimization	Multi-objective optimization under uncertainty
10h20	Coffee Break	
10h50	Multi-objective optimization	Multi-criteria decision analysis
12h10		

	Room <b>Les Orangers 1</b>	Room <b>Les Orangers 2</b>
14h00	Multi-objective continuous optimization	Robust Decision making & Uncertainty
15h20	Coffee Break	
15h50	Multi-objective optimization	Finance & economy
17h10		

## October 30

	Room <b>Les Orangers 1</b>	Room <b>Les Orangers 2</b>
9h00	Decision making & Goal programming	Transportation problems
10h40	Coffee Break	
11h10	Multi-objective modeling	Multi-objective combinatorial optimization
12h50		

19h30	Gala Dinner (Meeting at Hotel Palm Plaza Lobby)	

## October 31

Poster session

## Detailed program

**Monday, October 28**

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**10h - 12h – Registration**

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**14h - 17h – Registration**

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# Tuesday, October 29

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**8h30 – 9h00 – Room Les Orangers 1: Opening Session – Prof. E-G. Talbi**

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**9h00-10h20**

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## Room Les Orangers 1 – Multi-objective continuous optimization (chair: Dr. A. Nakib)

- Amir Nakib, Leo Souquet and Talbi El-Ghazali. Multi-node environment strategy for Parallel Deterministic Multi-Objective Fractal Decomposition
- Pankaj Kumar and Ajay Bhurjee. Multi-objective interval optimization problem with interval solution
- Ali Hebbal, Mathieu Balesdent, Loic Brevault, Talbi El-Ghazali and Nouredine Melab. Multi-Objective Bayesian Optimization using Deep Gaussian Processes
- Wei Yu, Clym Stock-Williams and Wouter Engels. Multi-objective Bayesian Optimisation of Wind Turbine Controller Parameters

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## Room Les Orangers 2 – Multi-objective optimization under uncertainty (chair: Prof. M. Wiecek)

- Margaret Wiecek. On Highly Robust Efficient Solutions to Uncertain Multiobjective Linear Programs
- Oumayma Bahri and El-Ghazali Talbi. Multi-objective Optimization of Electric Vehicles Facing Uncertainty
- Samatthachai Yamsa-Ard and Fouad Ben Abdelaziz. Multi Objective Optimization For International Perishable Food Supply Chain Under Stochastic Demand And Fuzzy Deterioration Rate
- Vardanyan and Madsen. Stochastic Bilevel Program for Optimal Bidding of an EV Aggregator

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**10h20 – 10h50 – Coffee break**

**10h50 - 12h10**

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## Room Les Orangers 1 – Multi-objective optimization (chair: Prof. R. Steuer)

- Ralph E. Steuer and Craig A. Piercy. Using a Sphere to Compute Equally-Sized Cones in Multiple Objective Linear Programming for Distributed Processing
- Marina A. Matos, Ana Maria A. C. Rocha, Lino Costa and Ana I. Pereira. An augmented epsilon-constraint method for build orientation optimization
- Savin Treanta. On local and global optimal solutions in variational control problems involving path-independent curvilinear integral functionals
- Najeeb Abdulaleem. V-E-invexity in E-differentiable multiobjective programming



## Room Les Orangers 2 – Multi-criteria decision analysis (chair: Prof. Seda Secu)

- Seda Sucu, Djamila Ouelhadj, Saada Al Hashmi, Taybalasmaa Abusalih and Maria van Schaik. Resource Recovery from Used Water: Selection of Technologies through Multi-Criteria Decision Analysis
- José Luis García-Lapresta and Ricardo Alberto Marques Pereira. A multiexpert choice procedure based on a notion of mean over qualitative scales
- Carlos Lozano-Garzon and Yezid Donoso. A multi-objective decision-making model for base stations cooperation in high-density urban areas
- Marta Ezquerro, Marta Pardos, Luis Diaz-Balteiro and Carlos Romero. A LEXICOGRAPHIC GOAL PROGRAMMING MODEL TO ADDRESS MULTIFUNCTIONAL SUSTAINABILITY ISSUES IN FOREST MANAGEMENT

## Tuesday, October 29

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**14h00-15h20**

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### Room Les Orangers 1 – Multi-objective continuous optimization (chair: Prof. R. Ellaia)

