

INDONESIAN MINING JOURNAL

Volume 25 Number 1, April 2022

pISSN 0854-9931

eISSN 2527-8797

Accreditation No.: 200/M/KPT/2020

-
- ❖ Geotechnical Study for Analyzing Slope Stability Between Two Mining Pit Boundary
Studi Geoteknik untuk Menganalisis Stabilitas Lereng Antara Dua Batas Pit Penambangan
Zulfahmi 1 - 11

 - ❖ Overview on an Open Pit Mine Planning of the Pickstone Peerless in a Volatile Environment
Tinjauan Perhitungan Penjadwalan Perencanaan Tambang Terbuka Pickstone Peerless pada Lingkungan dengan Volatilitas Tinggi
Tapiwa F. K. Ngoroyemoto, Charles Chewu, Desire Runganga, Tatenda Nyamagudza and Ashley R. Sabao 13 - 27

 - ❖ Impact of Illegal Gold Mining in Jambi, Indonesia
Dampak Penambangan Emas Ilegal di Jambi, Indonesia
Yudha G. Wibowo, Bimastyaji S. Ramadan, Anis T. Maryani, Desy Rosarina and La Ode Arkham 29 - 40

 - ❖ Effect of Vacuum Residue and Petroleum Benzine as the Additive Calorific Value and Moisture of Coal
Pengaruh Vacuum Residue dan Petroleum Benzine sebagai Zat Aditif pada Kadar Air dan Nilai Kalor Batubara
Ezra B. R. Putri, Wahyudi Zahar and Lenny Marlinda 41 - 47

 - ❖ Bio-organo Mineral Effect on Soil Fertility, Nutrient Uptake, and Sweet Corn (*Zea mays L. saccharata*) Growth Planted in Inceptisols Soils
Pengaruh Pupuk Bio-organomineral terhadap Kesuburan Tanah, Serapan Hara, dan Pertumbuhan Tanaman Jagung Manis (Zea mays L. saccharata) pada Tanah Inceptisols
Restu Wulansari, Maryono, Didit A. Darmawan, Faris N. F. Athallah dan Fardian K. Hakim 49 - 58

INDONESIAN MINING JOURNAL

Jalan Jenderal Sudirman 623 Bandung 40211, Indonesia
Ph. (022) 6030483 Ext. 285, Fax. (022) 6003373

Indonesian Mining Journal (IMJ) is periodically published in April and October. The journal contains paper, which relates to research and development projects in mineral and coal, i.e. exploration, exploitation, processing, utilization, environment, economics and policy. The editors only accept papers that are relevant to the substance of this publication.

ADVISOR

Head of R&D Centre for Mineral and Coal Technology
Head of Affiliation and Information Division

Editor-in-Chief

Tatang Wahyudi, Ir. M.Sc. (National Research and Innovation Agency)

MANAGING EDITOR

1. Deni Nurul Kamal, A.Md. (Center for Mineral and Coal Testing)
2. Sumaryadi, A.Md. (Center for Mineral and Coal Testing)

EDITORIAL BOARDS

1. Prof. Dr. Datin Fatia Umar, Ir., MT. (National Research and Innovation Agency - Chemical Engineering/Coal Processing and Utilization)
2. Retno Damayanti, Dra., Dipl. EST. (National Research and Innovation Agency - Chemistry/Mine Environment)
3. Sri Handayani, Dra., M.Sc. (National Research and Innovation Agency - Mineral Biotechnology)
4. Dr. Miftahul Huda, Ir., M.Sc. (National Research and Innovation Agency - Applied Chemical Technique/Coal Beneficiation Technology)
5. Dr. Agus Wahyudi (Center for Mineral and Coal Testing - Mineral Processing)
6. Isyatun Rodliyah, S.T., M.Si. (Center for Mineral and Coal Testing - Mineral Processing)
7. M. Ade A. Efendi, S.T., M.Eng. (Center for Mineral and Coal Testing - Coal Beneficiation Technology)
8. Phiciato, Dipl. Ing. (National Research and Innovation Agency - Coal Beneficiation Technology)
9. Prof. Hiroshi Suzuki (Kobe University - Mechanical Engineering)
10. Dr. Jacob Yan Mulyana (Tokyo Metropolitan University - Applied Chemistry)
11. Dr. Winarto Kurniawan (Tokyo Institute of Technology - Chemical Engineering)
12. Prof. Dr. Ir. Suroso (Centre for Geological Survey - Mine Geology)
13. Dr. Asri Peni Wulandari, M.Sc. (Padjadjaran University - Biotechnology)
14. Sunbaek Bang, Ph.D. (Mine Reclamation Corporation (MIRECO) - Environmental Engineering)
15. Nurhadi, S.T., M.T. (Center for Mineral and Coal Testing - Coal Processing Technology)

