Online Conference

Call for Paper



The 3rd International Conference on Business and Engineering Management

February 5th 2022

Theme:

Leveraging Sustainable Digital Economy, Entrepreneurship, and Future Energy Systems Role in the Post COVID-19 Era

We invite researchers, academics, community service volunteer, business leaders, and government officials to submit and present papers in the broad areas of business management, engineering management, quality management, knowledge management, and innovation management, including but not limited to:

Track 1: Academic & Research

Subtrack 1.1: Business and Social Science Subtrack 1.2: Engineering Management Subtrack 1.3: Management

Track 2: Community Service (ABMAS)

Subtrack 2.1: Circular Economy

Subtrack 2.2: SDGs

Subtrack 2.3: Renewable Energy

Subtrack 2.4: MSME upscaling & upgrading

Subtrack 2.5: Sociopreneur

Subtrack 2.6: CSR* (Corporate/Government)

*Note: We offer to promote and publish CSR Activity of Corporate and Government in Media

Registration Fees

Track 1: IDR 1,250,000 Track 2: IDR 750,000

Additional Publication Fee

Atlantis Press : IDR 2,000,000 SEWAGATI : IDR 500,000

Keynote Speaker:



Prof. Dr. Jarosław Korpysa (University of Szczecin, Poland)



Prof. Dr. Sardar M. N. Islam (Victoria University, Australia)

Accepted papers have an option to be published in:

Track 1:



Track 2:



Important Dates

Abstracts/Full-Text Paper Submission Deadline

Notification of Acceptance/Rejection

Final Paper (Camera Ready) Submission & Early Bird Registration Deadline

Conference Dates

December 31th, 2021 January 15th, 2022 January 30th, 2022

February 5th, 2022

Further Information for Submission and Partnership bit.ly/iconbem2022

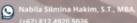
Organized by.

Conference Partner:



Contact Person:

Prahardika Prihananto, S.T., M.T.





Conference Committee

General Chair : Dr. Ir. Arman Hakim Nasution, M.Eng., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia General Co-Chair : Dr. oec. HSG. Syarifa Hanoum, S.T., M.T., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

Program Chair:

- Mushonnifun Faiz Sugihartanto, S.T., M.Sc., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Bahalwan Apriyansyah, S.T., MBA., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Lissa Rosdiana Noer S.T., M.MT., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Dewie Saktia Ardiantono, S.T., M.T., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

Editorial Committee :

- Gita Widi Bhawika, S.ST., M.MT., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Gogor Arif Handiwibowo S.T., M.MT., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Ninditya Nareswari, S.M., M.Sc., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

Treasurer:

Aang Kunaifi, S.E., M.SA. Ak., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

External Affair:

- Geodita Woro Bramanti, S.T., M.Eng.Sc., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Prahardika Prihananto, S.T., M.T., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Nabila Silmina Hakim, S.T., MBA., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

External Committee:

- Agus Muhamad Hatta, ST, MSi, Ph.D., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Lalu Muhamad Jaelani, S.T., M.Sc., Ph.D., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia
- Dr. Choirul Mahfud, S.Pd.I., Pd.I., Institut Teknologi Sepuluh Nopember Surabaya, Indonesia

International Committee:

- Prof. Amrik Sohal, Monash University, Australia
- Prof. Daniel Prajogo, Monash University, Australia
- Prof. Nafis Alam, Monash University Malaysia Campus, Malaysia
- Prof. Pervaiz Ahmed, Monash University Malaysia Campus, Malaysia
- Prof. Benny Tjahjono, Coventry University, UK
- Prof. Tritos Laosirihongthong, Thammasat University, Thailand
- Dr. Pan Wei Hwa, Yunlin National University of Technology, Taiwan
- Dr. Chih-Liang Liu, Yunlin National University of Science and Technology, Taiwan
- Dr. Yudi Fernando, University Malaysia Pahang, Malaysia
- Dr. Saadat M. Alhashmi, University of Sharjah, UEA
- Dr. Mehdi Toloo, Technical University of Ostrava, Czech Republic
- Dr. Biswajit Sarkar, Yonsei University, South Korea
- Dr. Andre A. Pekerti, University of Queensland, Australia
- Dr. Shu-Chiang Lin, Texas Health and Science University, Austin, USA
- Dr. Aise Kim, University of South Australia, Australia

Organized by:



Conference Partner:





SWISS GERMAN UNIVERSITY

Assignment Letter/Surat Tugas

No. AL/MME-SGU/0012A/II/22

Date 2 February 2022

Page 1 of 1

Doc. Type Main Document / Dokumen Utama

Dr. Ir. Gembong Baskoro, M.Sc

Activity Assignment

Penugasan Kegiatan

Head of Master of Mechanical Engineering Study Program Ketua Program Studi Magister Teknik Mesin

In consideration of:

His appointment as the Head of Master of Mechanical Engineering Study Program under agreement no. SK/004/HR/VII/2020.

