

## Accepted Manuscript

A Sequential Stochastic Mixed Integer Programming Model For  
Tactical Master Surgery Scheduling

Ashwani Kumar, Alysson M. Costa, Mark Fackrell, Peter G. Taylor

PII: S0377-2217(18)30310-2  
DOI: [10.1016/j.ejor.2018.04.007](https://doi.org/10.1016/j.ejor.2018.04.007)  
Reference: EOR 15069



To appear in: *European Journal of Operational Research*

Received date: 16 October 2017  
Revised date: 6 April 2018  
Accepted date: 7 April 2018

Please cite this article as: Ashwani Kumar, Alysson M. Costa, Mark Fackrell, Peter G. Taylor, A Sequential Stochastic Mixed Integer Programming Model For Tactical Master Surgery Scheduling, *European Journal of Operational Research* (2018), doi: [10.1016/j.ejor.2018.04.007](https://doi.org/10.1016/j.ejor.2018.04.007)

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.

**Highlights**

- We develop a mixed integer programming model for master surgery scheduling.
- Our model has novelty that it uses scenarios in a chronologically sequential manner.
- The master surgery schedule responds for the first stage decisions.
- The cancellation decisions are modelled as recourse actions.
- We optimise scheduling decisions over many lengths of stay scenario realisations.
- We sample patients lengths of stay and position patients in a queue, randomly.
- To enhance non-anticipative feature, patients are scheduled in their queuing order.

Download English Version:

<https://daneshyari.com/en/article/6894602>

Download Persian Version:

<https://daneshyari.com/article/6894602>

[Daneshyari.com](https://daneshyari.com)