Development of Work Engagement Model Based on Organizational Culture Method

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The lecturers are one of key success in the highest education systems processes that are expected can improve the quality of education in Indonesia. The purpose of this study is to determine how the effect of Organizational Internal Communication, Organizational Justice, Intrinsic Rewards, and Self-Development on Lecturer’s Work Engagement in terms of organizational culture. The population of this study is the lecturers who have a National Lecturer Registration Number at college of economics in east Jakarta. The population in this study is 377 lecturers and using a proportional random sampling technique, the sample of this study is 200 lecturers. The data analysis method used in this study is Structural Equation Modeling (SEM); for data processing, this study using Partial Least Square Structural Equation Models (PLS-SEM) software. The results of this study are expected to provide input to the college to improve lecturers’ work engagement. Improving lecturer’s work engagement can be done directly through improving organizational internal communication, organizational justice, intrinsic rewards and self-development. While indirectly it can be done through increasing managerial effectiveness, and the work team is an effective mediating variable to increase lecturers' work engagement. While indirectly it can be done through increasing organizational justice. Intrinsic rewards is effective mediating variables to increase lecturers' work engagement.

Keywords: organizational internal communication, organizational justice, intrinsic rewards, self-development, work engagement

INTRODUCTION

In relation to the development of quality human resources, a good and quality education system is one of the keys. Higher education holds a strategic position as an institution tasked with forging the quality of citizens of the nation. Law of the Republic of Indonesia Number 12 of 2012, on Higher Education, explains that higher education as part of the national education system has a strategic role in educating the life of the nation and advancing science and technology by paying attention and applying the value of the humanities as well as the culture and empowerment of the Indonesian nation which sustainable. This means that higher education institutions have a large role in the

development of Indonesian human resources. One of the key holders of success in this process is the teaching profession in the tertiary education system.

As a professional educator, a lecturer is demanded to have the highest academic qualifications to carry out the Tri Dharma of Higher Education (Education, Research, and Community Service) to the maximum that not everyone can do well. Some of the problems are caused by the busy schedule of lecturers in teaching, and ignoring research and community service, resulting in many lecturers who do not have functional positions. The poor administration system also supports the number of lecturers who do not have functional positions (Risetdikti, 2016).

One indicator of the competitiveness of a country's higher education is seen from scientific publications produced by universities in the country concerned. Although the number of Indonesian international scientific publications has soared since 2019 (Wahyudi, 2021), but the majority of scientific publications in international journals by certified lecturers are conducted by lecturers of State Universities (SU), lecturers at Private Universities (PU) are still very few (Mesya, 2020).

Meanwhile, when viewed from the comparison of the number of PTN and PTS as data from the Higher Education Database (PDDIKTI) states there are 370 PTN in Indonesia. As for PU, there are 4,043 universities. Likewise with the number of lecturers. According to the national recap of the 2019/2020 semester, even PDDIKTI stated that the number of SU lecturers was only 69,662 lecturers, this figure is quite small when compared to PU lecturers, which is 190,769.

With a large number of PU lecturers, the performance of lecturers in the implementation of the Tri Dharma of Higher Education can be further improved. This happened to most of the PU lecturers in Indonesia, including the PU lecturers at the Jakarta College of Economics (STIE). Researchers have conducted an initial survey through interviews with managers of several STIEs, obtained information that several agencies complained about the dedication of lecturers in teaching, namely the lack of discipline in teaching time, and the delivery of material by lecturers which should be in accordance with the RPS (Semester Lecture Plan). In conducting research and community service, lecturers are considered less enthusiastic about conducting research and community service. Although there are several institutions that provide funds to carry out these activities, but have not been able to encourage lecturers to conduct research and community service.