Mengingat:

Pengangkatannya sebagai Ketua Program Studi Magister Teknik Mesin di bawah perjanjian no. SK/004/HR/VII/2020.

Herewith permits to

Name : Position :

Faculty :

Dengan ini menugaskan kepada

Dr. Ir. Gembong Baskoro, M.Sc

Lecture of Master of Mechanical Engineering Study Program/*Dosen Magister Tehnik Mesin Program Study* Engineering and Information Technology/ Teknik dan

Teknologi Informasi

To participate as presenter on the

following activity:

Untuk berpartisipasi sebagai presenter pada kegiatan berikul ini:

No	Event / Acara	Organizer / Penyelenggara	Date / Tanggal	Venue / Tempat
	IconBEM 2022 (The International Conference on Business and Engineering Management)	ITS Business Management	Saturday, 5 th February 2022	Zoom online conference

The appointed shall accomplish the task in responsible ways in line with the related guidelines and other regulations given by SGU.

Pihak yang bersangkutan harus melaksanakan tugas dan tanggung jawab sebaik-baiknya, sesuai dengan petunjuk dan peraturan dari SGU

Assignor / Pemberi Ijin:

Dena Hendriana, B.Sc., S.M., Sc.D Head of Master of Mechanical Engineering Kepala Jurusan Magister Tehnik Mesin







Letter of Acceptance

Dear Gembong Baskoro (Paper #064),

Paper Title: From VUCA to BANI: A challenge of strategic environment for higher education in Indonesia

Congratulations!!! On behalf of the IConBEM 2022 committee, we are pleased to inform that your paper has been accepted for presentation in IConBEM 2022 conference, which will be held on February 5th, 2022 by online. Please follow the listed points to prepare your final version of your paper/abstract:

- 1. Please revise your abstract based on reviewers' comments below (if any). You should consider putting the affiliation name correctly.
- 2. Please update your revised version of abstract to Easychair submission system with the full paper attached.
- 3. Please register to the conference, at least one author of each paper should register. Please make the payment via Bank Transfer to the following account detail:

Bank Name : BANK NEGARA INDONESIA

Account number (VA Number) : 8257715090200001 Account name : IConBEM 2022

- 4. Please also confirm the registration by sending the proof to https://intip.in/confirmationiconbem2022
- 5. Upon there is a problem with the payment, please inform us via WhatsApp to Mrs. Nabila (+62-812-4920-5036) or Mrs. Lissa (+62 817-0338-2220) by quoting your paper number.
- 6. Please visit the conference website to find all the information and updates about the conference venue, location, and conference program.
- 7. Please note that each accepted paper/abstract should be presented at the conference.

We look forward to meeting you in IConBEM online venue.

Best Regards,



Dr. Ir. Arman Hakim Nasution, M.Eng. IConBEM 2022 Conference Chair https://www.its.ac.id/mb/conference/iconbem2022/

Important Dates:

•	Abstracts/Full-Text Paper Submission Deadline	January 9 th ,	2022
•	Notification of Acceptance/Rejection	January 15th,	2022
•	Final Paper Submission & Early Bird Registration Deadline	January 30th,	2022
•	Confrence Dates	February 5 th ,	2022









Reviewer's Comments

The authors propose the research entitled "From VUCA to BANI: A challenge of strategic environment for higher education in Indonesia", which we found challenging. However, there are some action that need to be done to make your article more meaningfull.

The overall abstract is okay. However, the methodology should be elaborated more in one or two sentences to educate the reader most easily. The background is too long and can be shortened. The findings also stil not stated clearly. Please update the abstract.