SCIENTIFIC REVIEWERS

1. Retno Damayanti, Dra., Dipl. EST.
2. Prof. Dr. Datin Fatia Umar, Ir., MT.

PEER REVIEWERS

1. Prof. Dr. Syoni Supriyanto, M.Sc. (Institute of Technology Bandung - Mining Engineering)
2. Dr. Singgih Saptono, M.Sc. (University of National Development "Veteran" Yogyakarta - Mining Engineering)

3. Dr. Said Muzambiq, M.Sc. (Medan Institute of Technology - Mining Environment)
4. Dr. Phil. Nat. Sri Widodo, M.T. (Hasnuddin University - Mining Design)
5. Dr. Nuzul Achyar (University of Indonesia - Economics)
6. Dr. Ir. Edi Sanwani (Institute of Technology Bandung - Mineral-Coal Processing)
7. Prof. Dr. Pramusanto, Ir. (Bandung Islamic University - Extractive Metallurgy)
8. Prof. Dr. Ir. Udi Hartono (Centre for Geological Survey - Petrology and Mineralogy)
9. Dr. Hermes Panggabean, M.Sc. (Centre for Geological Survey - Fossil Energy)
10. Dida Kusnida, Ir., M.Sc. (Marine Geology Research and Development Center - Marine Geophysics)
11. Lukman Arifin, Drs., M.Si. (Marine Geology Research and Development Center - Marine Geology)
12. Sri Widayati, Ir., M.T. (Bandung Islamic University - Mineral Economics)
13. Dr. D. Hendra Amijaya (Gadjah Mada University - Hydrocarbon Geochemistry and Coal Geology)
14. Dr. Sri Mulyaningsih, S.T., M.T. (Institute of Science and Technology AKPRIND Yogyakarta - Engineering Geology)
15. Dr. Muchlis, M.Sc. (Institute of Science and Technology AKPRIND Yogyakarta - Geological Environment)
16. Dr. Tri Nuke Pudjiastuti, M.A. (Indonesian Science Institute (LIPI) - Mining Environment/Mining Law)
17. Achmad Subardja Djakamihardja, Ir., M.Sc. (Indonesian Science Institute (LIPI) - Rock Geomechanics)
18. Prof. Dr. Ir. Adjat Sudradjat, M.Sc. (Padjadjaran University - Mining Policy)
19. Dr. Ir. Ismi Handayani, MT. (Institute of Technology Bandung - Mineral Processing)
20. Dr. Nana Suwarna (IJOG - Coal Geology)
21. M. Ikhlasul Amal, Ph.D., M.Si., S.Si. (Indonesian Science Institute (LIPI) - Material Engineering)
22. Prof. Dr. Ir. Robert M. Delinom, M.Sc. (Indonesian Science Institute (LIPI) - Geotechnology)
23. Dr. Ir. Komang Anggayana, M.S. (Institute of Technology Bandung - Earth's Resources Exploration)
24. Muhammad Aziz, Dr. Eng. (Tokyo Institute of Technology - Energy System, Power Generation)
25. Dr. Ir. Reginawanti Hindersah, M.P. (Padjadjaran University - Biotechnology)
26. Andrieanto Nurrochman, M.Sc. (Bandung Islamic University - Material Science and Engineering)
27. Prof. Dr. Binarko Santoso, Ir. (Polytechnic of Geology and Mining - Geology)
28. Dr. Ir. Dudi Nasrudin Usman, S.T., M.T. (Bandung Islamic University - Mining Engineering)
29. Ir. Linda Pulungan, M.T. (Bandung Islamic University - Mineral and Coal Processing)
30. Dr. Edy Nursanto, S.T., M.T. (University of National Development "Veteran" Yogyakarta - Coal Processing)
31. Dr. Imas Soemaryani, S.E., M.Si. (Padjadjaran University - Economics)