The results of interviews with several STIE lecturers, give a more or less the same picture, namely lecturers complaining of the current conditions which are very different from the past conditions, currently many demands that they must meet and carry out as a lecturer. In contrast to the old days who only assigned lecturers to teach. And the results of the distribution of questionnaires to several lecturers showed that 53% of respondents answered sometimes on statements for indicators of enthusiasm, 100% of lecturers answered sometimes in answering statements for indicators of dedication, and 90% answered sometimes for statement of absorption indicators (Pranitasari, 2019a).
Based on the interview and the results of the questionnaire above it can be concluded that PU lecturers are still deemed to lack enthusiasm, dedication and absorption in carrying out the Tri Dharma of Higher Education or in other words lecturers lack work engagement.

From the results of an initial survey on a number of PU managers and lecturers, it can be used as an interesting study to study with PU lecturers about the description of work engagement provided by a lecturer, which is a major factor for the development of education today. Work Engagement is one of the conditions that can describe a person’s engagement in achieving optimal performance. Work engagement as a condition in which a person has positive thoughts so that he is able to express himself both physically, cognitively and affective in doing his work. A lecturer can be said to be engaged if he has good performance, brings out the best ideas and a sincere commitment for success in transforming, developing, and disseminating science, technology and art through education, research, and community service (Schaufeli & Baker, 2011).

In Harter et. al., work engagement is described in an explanation as follows: a person’s high emotional and cognitive relationship with work, co-workers, superiors and organizations which ultimately influence the person concerned to give more effort at work (Amstrong & Taylor, 2014). Macey describes work engagement as an individual’s awareness and willingness to focus all of his energy, show personal initiative, willingness to adapt, strive hard and be persistent to achieve organizational goals (Amstrong & Taylor, 2014).

In a survey, five factors were found that influence employee work engagement, namely: 1) an attractive and challenging work environment, 2) learning and growth opportunities, 3) working with good and appropriate people, 4) fair salary, 5) supportive supervisor (Hedger, 2007). The survey results are supported by a survey conducted by (Ketter, 2016) with 75 questions in a questionnaire distributed online (covering six categories of engagement, namely: 1) people they work with, 2) what they do, 3) the availability of growth opportunities, 4) rewards and recognition, 5) the company itself, and 6) the work environment.

According to (Lockwood, 2007, p. 4) work engagement is a complex concept and is influenced by many factors, including the culture in the workplace, organizational communication, managerial style that triggers trust and respect as well as the leadership adopted and the reputation of the company itself. Engagement is also influenced by organizational characteristics, such as a reputation for integrity, good internal communication, and cultural innovation.

The achievements of a university require lecturers who have high work engagement because their existence supports the success and performance of the organization. The creation of work engagement of lecturers will depend on the level of emotional and cognitive attachment to their work and organization. In particular, increasing the level of work engagement with lecturers will form private lecturers who are not only in college to work but furthermore build institutions and even society by carrying out their roles in institutions.
In a survey, five factors were found that influence employee job engagement, namely: 1) attractive and challenging organizational justice, 2) learning and growth opportunities, 3) working with good and right people, 4) fair salary, 5) supportive supervisor (Hedger, 2007). Robinson et. al. conducted a survey on 10,000 NHS employees in the UK Institute for Employment Studies, found the main driver of employee engagement is a sense of feeling valued and involved, which has components such as involvement in decision making, the extent to which employees feel able to voice their ideas, opportunities employees should develop their work and the extent to which the organization is concerned for employee health and well-being. CIPD adds, on the basis of its survey of 2000 employees from across the UK indicating that communication is a top priority for leading employees to engagement (Markos et al., 2010).

Research on work engagement has been carried out by several previous researchers, namely (Luthans & Peterson, 2002) who examined the theoretical understanding of employee work engagement. Then an empirical investigation of the relationship between employee work engagement and manager effectiveness with self-efficacy as a partial mediator on 170 managers in the USA using regression analysis techniques. (Mendes & Stander, 2011) also conducted research on work engagement related to the variables of manager empowerment, job clarity, empowerment, and retention intention on 240 employees in South African chemical organizations using path analysis. (Shu, 2015) with the aim of research to determine the effect of authoritarian leadership and effective leadership on the work engagement of Chinese workers in Taiwan using path analysis techniques.