From VUCA to BANI: A challenge of strategic environment for higher education in Indonesia

Gembong Baskoro 1,*

¹ Master of Mechanical Engineering Department Swiss German University, Indonesia

*Email: gembong_baskoro@yahoo.com

ABSTRACT

Pandemic of Covid 19 was a roller coaster pressure for any organization including but not limited to higher education especially in Indonesia. The pressure further than just an adaptation of education using digital based technology to overcome the problem of face-to-face learning. After the pandemic higher education in Indonesia mostly have used to operates in online (distance) learning method using variety of available platforms. However, this was seemingly a solution during the pandemic in term of learning efficiency but not quite sure of its effectiveness by means of quality of the learning. In reality, higher education must adapt to the fast-changing strategic environment in order to ensure their sustainability especially when strategic environment change rapidly. Before the pandemic it was familiar that the strategic environment faced by higher education broadly known as V.U.C.A. stands for volatility, uncertainty, complexity, and ambiguity. However, after the pandemic Covid 19 several variants of virus alike Covid 19 have emerged such as delta, omicron, and perhaps more to come, therefore strategic environment of V.U.C.A. may not be representable anymore to describe the situation. A new acronym that represent today strategic environment after the Covid 19 is now become popular with the acronym of B.A.N.I. stands for Brittle, Anxious, Nonlinear, and Incomprehensible.

Therefore, this paper will elaborate B.A.N.I. as new strategic environment as challenges or threats for higher education especially in Indonesia. This paper will elaborate scenarios for higher education institutions in Indonesia to overcome the situation. This paper uses experiential learning and literature study to describe the situation.

Keywords: BANI, VUCA, Disruption, Higher Education, Leadership

1. INTRODUCTION

Pandemic of Covid 19 have been spreading to almost around the world and not sure when it will over. The pandemic has impacted to the operation of any organizations including but not limited to higher education institution (HEI). During the pandemic and before, the strategic environment was associated as Volatile, Uncertain, Complex, and Ambiguity (VUCA). This strategic environment was familiar also as VUCA world. In the VUCA world HEIs struggle to sustain their operation by adopting digital technology of distance learning, and using as many as digital platform to ensure their operation efficiency. In doing so, HEIs have tried their best to ensure quality of education under control (acceptable by the situation). However, in reality, no one so sure that the quality of education in comparable with face-to-face learning. Today and the future, the VUCA world may not be relevant anymore to represent the today strategic environment faced by HEIs and many other organizations. Simply the uncertainty was not over yet and therefore VUCA world has changed to the so called Brittle, Anxious, Nonlinear, and Incomprehensible (BANI).

Considering the situation, this paper tried to explore the new strategic environment of BANI that may impact especially to HEIs in Indonesia.

2. METHODOLOGY

The method used in this paper was based on observation, author experience in the field of education, and literature study. By using this method, the author made subjective assessment and conclusion.

3. STRATEGIC ENVIRONMENT

Strategic environment is a situation of environment (global, regional, or national) that has significant impact either positive or negative to organization goals and or objectives. Term of strategic environment is usually used in the context of state or defense. However, due to its impact, strategic environment can also be used for any organization other than state or defense. Strategic environment provides strategic value to formulate a strategy. Therefore, determining the right strategic environment will of course very important in formulating the right strategy. This paper identifies and discusses two

broadly known important strategic environments i.e. VUCA and BANI. Both of them are actually a form of threat for HEI (Figure 1).

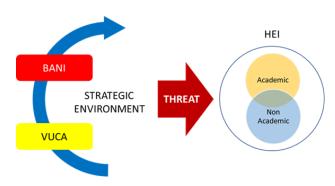


Figure 1 Strategic Environment of VUCA & BANI as a Threat for HEI.

3.1. VUCA

VUCA is an acronym of Volatile, Uncertain, Complex, and Ambiguity. This VUCA acronym indicates that situation of strategic environment that represent the situation. VUCA is simply a form of threats broadly known also as VUCA world. Consequently, the strategy of any organizations including but not limited to HEI must be developed to respond the VUCA. The strategic environment of VUCA was introduced in 1985 by Warren Bennis and Burt Nanus in their book Leaders The Strategies For Taking Charge. As it was introduced quite long time ago, then VUCA may not be relevant anymore or perhaps already obsolete to describe today strategic environment. During the VUCA world, Baskoro (2020) has identified several situations that gave impact to HEIs [3]. Among others, he further defined situation of VUCA related to industry 4.0 and pandemic Covid 19 [3]. The meaning of VUCA acronym can be explained below [6]:

V- Volatile

The unpredictable, unexpected, or unstable situation of change. As the condition is unstable therefore it is also a dangerous of threat. However, one may see on the other side of volatility as opportunity. In the volatile environment a clear vision is required.

U- Uncertain

Uncertainty can also mean a situation where there is incomplete information so that the answer become uncertain and unsure. This indicated our past experiences no longer relevant to predict probabilities of something that will happen. In this situation, we need to improve our understanding of situation.

C- Complex

Our strategic environment nowadays become so complex if it is compared to the past. We have nowadays

more variety of problems, more magnitude, more intense, etc. So that in this situation if it is uncontrolled may lead to a chaos. In this situation we have to find ways to increase the clarity whether in communication or anything else.