32. Prof. Dr. Siti Rochani, M.Sc. (National Research and Innovation Agency - Chemistry/Material Science)
33. Zulfahmi, Ir., M.T. (National Research and Innovation Agency - Underground Mine)
34. Eko Pujiyanto, Ir., M.E. (Indonesian Geologists Association - Geotechnology)
35. Nendaryono Madiutomo, Ir., M.T. (National Research and Innovation Agency - Mining Technology)
36. Bambang Yunianto, Drs. (National Research and Innovation Agency - Mining Policy)
37. Ghandi K. Hudaya, S.T., M.A.B. (Center for Mineral and Coal Testing - Techno-economy)
38. Dr. Asep B. Purnama, S.T., M.T. (Center for Mineral and Coal Testing - Geology/Earth's Resources Exploration)
39. Dahlia Diniyati, S.T., M.Eng. (Center for Mineral and Coal Testing - Chemical Engineering/Coal Processing and Beneficiation)
40. Dessy Amalia, S.T., M.T. (National Research and Innovation Agency - Mineral Processing)
41. Hernandi Albeto Octaviano, S.T., M.E.M. (Directorate General of Mineral and Coal - Environmental Management)
42. Prof. Dr. Ir. Betty Natalie Fitriatin (Padjadjaran University - Soil Biology and Biotechnology)

The Indonesian Mining Journal would like to thanks the peer reviewers for the reviewing the manuscripts to published in the Indonesian Mining Journal Vol. 25, No. 1, April 2022. Those are:

1. Dr. Ir. Dudi Nasrudin Usman, S.T., M.T.
2. Zulfahmi, Ir., M.T.
3. Hernandi Albeto Octaviano, S.T., M.E.M.
4. Dr. Asep B. Purnama, S.T., M.T.
5. Ir. Linda Pulungan, M.T.
6. Eko Pujiyanto, Ir., M.E.
7. Dr. Ir. Reginawanti Hindersah, M.P.
8. Prof. Dr. Ir. Betty Natalie Fitriatin

COPY EDITOR

1. Prof. Dr. Datin Fatia Umar, Ir., MT.

LAYOUT EDITOR

1. Bachtiar Efendi (Center for Mineral and Coal Testing)
2. Ginanjar Aji Sudarsono, S.Kom. (Center for Mineral and Coal Testing)



Crossref

All articles published are embedded with DOI numbers that are affiliated with Crossref DOI prefix 10.30556

ACCREDITATION

Indonesian Mining Journal has been accredited as a scientific journal by the Director General of Research and Development Strengthening, Ministry of Research, Technology and Higher Education of the Republic of Indonesia (RISTEKDIKT).
No. 200/M/KPT/2020
Valid until October 2024

BUSINESS AND ADMINISTRATION STAFF

Deni Nurul Kamal, Sumaryadi, Hanny Fauziah, Wulandari Surono, Hasniati Astika, Bachtiar Efendi and Ginanjar Aji Sudarsono

PUBLISHER

Center for Mineral and Coal Testing

EDITOR ADDRESS

Jl. Jend. Sudirman 623 Bandung 40211
Telpon : (022) 6030483 - 5, Fax : (022) 6003373
e-mail : imjournal@gmail.com
Web : <http://jurnal.tekmira.esdm.go.id/index.php/imj>
DOI : [10.30556/imj](https://doi.org/10.30556/imj)

Disclaimer:

Opinions and statements expressed in IMJ are the author's responsibility