- Nassime Aslimani, Rachid Ellaia, El-ghazali Talbi, A new deterministic and efficient algorithm for bi-objective continuous optimization
- Gisela Ramadas, Edite Fernandes, Ana Rocha and Maria Fernanda Costa. Exploring a multi-objective approach for optimal control problems via a direct multiple shooting method
- Djamel Chaabane, Said Ouznadj and Messaoud Thameri. Hybridization of Spectral Subtraction and Firefly Optimization Algorithm for Speech Signal Enhancement
- Mohamed Tifroute, Anouar Lahmdani and Hassane Bouzahir. Solving Nonsmooth Bi-Objective Environmental and Economic Dispatch Problem using Smoothing Techniques

### Room Les Orangers 2 – Robust Decision making and Uncertainty (chair: Dr. T. Lust)

- Nawal Benabbou, Thibaut Lust and Cassandre Leroy. An Incremental Genetic Approach for Multi-Objective Combinatorial Optimization with Imprecise Preferences
- Marek Kvet and Jaroslav Janacek. Robust Emergency System Design as Multi-Objective Programming Problem
- Jaroslav Janacek and Marek Kvet. Pareto-Front for Robust Public Service System Design with Low Probable Detrimental Scenarios
- Li-Ching Ma. A Graphical Approach for Developing Screening and Navigation Strategies

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**15h20 – 15h50 – Coffee break**

**15h50 - 17h10**

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### Room Les Orangers 1 – Multi-objective optimization (chair: Prof. F. Ben Abdelaziz)

- Georges Fadel. Multicriteria product design using crowdsourcing
- Oumayma Ouedrhiri. Artificial viscosity using neural networks for oscillations control in finite volume scheme
- Aida Ilham Azzi and Méziane Aïder. A Multi-Objective lagrangian relaxation with NSGA II for a bi-objective p-median problem
- Marwa Khalfalli, Fouad Ben Abdelaziz and Jerome Verny. Pareto set approach for dealing the operative programming within the hospital

## Room Les Orangers 2 – Finance and economy (chair: Dr. D. Liuzzi)

- Janusz Miroforidis. Soft Computing for Large-Scale Cardinality-Constrained Markowitz Mean-Variance Portfolio Investment Problems
- Konstantinos Petridis. Measuring external auditors' performance using TOPSIS: An application to Independent Authority for Public Revenue
- Alejandro Balbás. Golden strategies in derivative markets
- Danilo Liuzzi and Beatrice Venturi. Pollution and Population Control in a Spatio-Temporal Economic Growth Model

**9h00-10h40**

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**Room Les Orangers 1 – Decision making and goal programming (chair: Prof. M. Brauers)**

- Bojan Srđević and Zorica Srđević. SENSITIVITY OF THE AHP GROUP SOLUTION TO HIERARCHY-WISE CONSISTENCY
  - Samira El Gibari, Francisco Ruiz, José M. Cabello and Trinidad Gómez. Constructing the EU-Regional Social Progress Index using the Multiple Reference Point Weak and Strong Composite Indicator (MRP-WSCI)
  - Tadeusz Trzaskalik. Dynamic Bipolar comparisons as an example of reference point methodology
  - Willem K. M. Brauers. Goal Programming for Lithuania and its Counties on Basis of SWOT Analysis and the MOORA Method
- 

**Room Les Orangers 2- Transportation problems (chair: Prof. F. Ruiz)**

- Yiyi Xu, Sahnoun M'Hammed, Fouad Ben Abdelaziz and Anne Louis. Multi-Modal Transportation Simulation Model of Bio-Waste Collection Management System
  - Filipe Alves, Lino Costa, Ana Rocha, Ana Pereira and Paulo Leitão. A Decision Support System to Home Care Visits based on Multi-Objective Programming
  - Laura Delgado Antequera, Francisco Ruiz, Rafael Caballero and Germán Gemar. A real waste collection problem. An interactive methodology to solve it from a multiobjective perspective
  - Dobroslav Grygar and Michal Koháni. Covering of the Battery Assisted Trolleybus Fleet Schedules by Minimal Overhead Wires Network
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**10h40-11h10 Coffee Break**

**11h10-12h30**

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## Room Les Orangers 1 – Multi-objective modeling (chair: Prof. Ahmed Ghanmi)

- Juan Diego Arango, Nicolas Caceres and Carlos Lozano-Garzon. A multi-objective crop planning mathematical model
- Ahmed Ghanmi, Bao Nguyen and Robert Cameron. A Multi-Objective Social Network Model for Information Operations Effects Analysis
- Davide La Torre and Herb Kunze. Solving Parameter Identification Problems using a Multiobjective Model with Collage Distance, Entropy, and Sparsity
- Davide La Torre, Herb Kunze and Simone Marsiglio. A Spatial Economic Growth Model with Physical Capital Accumulation and Pollution Diffusion

