## **Accepted Manuscript**

Numerical study of flow over periodically deforming circular cylinder

H.C. Zheng, B. Shi, Q. Yu, E.J. Zhao

PII: \$0045-7930(16)30171-2

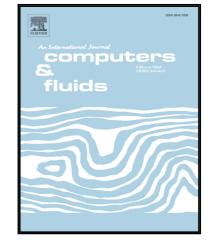
DOI: 10.1016/j.compfluid.2016.05.024

Reference: CAF 3195

To appear in: Computers and Fluids

Received date: 8 April 2015

Revised date: 16 December 2015 Accepted date: 23 May 2016



Please cite this article as: H.C. Zheng, B. Shi, Q. Yu, E.J. Zhao, Numerical study of flow over periodically deforming circular cylinder, *Computers and Fluids* (2016), doi: 10.1016/j.compfluid.2016.05.024

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.

#### ACCEPTED MANUSCRIPT

### Highlights

- Appropriate deformation can reduce drag force.
- Small deforming frequency has little effect on drag force. Yet the effect of big deforming frequency can't be neglected.
- Except three basic vortex patterns, two transfer modes are observed.



This study was financially supported by National Nature Science Fund of China (Grant No. 51279189; 50879084)

<sup>&</sup>lt;sup>a</sup> Corresponding author: H.C. Zheng, E-mail address: <u>6220941@qq.com</u> (or zhenghaicheng@ouc.edu.cn)

<sup>&</sup>lt;sup>b</sup> B. Shi, E-mail address: sediment@ouc.edu.cn

### Download English Version:

# https://daneshyari.com/en/article/7156676

Download Persian Version:

https://daneshyari.com/article/7156676

<u>Daneshyari.com</u>