Work engagement research was also conducted by (Ravikumar, 2013) with the aim of knowing the effect of teamwork, work culture, leadership and compensation on work engagement in small and medium business employees in India using regression analysis techniques. (Mohd et al., 2016) did this study aims to explore the relationship between work engagement and rewards, work environment and work-life balance among employees in Klang Valley Malaysia using regression analysis techniques. (Stanley, 2016) did literature study of the relationship between work environment, creative behavior and work engagement. (Biggs et al., 2014) with the aim of research to determine the effect of leadership development interventions on the work environment, job satisfaction and employee engagement in Australia using multiple regression analysis techniques.

Research on work engagement in education has also been carried out by (Pham-thai et al., 2018) aims to examine the relationship between work engagement, transformational leadership, high-performance human resource practices, climate for innovation, and contextual performance in academics using SEM analysis techniques. (Khun-Inkeeree et al., 2020) researching about student’s engagement. And (Aliyah, 2017) which examines the effect of the work environment, work status and workload on work engagement on 46 private university lecturers at Way Jepara Subdistrict, Lampung with path analysis techniques. (Pranitasari, 2019b) examines the effect of managerial effectiveness, work environment and work team on lecturers' work engagement and (Pranitasari et al., 2019)
examines the influence of managerial effectiveness, work environment and self-development on lecturers' work engagement.

From the results of the survey that has been conducted, a number of research problems can be identified as follows:

1. The spirit of STIE lecturers in conducting research and community service is still lacking. This is due to lecturers who prefer to be preoccupied with teaching.

2. Dedication of lecturers who are still considered lacking in carrying out teaching activities, especially in terms of time discipline, achievement of lecture material according to RPS, development of student learning models, research and community service.

3. Absorption or appreciation of lecturers in teaching, research and community service is still far from satisfactory, this is indicated by the lack of community social activities and development in research and scientific writing.

4. In Indonesia, the management of rank rules is carried out by the government, and there is often a lack of effective internal organizational communication which causes a lack of information to lecturers about opportunities to develop themselves and carry out research and scientific writing.

5. Lack of organizational justice because STIE is owned by individuals who lack the ability to do justice to all lecturers.

6. So far, lecturers' awards are seen as not large, both extrinsically and intrinsically. Extrinsically it depends on the financial condition of the university, but intrinsically it is still not paid attention to by the college management.

4. Lack of managerial effectiveness in managing STIE, in this case played by the Head of Study Program, which is less than optimal in providing encouragement for lecturers to discipline in implementing teaching, developing themselves and inspiring lecturers to work in research and scientific writing.

8. STIE's lack of support in supporting lecturers in developing themselves, such as training support to improve the knowledge and skills of lecturers both inside and outside of tertiary institutions and educational scholarships to a higher level of education.

From the problems above, there are four variables that need to be studied in an effort to increase lecturer work engagement, namely Organizational Internal Communication, Organizational Justice, Intrinsic Rewards, and Self-Development.

**METHOD**

This research was conducted at STIE in East Jakarta with active and accredited status, which is 11 STIE. The study population was all lecturers who had a National Lecturer Identification Number of 377 people and a sample of 200 lecturers, using proportional random sampling technique.
Data collection techniques in this study were to use instruments in the form of questionnaires. The instrument was developed based on reference to several related studies, namely work engagement variable (Schaufeli et al., 2006), (Schaufeli et al., 2006), (Bakker et al., 2011), (Pranitasari, 2019a),(Pranitasari, 2019b), (Pranitasari & Kusumawardani, 2021); Organizational Internal Communication variables (Arcella, 2018), (Daromes, 20016), (Roberts & O’Reilly, 1974), (Greenbaum et al., 1988), (Claudia et al., 2013); Organizational Justice (Indrayani & Suwandana, 2016), (Zafar Iqbal et al., 2017), (Alvi & Abbasi, 2012); Intrinsic Rewards (Nurwulandari & Suwatno, 2018), (Edirisooriya, 2014), (Syahril & Nurbiyati, 2018); self-development (Coates, 2007) (Ueda, 2012) (Pranitasari, 2019a), (Pranitasari et al., 2019).