A- Ambiguity

The strategic environment is increasingly confusing, unclear, and difficult to understand. In the situation like this, we need to put forward agility, and flexibility.

3.2. BANI

BANI is an acronym of Brittle, Anxious, Nonlinear, and Incomprehensible. This BANI acronym indicates a new situation that cannot be described anymore by VUCA because it was considered obsolete. This acronym was introduced by Jamais Cascio during in an IFTF (Institute of The Future) event. He indicated that the situation of strategic environment nowadays was not only unstable but also chaotic [5]. Unfortunately, VUCA and BANI have similarity that they are actually a form of threats with different type, magnitude, and or seriousness. The meaning of BANI acronym can be explained below [1]:

B-Brittle

This indicates a situation of fragility. For example, in the fragile conditions, any business organizations risk of getting overnight bankruptcy due to the change of market and customer behaviours. More than that in fragile environment no one can guarantee a stability of job, positions, business, etc. as they can collapse at any time. In this situation, a resilience is really needed.

A- Anxious

It is a situation of anxiety by people or organizations due to the fragility of the situation. This is actually fears of missing out (FOMO) or fear of left out or losing something. In today situation after covid 19, people and organization were used to face bad news and anxiety. For example, there is (exaggerated) information in digital media that categorized as hoaxes, and fake news, and more. The worst conditions of anxiety may lead to a depression and feel of helpless. In this situation, empathy and mindfulness are really important. Individual and Organization mindfulness can be defined simply by behaviour of Individual and Organization living in a present time. Organizational mindfulness refers to the extent to which an organization captures discriminatory detail about emerging threats and creates a capability to swiftly act in response to these details [8]. To overcome the anxiety, we need to foster a growth mindset. Growth mindset was that intelligence can continue to grow with time, effort, and perseverance [2]. People can continue to add and develop other abilities in addition to their basic abilities, which they consider only the starting point of their potential [2].

N- Nonlinear

It is defined as a situation where cause and effect has obvious connection. As we used to think in a logical thinking, a non-linear situation creates an ambiguity. For example, in a non-linear situation, a small cause can have enormous effects. There is a situation that difficult to predict, to plan, to forecast, and or to foresee the future. Therefore, individual or organization need to adapt and be flexible on this uncertain conditions.

I- Incomprehensible

It is actually a situation where our reasoning become unobvious. Usually our response and answer to situation not convincing and no longer make sense, and we don't understand why. Consequently, we don't have confident to our respond to the situation that lead to the block of creativity. Therefore, we have to practice confident in this situation by having enough courage to imagine.

4. HEI AND STRATEGIC ENVIRONMENT

In the strategic environment that has changed to BANI, higher education institutions (HEI) need to define clearly ways to ensure sustainability due to the threats of BANI. Finding factors of HEI that related to BANI threats is very urgent and important.

4.1. Important Factors for HEI

Baskoro (2021) defined major factors of assessment before and during the pandemic were a) academic and b) non-academic. He indicated during the pandemic based on his subjective assessment that both factors were lower compared to the time before the pandemic. He also indicated that factors of non-academic suffered more than the academic factors.

Table 1. BANI vs Factors related to HEI

primarily private HEI in Indonesia during and after the pandemic.

5. DISCUSSION

Strategic environment of BANI has impacted directly or indirectly to HEI as indicated in table 1 and table 2. Table 1. shows factors related to HEI due to BANI. The explanation of those factors are as follows:

In brittle environment, the stability of HEI operation that lead to sustainability will be the main concern. In the worst case situation for HEI due to threats in a brittle environment will be bankruptcy and out of business. It was observed that during and after pandemic some (private) HEIs in Indonesia showed an unstable operation merely due to degradation of student intake, migration to distance learning, poor digital literation of especially (senior) lecturers, etc. (Table 2.). During and after the pandemic, most HEIs (prepared or unprepared) must operate in a distance learning education using available platform and methods. This was a kind of disruption in education that no one (both lecturer and student) has experienced before. Consequently, those that cannot adapt in this new normal will not survive. In this brittle environment government, and management of HEI have tried their best to mitigate the risk by applying several initiatives for example financial support and tuition reduction scheme for student, technology support and training, and even the possibility for merger between HEIs. It was also observed that HEI with strong financial backup will be better to endure in brittle environment compared to those who were not.

