

IMA Journal of Management Mathematics

CALL FOR PAPERS

Special issue on “Control techniques and yield management in the airport industry”

Special issue editor

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Description of the topic

Airports bring significant social benefit and in many cases are believed to be the single largest generator of economic activity in the regions they serve, as emphasised by Airport Council International (ACI). EUROCONTROL (2008) officially released its latest study “Challenges of Growth”, which concludes that despite the current crisis and based on conservative growth projections, air traffic is still expected to double in the next 20 years. However, the COM/EU report (2006) underlines that increasing capacity poses a threat to the safety, efficiency and competitiveness of all sectors involved in the air transport supply chain. Also, the significant contribution of aviation to climate change is recognised and the increasing public sensitivity to environmental protection constitutes a major threat to aviation business. Airport strategy has to be based on new market trends and restrictions which affect the whole civil aviation system; and management applications are required to be performance oriented in order to respond to demand pattern, technological innovation, operational complexity, and business uncertainties. With this in mind, and given the complexity of airport operations, papers are invited for a special issue on “*Control techniques and yield management in the airport industry*” of the IMA Journal of Management Mathematics. Theoretical and/or empirical contributions that consider the interface between business trends, management techniques and mathematics, and that make a significant contribution at this interface will be considered for publication. Potential topics include, but are not limited to:

- Operational Research applications
- Demand forecasting
- Capacity control methods and applications
- Dynamic programming modelling
- Decision making and Data Envelopment Analysis (DEA)
- Pricing models and financial risk analysis
- Airport performance measurement and evaluation techniques
- Surface access control and ground transport modelling
- Environmental factors, including emissions pricing calculators
- Simulation of airport activity
- Case studies and best practices

Deadlines and submission instructions

Expressions of interest can be e-mailed to the Special Issue Editor. Manuscripts must be prepared in accordance with the “Instructions to Authors” presented in the Journal’s web site (<http://imaman.oxfordjournals.org/>). Manuscripts must be submitted via the journal’s online submission system at Manuscript Central: <http://mc.manuscriptcentral.com/imaman> and marked “Airport Industry Special Issue”. All papers will be refereed according to the standards of the IMA Journal of Management Mathematics.

Publication schedule

Manuscript submission by: December 14, 2009

Reviewers’ reports: April 30, 2010

Revised paper submission: August 30, 2010

Final manuscript submission to publisher:

November 15, 2010

Publication: early 2011

Special issue editor

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