The indicator variables in this study are:

<table>
<thead>
<tr>
<th>Variable</th>
<th>Indicators</th>
</tr>
</thead>
<tbody>
<tr>
<td>Work Engagement</td>
<td>Spirit at work</td>
</tr>
<tr>
<td></td>
<td>work dedication</td>
</tr>
<tr>
<td></td>
<td>Absorption</td>
</tr>
<tr>
<td>Organizational Internal Communication</td>
<td>horizontal communication</td>
</tr>
<tr>
<td></td>
<td>vertical communication</td>
</tr>
<tr>
<td></td>
<td>the organization's internal communication policy.</td>
</tr>
<tr>
<td>Organizational Justice</td>
<td>distributive justice</td>
</tr>
<tr>
<td></td>
<td>procedural justice</td>
</tr>
<tr>
<td></td>
<td>interactional justice</td>
</tr>
<tr>
<td>Intrinsic Rewards</td>
<td>task completion</td>
</tr>
<tr>
<td></td>
<td>achievement</td>
</tr>
<tr>
<td></td>
<td>autonomy</td>
</tr>
<tr>
<td></td>
<td>personal growth</td>
</tr>
<tr>
<td>Self-Development</td>
<td>Self-assessment</td>
</tr>
<tr>
<td></td>
<td>Reflection activities</td>
</tr>
<tr>
<td></td>
<td>Self-development action</td>
</tr>
</tbody>
</table>

Based on the indicators in Table 1, these indicators were developed into a questionnaire statement to be given to respondents. Respondents gave answers in 5 alternative answers, namely:

5 strongly agree/always
4 agree/often
3 doubtful/sometimes
2 disagree/rarely
1 disagree/never

Questionnaire statements developed from the indicators of each variable are as follows:

**Work Attachment**

1. I have high energy in carrying out teaching, research and community service
2. I am interested in all things related to teaching, research and community service
3. I understand and master all teaching, research and community service tasks
4. I can do my job as a lecturer every day for a long time
5. I am diligent in doing teaching, research and community service assignments, whatever the conditions
6. I try to improve my work from time to time (every semester/year)
7. I give ideas in teaching, research and community service activities
8. I am enthusiastic about carrying out teaching, research and community service tasks
9. I am inspired a lot by my work as a lecturer
10. I am proud of my profession as a lecturer
11. I find teaching, research and community service very interesting
12. I try to keep up with the latest developments in teaching, research and community service
13. I try to improve my teaching skills in facing the challenges that will come
14. I concentrate fully on carrying out my duties as a lecturer
15. I feel happy when carrying out my duties as a lecturer full of totality
16. I feel that time passes very quickly when carrying out my duties as a lecturer
17. I can forget things around me, when I am carrying out my duties as a lecturer
18. I feel engrossed in carrying out teaching, research and community service tasks
19. I find it difficult to escape from my duties as a lecturer
20. I dedicate myself as a lecturer inside and outside the university environment

Organizational Internal Communication

1. I am free to discuss with colleagues
2. I discuss with coworkers
3. I have a good relationship with employees
4. In completing my duties as a lecturer I discuss with colleagues.
5. All lecturers and employees can be invited to discuss about institutional policies that are relevant to their positions
6. Structural position holders have confidence and trust in lecturers and employees
7. Lecturers and employees have confidence and trust in structural position holders
8. Structural position holders consider the information obtained from lecturers and employees to be quite important
9. Structural position holders listen and consider suggestions/opinions from lecturers and employees
10. The Head of Study Program can directly advance my career
11. Lecturers interact and discuss with structural position holders
12. Lecturers provide job-related information to structural position holders
13. I want to progress and develop in this institution
14. I feel needed in this institution
15. All lecturers and employees receive information to improve their ability to coordinate work with other lecturers and employees
16. All employees in the institution feel an atmosphere of openness
17. Institutions provide a platform for communicating with superiors regarding decision-making and processes to achieve institutional goals
18. All lecturers and employees are free to express opinions both to subordinates and superiors
19. Except for confidential information, lecturers and employees easily access information related to their work
20. Employee welfare is important for institutions