In anxious environment both people and organization feel anxiety due to, among other, the risk of getting out of business. Naturally the anxiety will impact to

Strategic Environment	Factors related to HEI	Worst Case for HEI
B-Brittle	Stability and sustainability	Unstable leads to bankruptcy
A- Anxious	Organization dynamic	Stagnant and apathetic
N- Nonlinear	Leadership and management	Bureaucracy and rigid
I- Incomprehensible	Vision and idealism	No vision and idealism

Although the similar factors defined previously in Baskoro (2021) still applicable for the assessment [4]. However, this paper defines different factors of assessment merely related to organization, management, and leadership. This paper also identifies possible worst case when those factors are not managed properly.

organization dynamic. For example, due to the feeling of anxiety then energy to do or to innovate something will be lower compared to the normal condition. Not surprisingly that based on observation during and after pandemic, HEIs tend to be stagnant or stand still and the worst case become apathetic to the situation. Simply

4.2. Assessment of BANI to HEI

This paper defines assessment of HEI based on subjective evaluation from the author that observed

Table 2. Assessment of factors related to HEI with BANI

Strategic Environment	Factors related to HEI	Assessment of HEI
B-Brittle	Stability and sustainability	Generally unstable
A- Anxious	Organization dynamic	Generally stagnant
N- Nonlinear	Leadership and management	Depends on the leader
I- Incomprehensible	Vision and idealism	Depends on the board

because people and organization don't want to do something they consider "risky".

In non-linear environment almost difficult to have reasoning of cause and effect in a logical thinking. Ambiguity of reasoning can impact in the difficulty to predict, to plan, to forecast, and or to foresee the future. In this uncertain situation, leadership and management in organization are challenged to find ways to ensure organization keep moving forward towards its vision. The assessment of HEI in this uncertain situation showed that leader plays a central role. Therefore, we observed that organizations that have a good leadership and management have overcome this situation creatively. So that negative impact due to the uncertain situation can be suppressed.

Similarly, especially in incomprehensible situation, vision and idealism of the board played a big role for HEI. We have observed that boards of HEI that have crystal clear vision and idealism have overcome the situation of BANI much better. The boards of HEI that have idealism not only able to mitigate and suppressed the risks but also unexpectedly still able to develop and make expansion of HEIs in this difficult time while others were struggling. The board play a big role not only in incomprehensible situation but in normal situation as well because vision and idealism of HEI depends on actually by the board. We have also observed that even HEI with very low tuition fee still able to manage operation, and expand the boundary because the board has very strong idealism and crystal clear vision.

6. CONCLUSION

This paper has concluded that HEIs in Indonesia were struggling in the VUCA world especially due to the pandemic. Moreover, in the new strategic environment of BANI that considerable heavier situation than VUCA, HEIs especially related to factors of academic and non-academic were struggling more to ensure their sustainability. Both VUCA and BANI were actually a serious threat for HEI (Figure 1).

This paper also concluded that HEIs still able to manage the operation and sustainability in the situation of BANI due to good leadership of the HEIs and the board. This leads to conclusion that idealism, vision, leadership and management were the key factors of success to overcome the uncertain strategic environment of BANI.

Finally, there is always a thousand way out of any problem. Always try to find the way.

ACKNOWLEDGMENTS

Thanks to all of my master student, under cooperation of United Tractors-Swiss German University, in the class of strategy & disruptive innovation that performed group discussion on the topic of BANI. Extended appreciation especially to ibu Endang T. Handajani who encouraged the class to think out of the box as well as pak Makmur Supriyatno who delivered guest lecture on strategy.

REFERENCES

- [1] BANI: A new framework to make sense of a chaotic world?, https://thinkinsights.net/leadership/bani/
- [2] C.S. Dweck, Mindset: The new psychology of success, 2006, Balantine Books, New York
- [3] G. Baskoro, Designing a Master Program to Cope with the New and Next Normal (VUCA World, Industry 4.0, and Covid 19): a case study, International Conf. on Management of Technology, Innovation, and Project (MOTIP), 2020, ITS
- [4] G. Baskoro, Tertiary (higher) education in Indonesia under pressure: innovation towards the next normal as a consequence of pandemic Covid 19, The 3rd International Conference on Business and Management of Technology, 2021, ITS
- [5] J. Cascio, Facing the Age of Chaos, Distinguished Fellow, Institute for the Future, 2021.
- [6] N. Bennett, G. J. Lemoine, What a difference a word makes: Understanding threats to performance in a VUCA world, 2014, Elsevier
- [7] N. Bennett, G. J. Lemoine, What VUCA Really Means for You, 2014, Harvard Business Review
- [8] T. J. Vogus, K. M. Sutcliffe, Organizational Mindfulness and Mindful Organizing: A Reconciliation and Path Forward, Academy of Management Learning & Education, 2012, Vol. 11, No. 4, 722–735.