## **Accepted Manuscript**

Modeling phase diagrams as stochastic processes with application in vehicular traffic flow

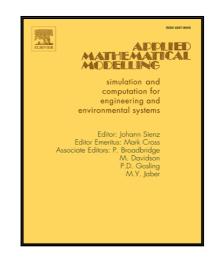
Daiheng Ni, Hui K Hsieh, Tao Jiang

PII: \$0307-904X(17)30547-4 DOI: 10.1016/j.apm.2017.08.029

Reference: APM 11941

To appear in: Applied Mathematical Modelling

Received date: 28 October 2016
Revised date: 1 August 2017
Accepted date: 22 August 2017



Please cite this article as: Daiheng Ni, Hui K Hsieh, Tao Jiang, Modeling phase diagrams as stochastic processes with application in vehicular traffic flow, *Applied Mathematical Modelling* (2017), doi: 10.1016/j.apm.2017.08.029

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.

### 1

### **Highlights**

- Proposed a methodology to model phase diagrams as stochastic processes.
- Formulated a generic procedure to determine homogeneous distributions with parameters derived from empirical data.
- Applied the methodology to address fundamental diagram of vehicular traffic flow.
- Conducted a verification on the resultant stochastic fundamental diagram using empirical data.
- Discussed the significance of the research and its applications beyond vehicular traffic flow.

### Download English Version:

# https://daneshyari.com/en/article/8052104

Download Persian Version:

https://daneshyari.com/article/8052104

<u>Daneshyari.com</u>