ABSTRACT
This article presents the portrait of learning “forced” online in Indonesian Vocational Higher Education (VHE). It offers policy recommendations on dealing with online course content delivery in the vocational education context. It reports an exploratory case study that showcases the lecturers’ and students’ experiences, thoughts, and reflections attending a series of full-online learning practices during the Covid-19 outbreak. We collected all the data online through focus group interviews with institutional leaders, lecturers, heads of the academic affair, and the student’s representatives. As a result, the study raised some emerging issues; they are 1) the lecturers’ readiness and their quick adaptation to online learning technologies, 2) the unsuitability of vocational courses for virtual learning, 3) the internet accessibility and affordability, 4) the increase in students’ workload and stress, and 5) the course material understandability. Thus, this implication calls for critical online learning pedagogy and institutional policy design in mediating the delivery of the practical courses during the pandemic. The study revealed that learning “forced” online tend to ignore student cognitive engagement and the psychological and pedagogical aspects of learning. Furthermore, we propose some policy recommendations to cope with the issues

Keywords: Learning “forced” online, internet affordability, digital literacy, students’ workloads, and cognitive engagement

1. INTRODUCTION
The covid-19 pandemic has recently become an emerging global threat. Its spread in several affected countries has brought significant changes to educational practice at all levels of education. Consequently, kindergartens, schools, universities, and polytechnics are closing to curb the spread of the pandemic disease. Therefore, the institution decided to stop all the classroom face-to-face meetings and replace them with the online learning method. Thus, learning “forced” online is currently not an option; however, we need to prepare all the educational resources for the extension of the “Study from Home (SFH)” policy to ensure the education continues (see Moorhouse, 2020). The enactment of online learning policies at all levels of formal and informal education in Indonesia refers to central and local government regulations that are enforced periodically per developments in handling covid-19 cases. This policy aims at protecting the academics, students, school administrators, and all people within the community from that infectious disease. It is also one of the institutional strategies to keep the people in the community feel safe and well-informed to prevent transmission [2].

In the vocational higher education context (well-known as polytechnic education), online teaching and learning have become problematic and challenging because the core content of the curricula focuses more on practical than theoretical courses. The call for the inclusion of online pedagogy in vocational learning outside the institutions is necessary [3]. The use of vocational texts [4] such as a handbook, job-sheet, and manuals is related to all practical courses conducted in mechanical, chemical, electrical, and civil engineering laboratories. Therefore, the learning “forced” online in vocational institutions concerning the practicability and applicability of the engineering courses should be well-acknowledged.

2. METHODS
2.1. Research setting and participants
We investigated the learning “forced” online in a state polytechnic education in Indonesia. It is a medium-sized
higher institution with six departments (four engineering and two non-engineering) and twenty-four study programs. Since the enactment of the social distancing policy, all campuses are closing and switching to the VLE setting. The context of learning was a full-online setting. We recruited two institutional leaders (policymakers), seventeen lecturers, two academic staff, and six students representing all the departments. This study used an exploratory case study to investigate and explore their voices of experiences, thoughts, and reflections upon implementing the new mode of delivery and learning interactions. We also explored the current status quo of the institutional readiness to facilitate online learning during the COVID-19 outbreak.

2.2. The procedures of data collection

Since the enactment of the Covid-19 prevention protocol, all research activities have been carried out entirely online as a preventive measure to reduce contact with the participants. We used three techniques to collect the data: 1) online reflection sheet using Google form, 2) online focus group using Zoom application [5], and 3) social media posts and comments. We collected 332 responses from the students across the institution. We then conducted and recorded four online focus group sessions (approximately one to three hours/session) with the participants.

2.3. Data analysis

Since we collected a wide range of text data, we used a qualitative approach to data analysis [6]. To figure out the data for profound reflection interpretation, we started the analysis from the students’ reflections data by exporting the tables of responses from the Google drive storage into the laptop drive for further analysis. We then classified the content of the data (chunks) into some word documents for more effortless coding. We labelled and assigned symbolic meanings to the chunks to generate categories and themes that emerged in the data. We generated the online focus group recordings and played them several times to identify the core themes and subthemes.

3. FINDINGS

We drew two significant findings; they are 1) issues related to the lecturers and 2) issues related to students. We present the emerging categories and themes in both subsections with some interpretations and implications of the findings. The study uncovers some new insights that teaching online amid unpreparedness caused some problems during its implementation. The findings presented in this section are subject to evolve, along with the development of the COVID-19 pandemic from time to time.

