Accepted Manuscript

Unveiling the basins of convergence in the pseudo-Newtonian planar circular restricted four-body problem

Md Sanam Suraj, Euaggelos E. Zotos, Rajiv Aggarwal, Amit Mittal

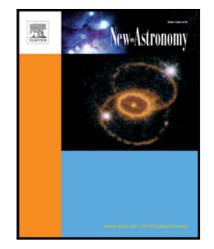
 PII:
 S1384-1076(18)30166-0

 DOI:
 10.1016/j.newast.2018.07.009

 Reference:
 NEASPA 1215

To appear in: New Astronomy

Received date:4 June 2018Revised date:14 July 2018Accepted date:28 July 2018



Please cite this article as: Md Sanam Suraj, Euaggelos E. Zotos, Rajiv Aggarwal, Amit Mittal, Unveiling the basins of convergence in the pseudo-Newtonian planar circular restricted four-body problem, *New Astronomy* (2018), doi: 10.1016/j.newast.2018.07.009

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

- The restricted four-body problem with pseudo-Newtonian potential is investigated.
- The position and stability of the libration points are discussed.
- The number of libration points depend on transition.
- The evolution of the region of possible are discussed.
- The Newton-Raphson iterative scheme is used to unveil the basins of convergence.

Download English Version:

https://daneshyari.com/en/article/8141197

Download Persian Version:

https://daneshyari.com/article/8141197

Daneshyari.com