**Organizational Justice**
1. Work schedule is given fairly for all lecturers
2. The salary given is in accordance with the position and workload of the lecturer
3. The workload given is fair enough for all lecturers
4. The award I received is fair enough
5. Promotion is determined fairly for all lecturers
6. Sanctions for violation of regulations are given fairly
7. Job decisions are made strictly by the university leadership
8. College leaders try to listen to all problems of lecturers and employees before making decisions.
9. Higher education leaders always seek accurate and complete information to make work decisions.
10. Higher education leaders clarify decisions and provide information when needed by lecturers and employees
11. All work decisions are applied consistently to all lecturers and employees
12. Lecturers and employees are allowed to have an opinion on work decisions that have been made by the university leadership.
13. Higher education leaders treat lecturers and employees well when making job decisions.
14. Higher education leaders are sensitive to the personal needs of each lecturer and employee when making decisions related to work.
15. Higher education leaders show concern for lecturers and employees when making decisions.
16. College leaders always discuss the implications of the job decisions they make.
17. College leadership provides fairness to employment decisions made.
18. College leaders explain very clearly every decision made about employment.

**Intrinsic Award**
1. I am able to complete the given task
2. I can complete the task according to the target that has been set
3. I am able to achieve KPI (key performance index) standards every year
4. In my work I try to be the best
5. I will be even more excited if I am recognized as the best lecturer
6. I take pride in being able to achieve challenging work
7. I prefer to work freely and make decisions without too much supervision
8. I am given the freedom to develop my skills
9. I am given the freedom to develop teaching, research and community service assignments
10. I am willing to increase my efforts as a lecturer to get prizes
11. I get the opportunity to be able to develop skills
12. Universities hold development programs for outstanding lecturers
13. College rewards me if I can be disciplined at work
14. I am motivated to work to earn rewards
15. It is important for me to be appreciated for my contribution to the college
16. I am given the opportunity to participate in determining the method and procedure of the assignment
17. Colleges provide equal opportunities for employees to get promotions

Self-Development

1. I review what I have learned every semester/year
2. I evaluate the implementation of my duties as a lecturer every semester/year
3. I try to make the difficulties that exist in carrying out my duties as a lecturer as learning
4. I set goals for the development of future teaching skills
5. I discuss with my co-workers to improve the achievement of work results
6. I get inputs about teaching from students
7. I ask for input from the leadership regarding the implementation of duties as a lecturer
8. I want to improve the lack of implementation of duties as a lecturer
9. I want to increase my potential
10. I plan the activities I have to do for career development
11. I have a strong desire to continue my studies to a higher level
12. I actively participate in seminars to improve my skills
13. I actively follow the development of knowledge related to the duties of the lecturer
14. I am active in professional organizations to be able to obtain information and develop myself
15. I am willing to spend money to improve my skills/knowledge
16. I actively submit research proposals at universities or Kopertis
17. I apply new experiences to improve my quality and professionalism as a lecturer
18. I try to find relevant teaching materials that can support the material that I will teach so as to facilitate the teaching and learning process
19. I try to study technological developments related to the media used in carrying out my duties as a lecturer

Data analysis technique in this research uses Structural Equation Modelling (SEM), a multivariate analysis technique which is a combination of regression analysis applied to the analysis of latent variables with factor analysis applied to the analysis of indicators (Sanjiwani et al., 2015). The reason for using SEM analysis techniques is because this analysis technique is to be able to find out how the relationships occur between latent variables, besides that it can also find out how the indicators of the latent variables are formed. Which forming indicators are dominant and how strong a latent variable can explain the variation that occurs in the forming indicators. This will deepen the discussion that can be given in this study. Furthermore, data processing uses Partial Least Square Structural Equation Model (PLS-SEM) software.