3.1. Issues related to the lecturers

3.1.1. Teachers’ readiness and their quick adaptation to technology

In terms of the lecturers’ adaptation to new technology, several key issues have blocked them from the actual use of online learning tools and platforms such as teachers’ computers, digital, internet, multimedia, network, and information literacies [7]. Consequently, the teaching might not be effective due to the unfamiliarity with the interface and character of new technology. This finding corresponds to Hartman et al. [8] that educators need support to integrate technology, such as continuing professional development, e-learning infrastructure, and financial aid.

The lack of synchronous and asynchronous online learning interaction must be a severe concern to shape a meaningful pedagogical experience for lecturers and students. Therefore, improving the student’s online interaction quality is essential to create a meaning-making nuance of learning [9].

3.1.2. The unsuitability of courses for online teaching and learning

Not all subjects can be delivered online, particularly in engineering departments. In the VHE setting, more than 70 % of the total subjects are practical-based courses and require hands-on job operation. The context is different in which the students currently do not have access to the laboratory. For example, the lecturers could not situate the welding jobs in the online learning environment. The students must be in the workshop, prepare the welding tools, and do the job directly. Consequently, no practicum and workshop classes are currently running due to the limited access to the lab facilities.

3.2. Issues related to Students

3.2.1. Learners-informed experiences of attending online courses

This section presents topics related to students in terms of their enrolment in a virtual learning space. It provides meaningful insights from the current picture of the learning practice that elucidates the lived experiences of the learners.

The major problem is the limited internet access, unstable connection, and limited financial resources to afford the internet. I believe that if we have free access to the e-learning system, the learning will be running well (Student #5)

The above excerpt showcases the critical problem of online courses associated with internet accessibility and affordability. Not all students could afford the internet
3.2.1. The increase in students’ workload and stress

At the same time, online learning is perceived as exhausting because they must spend more time in front of a laptop or smartphone. 256 out of 332 participating respondents (77.3%) agreed that online learning is more tiring than classroom learning. Psychologically, overtasking will affect the students’ mental health, such as increased anxiety, depression, eating disorders (anorexia, bulimia, and binge eating), and insomnia sees [10].

3.2.2. Course material understandability

In terms of course material’s understandability, the learners found it difficult to grasp the materials due to the limited teacher-student and student-student interactions (56.5%). As shown in Figure 1, more than half of the participating respondents (54.4%) agreed that they found it challenging to comprehend the materials through various platforms used by the lecturers.

I found it difficult to interact with classmates and the teacher. Also, I could not understand the lesson (Student #6).

I honestly like online learning, but the way the lecturer explains it is less satisfying. The lecturers give assignments with brief deadlines that make students overwhelmed. It would be nice if adjusted to the portion (Student #4).

It can be inferred from the excerpts above that some students were not engaged cognitively in what they had learned. The word “less satisfying” indicates that the pedagogical aspect of learning did not become a priority concern. Similar excerpts also emerge many times in the data, so it strongly emphasizes the issue.

4. DISCUSSION

4.1. The loss of the institutional role as an access provider to education

The institutional role of an education access provider is pivotal [11]. Since the lecturers could select any platform of their choice without looking at the learning context, it has significantly impacted online learning practices. From a critical standpoint, giving the lecturers authority to choose any platform for use in their online classes has put much pressure on the students in which they have to learn and use many types of learning technologies. At this point, the institution loses its function as a learning facilitator and access provider to online learning infrastructure. The role of an educational institution is to provide support for the learning process, either offline or online [12]. Issuing a decree instructing academics to teach online without providing adequate resources is a massive violation of the profession.

4.2. Teaching online is not an instant process

Building the students’ readiness to accept new technologies is not an instant job; they need to adapt to some degrees of instruction. This research significantly impacted the students’ fatigue, and stress affected their learning performance to be sluggish. In this critical point, the pressures on learners are threefold. Firstly, they had to learn several new platforms simultaneously in which the platforms have different characteristics and require different instructions. It is vital to devise the students with an orientation that can be done either by the institution or the lecturers [13]. Secondly, they must struggle to understand the lessons and work overload on the tasks. Giving assignments to students should be measurable and proportional to avoid over-tasking. Thirdly, they had to spend more money to afford the internet. The learners raised this crucial issue: they currently need financial support to afford the internet. It is essential to highlight that the tuition fee is inclusive, so the institution must provide the students with access to the system.

4.3. Learning ‘forced’ online and learners’ cognitive engagement

The learners’ mental processes of acquiring knowledge from a new context of learning can influence the learners’ cognitive engagement in the VLE. In this pandemic outbreak, engaging the learners in an online learning environment is needed to improve the student’s motivation and learning strategies [14]. However, teaching ‘forced’ online in a crisis calls for the instructors’ involvement to explore context-based interaction strategies to cognitively engage and motivate the students with their online courses [15]. A well-worked online interaction activity model might help the instructor reduce the students’ stress and anxiety, particularly in an emergency. Therefore, the lecturer must play a central role in assisting the students in shaping their cognition. Otherwise, the learners situated in a disengaging learning environment will continue to be more stressed and demotivated.