## Room Les Orangers 2 – Multi-objective combinatorial optimization (chair: Dr. N. Dupin)

- Hamidi Imane and Chaabane Djamel. A new Algorithm For solving Bi-Objective Set Covering Problem
- Nicolas Dupin. The p-dispersion problem is efficiently solvable in polynomial time in a 2d Pareto Front
- German Montoya and Yezid Donoso. A Multi-Objective Mathematical Optimization Model and a Prediction Algorithm based on Markov Chains in Mobile Wireless Sensor Networks
- Olfa Meddeb and Amani Rouihem. Students orientation in university as a multiple objective problem: The case of the Tunisian faculty of economics and management sciences of Nabeul
- Aymen Sioud and Caroline Gagné. A new multiobjective migrating birds optimization algorithm for a permutation flowshop scheduling problem

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**19h30 BANQUET Meeting @Hotel Palm Piazza Lobby**

You are concerned if you have an invitation in your envelope. Bring the **YELLOW** invitation with you.

Extra tickets are available 60€.

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**Thursday, October 31**

**Poster session**

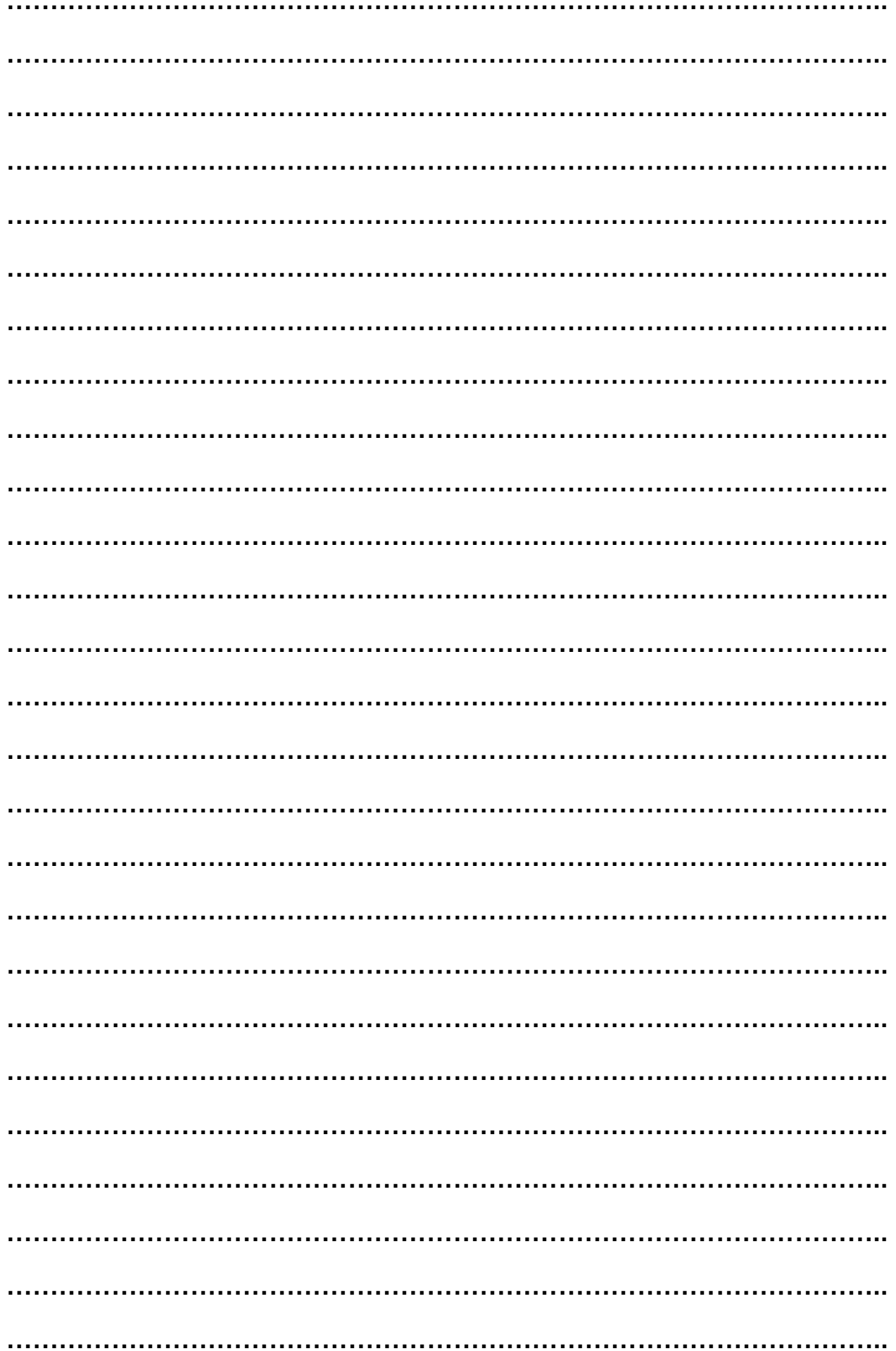


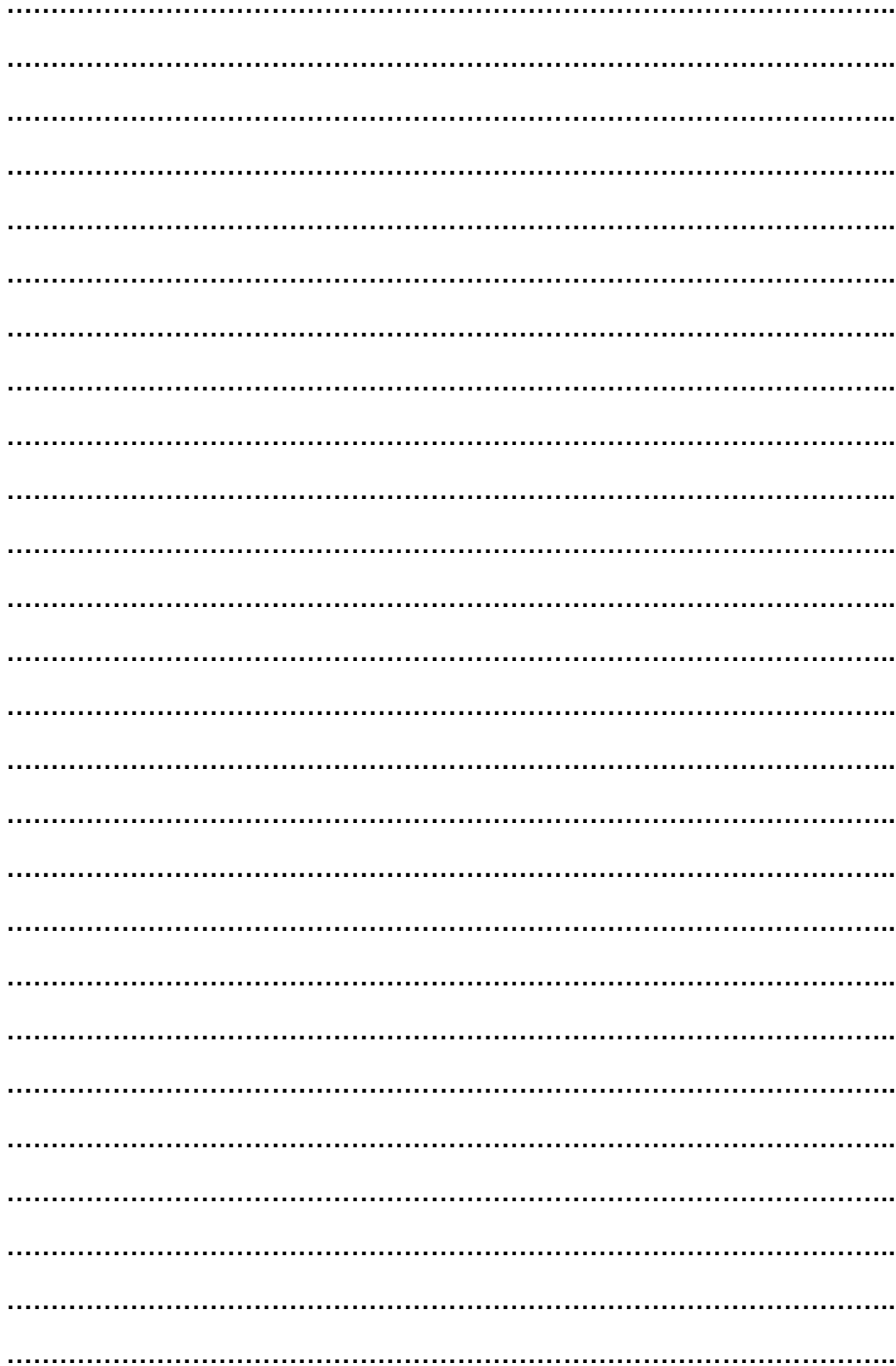
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Conference Place



Organizers