Analysis of the measurement model or outer model Analysis of the outer model is done by looking at:
1. Indicator validity

a. Convergent validity, namely the value of the factor loading on the latent variable with its indicators. Convergent validity is seen from the factor loading value. In accordance with the rule of thumb, the factor loading value is 0.5 (Hair, 2017) (Monecke and Leisch, 2012) but some experts say the minimum rule is 0.4 (Haryono, 2017). In addition, 0.5 Average Variance Extracted (AVE) was used (Jogiyanto, 2015).

b. Discriminant validity, namely the cross factor loading value to find out whether the construct has an adequate discriminant, by comparing the factor loading on the intended construct to be greater than the factor loading with other constructs.

2. Construct reliability, namely the measurement or measurement of measuring instruments that have consistency when done with the measuring instrument is done repeatedly. Evaluation of the value of construct reliability was measured by the value of Cronbach's alpha and composite reliability. The rule of thumb for Cronbach's alpha value is 0.6 and composite reliability is 0.7.

Analysis of the structural model or inner model includes the path coefficient between constructs and the Goodness of Fit Index (GoF). Goodness of Fit (GoF), describes the total fit of the model which is calculated from the squared residual of the predicted model compared to the actual data.

The constellation model between variables of this study can be seen in Figure 2.

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**Figure 2**
Constellation model of research variables

**FINDINGS**

Data on the characteristics of respondents is shown in the following table:
Table 2
Characteristics of respondents

<table>
<thead>
<tr>
<th>Characteristics of respondents</th>
<th>percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td></td>
</tr>
<tr>
<td>Man</td>
<td>52.5%</td>
</tr>
<tr>
<td>Woman</td>
<td>47.5%</td>
</tr>
<tr>
<td>Age</td>
<td></td>
</tr>
<tr>
<td>&lt; 30 years</td>
<td>0.5%</td>
</tr>
<tr>
<td>30 – 40 years</td>
<td>26.5%</td>
</tr>
<tr>
<td>41 – 50 years</td>
<td>39%</td>
</tr>
<tr>
<td>51 – 60 tahun</td>
<td>26%</td>
</tr>
<tr>
<td>&gt; 60 years</td>
<td>8%</td>
</tr>
<tr>
<td>Years of professional experience</td>
<td></td>
</tr>
<tr>
<td>≤ 3 years</td>
<td>7.5%</td>
</tr>
<tr>
<td>3 – 10 years</td>
<td>19%</td>
</tr>
<tr>
<td>11 – 20 years</td>
<td>38%</td>
</tr>
<tr>
<td>21 – 30 years</td>
<td>19.5%</td>
</tr>
<tr>
<td>&gt; 31 years</td>
<td>16%</td>
</tr>
<tr>
<td>Education</td>
<td></td>
</tr>
<tr>
<td>Master Degree</td>
<td>92%</td>
</tr>
<tr>
<td>Doctoral Degree</td>
<td>8%</td>
</tr>
</tbody>
</table>

Outer Model Analysis

Construct Validity Testing

Convergent validity is the value of factor loading on latent variables with indicators with a rule of thumb ≥ 0.5. In this study, there are some invalid manifest variables, so the manifest variable must be excluded from the model. Besides looking at the loading factor, convergent validity also sees AVE with a rule of thumb ≥ 0.5. From the results of the AVE value all constructs have a value of ≥ 0.5, so it can be concluded that the construct is valid.

