

JME5 The International Journal of

Mechanical Engineering and Sciences

https://iptek.its.ac.id/index.php/jmes

e-ISSN 2580-7471

Editor-in-Chief:

Dr. Vivien S. Djanali, Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember, Indonesia

Editor:

Prof. Volodymyr Yartys, Institute for Energy Technology, Norway

Prof. Steven W. Armfield, School of Aerospace, Mechanical and Mechatronic Engineering, University of Sydney, Australia

Prof. Tri Yogi Yuwono, Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember, Indonesia

Dr. Suwarno, Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember, Indonesia

Dr. Bambang Pramujati, Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember, Indonesia

Dr. Bambang Sudarmanta, Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember, Indonesia

Focus and Scope:

Topics covered by JMES include most topics related to mechanical sciences include energy conversion (wind, turbine, and power plant), mechanical structure and design (solid mechanics, machine design), manufacturing (welding, industrial robotics, metal forming), advanced materials (composites, nanotube, metal foam, ceramics, polymer), metallurgy (corrosion, non-destructive testing, heat treatment, metal casting), heat transfer, fluid mechanics, thermodynamics, mechatronics and controls, advanced energy storage and devices (fuel cell, electric vehicle, battery), numerical modelling (FEM, BEM).

Author Guidelines:

Please kindly visit the JMES website: https://iptek.its.ac.id/index.php/jmes/about/submissions#authorGuidelines

Open Access Policy:

This journal provides immediate open access to its content on the principle that making research freely available to the public supports a greater global exchange of knowledge. The articles are distributed under the terms and conditions of the Creative Commons Attribution License https://creativecommons.org/licenses/by-sa/4.0/.

Publisher Information and Contact:

JMES The International Journal of Mechanical Engineering and Sciences is published by Lembaga Penelitian dan Pengabdian kepada Masyarakat (LPPM) ITS and managed by the Department of Mechanical Engineering.

Mailing Address

JMES Editorial Office Departemen Teknik Mesin, Institut Teknologi Sepuluh Nopember Kampus ITS Sukolilo Surabaya 60111

Building C, Floor 2

Fax/phone: +62-31-5922941

Principal Contact

Vivien S. Djanali

Department of Mechanical Engineering, Institut Teknologi Sepuluh Nopember

Phone: +62315922941 Email: jmes@its.ac.id

Support Contact

Ika Dewi Wijayanti Phone: +62315946230 Email: dewi@me.its.ac.id



JME5 The International Journal of

Mechanical Engineering and Sciences

https://iptek.its.ac.id/index.php/jmes

Volume 6 | Issue 1 | March 2022

e-ISSN 2580-747

Table of Contents

Flexibility Analysis Unexpanded Balloon-Expandable Stent with Finite Element Method I. A. Aribowo, V. J. N. Susanto	1-8
Optimization Design Analysis of Boiler Blowdown Utilization on a Rotary Coal Dryer with Drum Tilt Angle Variations A. M. Tarmizi, B. A. Dwiyantoro, A. G. Marbun	9-20
Numerical Study of Deflection and Stress Distribution on Composite Box Spar Structure – Application in Wind Turbine Blade P. S. Ufaira, P. Suwarta, G. Bangga	21-30
Numerical Study of Blended Winglet Geometry Variations on Unmanned Aerial Vehicle Aerodynamic Performance F. D. Pertiwi, A. Wahjudi	31-36
Study of Coal Drying Characteristics Using Boiler Blowdown in a Rotary Coal Dryer	37-46