5. CONCLUSION

This article concludes that three pivotal agents have a crucial role in supporting the online learning practice in vocational colleges: lecturers, students, and institutional leaders. They need to be involved in any discussions related to online learning policy-making where they are the ones who know best all the resources needed to support its implementation. Therefore, we recommended building and strengthening the e-learning infrastructure with the latest technology, conducting continuing professional development programs for lecturers and students, providing ease of access to the internet and platforms for the entire institutional community, avoiding overtasking the students under a critical learning condition, provides complete access to online
materials and resources (online self-access learning platform). More importantly, we suggest the lecturers negotiate the learning strategies with the students to make meaning in practice. Regarding the hands-on jobs of the laboratory courses, it is suggested to utilize virtual reality (VR) and augmented reality (AR) applications to support the delivery of practical courses. However, it only touches on the cognitive realm instead of improving students' skills.

ACKNOWLEDGMENT

We are deeply indebted to all the FGD participants for their voluntary participation and involvement in the entire online focus group meetings. Additionally, we would like to thank all the students for their meaningful reflections and insights on the studied issues.

REFERENCES

[1] B. L. Moorhouse, “Adaptations to a face-to-face initial teacher education course ‘forced’ online due to the COVID-19 pandemic,” J. Educ. Teach., vol. 00, no. 00, pp. 1–3, 2020, doi: 10.1080/02607476.2020.1755205.
[2] G. Kidman and C.-H. Chang, “What does ‘crisis’ education look like?,” Int. Res. Geogr. Environ. Educ., vol. 29, no. 2, pp. 107–111, 2020.
[3] D. Whittington and A. McLean, “Vocational learning outside institutions: Online pedagogy and deschooling,” Stud. Contin. Educ., vol. 23, no. 2, pp. 153–167, 2001, doi: 10.1080/01580370120101939.
[4] V. Lindberg, “Learning practices in vocational education,” Int. J. Phytoremediation, vol. 47, no. 2, pp. 157–179, 2003, doi: 10.1080/00313830308611.
[5] D. Morrison, K. Lichtenwald, and R. Tang, “Extending the online focus group method using web-based conferencing to explore older adults online learning,” Int. J. Res. Method Educ., 2019.
[6] M. B. Miles, A. M. Huberman, and J. Saldana, Qualitative Data Analysis: A Methods Sourcebook, Third Edit. USA: SAGE, 2014.
[7] P. Boechler, K. Dragon, and E. Wasniewski, “Digital Literacy Concepts and Definitions: Implications for Educational Assessment and Practice,” Int. J. Digit. Lit. Digit. Competence, vol. 5, no. 4, pp. 1–18, 2014, doi: 10.4018/ijdldc.2014100101.
[8] R. J. Hartman, M. B. Townsend, and M. Jackson, “Educators’ perceptions of technology integration into the classroom: a descriptive case study,” J. Res. Innov. Teach. Learn., vol. 12, no. 3, pp. 236–249, 2019.
[9] A. N. Diep, C. Zhu, C. Cocquyt, M. De Greef, and T. Vanwing, “Adult learners’ social connectedness and online participation: the importance of online interaction quality,” Stud. Contin. Educ., vol. 41, no. 3, pp. 326–346, 2019.
[10] B. J. Mistler et al., “The Association for University and College Counseling Center Directors Annual Survey,” 2012. [Online]. Available: http://www.unccd.int/en/programmes/Event-and-campaigns/Dryland-Champions/dryland_champions_2014/Pages/Eritrea.aspx.
[11] L. Habib and M. Johannesen, “The role of academic management in implementing technology-enhanced learning in higher education,” Technol. Pedagog. Educ., vol. 29, no. 2, pp. 129–146, 2020.
[12] M. Kebritchi, A. Lipschuetz, and L. Santiague, “Issues and Challenges for Teaching Successful Online Courses in Higher Education: A Literature Review,” J. Educ. Technol. Syst., vol. 46, no. 1, pp. 4–29, 2017.
[13] S. Ko and S. Rossen, Teaching Online: A Practical Guide, Third Edit. New York and London: Routledge:Taylor & Francis Group, 2010.
[14] J. C. Richardson and T. Newby, “The Role of Students’ Cognitive Engagement in Online Learning,” Am. J. Distance Educ., vol. 20, no. 1, pp. 23–37, 2010.
[15] J. Ma, X. Han, J. Yang, and J. Cheng, “Examining the necessary condition for engagement in an online learning environment based on learning analytics approach: The role of the instructor,” Internet High. Educ., vol. 24, pp. 26–34, 2015.