Table 3
Average variance extracted

<table>
<thead>
<tr>
<th>Variable</th>
<th>AVE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Work Engagement (Y)</td>
<td>0.678</td>
</tr>
<tr>
<td>Organizational Internal Communication (X1)</td>
<td>0.507</td>
</tr>
<tr>
<td>Organizational Justice (X2)</td>
<td>0.506</td>
</tr>
<tr>
<td>Intrinsic Rewards (X3)</td>
<td>0.538</td>
</tr>
<tr>
<td>Self-Development (X4)</td>
<td>0.501</td>
</tr>
</tbody>
</table>

Discriminant Validity is the value of cross factor loading to determine whether the construct has adequate discriminant, by comparing the loading value of the intended construct must be greater than the value of loading with other constructs. In this study, there are several invalid manifest variables, so the manifest variable must be removed then the data is processed again until all manifest variables are declared valid.
Construction Reliability Testing

Evaluation of construct reliability values is measured by Cronbach's alpha value and composite reliability. Rule of thumb for Cronbach's alpha value $\geq 0.6$ and composite reliability $\geq 0.7$. Cronbach's alpha value and composite reliability concluded that the construct has good reliability, as presented in Table 4.

Table 4
Composite reliability and cronbachs alpha

<table>
<thead>
<tr>
<th>Construct</th>
<th>Composite Reliability</th>
<th>Cronbachs Alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td>Work Engagement (Y)</td>
<td>0.968</td>
<td>0.971</td>
</tr>
<tr>
<td>Organizational Internal Communication (X1)</td>
<td>0.901</td>
<td>0.918</td>
</tr>
<tr>
<td>Organizational Justice (X2)</td>
<td>0.924</td>
<td>0.934</td>
</tr>
<tr>
<td>Intrinsic Rewards (X3)</td>
<td>0.928</td>
<td>0.937</td>
</tr>
<tr>
<td>Self-Development (X4)</td>
<td>0.898</td>
<td>0.916</td>
</tr>
</tbody>
</table>

Source: Data processed, 2020

From the analysis of the outer model it can be obtained dominant indicators and instruments on each variable presented in Table 5.

Table 5
Dominant loading factor

<table>
<thead>
<tr>
<th>Variable</th>
<th>Indicator with a dominant loading factor</th>
<th>Instrument with a dominant loading factor</th>
</tr>
</thead>
<tbody>
<tr>
<td>Work Engagement (Y)</td>
<td>Vigor</td>
<td>have high energy in carrying out teaching, research and community service.</td>
</tr>
<tr>
<td>Organizational Internal Communication (X1)</td>
<td>vertical communication</td>
<td>structural incumbents assesses that the information obtained from lecturers and employees is quite important.</td>
</tr>
<tr>
<td>Organizational Justice (X2)</td>
<td>procedural justice</td>
<td>College leaders clarify decisions and provide information when needed by lecturers and employees</td>
</tr>
<tr>
<td>Intrinsic Rewards (X3)</td>
<td>confession</td>
<td>colleges give rewards if they are disciplined at work</td>
</tr>
<tr>
<td>Self-Development (X4)</td>
<td>self-assessment</td>
<td>lecturer set goals for developing future teaching skills</td>
</tr>
</tbody>
</table>

Inner Model Analysis

Analysis of inner models in PLS includes path coefficients between constructs and the Goodness of Fit Index (GoF). The path coefficient in this study is presented in Figure 4.

Goodness of Fit (GoF), describes the overall suitability of the model calculated from the squared residuals of the predicted model compared to the actual data. Goodness of Fit (GoF) value was obtained 0.505, according to Tenenhau (Hussein, 2015), a GoF value of 0.505 including a large GoF.
Hypothesis test

In the evaluation of the structural model above an evaluation is carried out by looking at the significance of the relationship between constructs shown by the t-statistic value by looking at the output of the bootstrap. Where is the variable that has t-statistic value $\geq 1.96$ (Haryono, 2017) is said to be valid or significant. The bootstrap output can be seen in Figure 5.

Based on Figure 5, there are 2 pathways that are not significant, namely the effect of organizational internal communication ($X_1$) on self-development ($X_4$) and the effect of organizational justice ($X_2$) on self-development ($X_4$) (Table 3). Then the 2 paths are removed and data processing is repeated, and results are obtained as presented in Figure 6.

Hypothesis test results from Figure 5, are presented in Table 4 below:
Table 6  Summary of hypothesis test results

<table>
<thead>
<tr>
<th>No</th>
<th>Hypothesis</th>
<th>Statistical Test</th>
<th>Decision</th>
<th>Conclusions</th>
</tr>
</thead>
</table>
| 1  | There is a positive direct effect on Organizational Internal Communication on Work Engagement | $H_0 : \beta_1 \leq 0$  
$H_1 : \beta_1 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 2  | There is a positive direct effect on Organizational Justice on Work Engagement | $H_0 : \beta_2 \leq 0$  
$H_1 : \beta_2 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 3  | There is a positive direct effect of Intrinsic Rewards on Work Engagement | $H_0 : \beta_3 \leq 0$  
$H_1 : \beta_3 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 4  | There is a positive direct effect of Self-development on Work Engagement | $H_0 : \beta_4 \leq 0$  
$H_1 : \beta_4 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 5  | There is a positive direct effect on Organizational Internal Communication on Organizational Justice | $H_0 : \beta_5 \leq 0$  
$H_1 : \beta_5 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 6  | There is a positive direct effect on Organizational Internal Communication on Intrinsic Rewards | $H_0 : \beta_6 \leq 0$  
$H_1 : \beta_6 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
| 7  | There is a positive direct effect on Organizational Internal Communication on Self-Development | $H_0 : \beta_7 \leq 0$  
$H_1 : \beta_7 > 0$ | $H_0$ received  
or $H_1$ rejected | Not empirically tested there is a positive direct effect |
| 8  | There is a positive direct effect of Organizational Justice on Self-Development | $H_0 : \beta_8 \leq 0$  
$H_1 : \beta_8 > 0$ | $H_0$ received  
or $H_1$ rejected | Not empirically tested there is a positive direct effect |
| 9  | There is a positive direct effect of Organizational Justice on Intrinsic Rewards | $H_0 : \beta_9 \leq 0$  
$H_1 : \beta_9 > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |
|    | There is a positive direct effect on Intrinsic Rewards on Self-Development | $H_0 : \beta_{10} \leq 0$  
$H_1 : \beta_{10} > 0$ | $H_0$ rejected  
Or $H_1$ received | There is a positive direct effect |

The indirect effects between latent variables are summarized in the table below
Table 7
Indirect effects

<table>
<thead>
<tr>
<th>No.</th>
<th>Indirect path</th>
<th>Indirect Path Coefficient</th>
<th>T Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Organizational Internal Communication (X₁) → Organizational Justice (X₂) → Work Engagement (Y)</td>
<td>-0.521</td>
<td>7.697</td>
</tr>
<tr>
<td>2</td>
<td>Organizational Internal Communication (X₁) → Organizational Justice (X₂) → Intrinsic Rewards (X₃) → Self-Development (X₄) → Work Engagement (Y)</td>
<td>0.059</td>
<td>3.137</td>
</tr>
<tr>
<td>3</td>
<td>Organizational Internal Communication (X₁) → Intrinsic Rewards (X₃) → Self-Development (X₄) → Work Engagement (Y)</td>
<td>0.082</td>
<td>3.605</td>
</tr>
<tr>
<td>4</td>
<td>Organizational Internal Communication (X₁) → Organizational Justice (X₂) → Intrinsic Rewards (X₃) → Work Engagement (Y)</td>
<td>0.095</td>
<td>3.003</td>
</tr>
<tr>
<td>5</td>
<td>Organizational Internal Communication (X₁) → Intrinsic Rewards (X₃) → Work Engagement (Y)</td>
<td>0.131</td>
<td>3.216</td>
</tr>
<tr>
<td>6</td>
<td>Organizational Justice (X₂) → Intrinsic Rewards (X₃) → Self-Development (X₄) → Work Engagement (Y)</td>
<td>0.078</td>
<td>3.102</td>
</tr>
<tr>
<td>7</td>
<td>Organizational Justice (X₂) → Intrinsic Rewards (X₃) → Work Engagement (Y)</td>
<td>0.125* (mediation variables make a significant contribution)</td>
<td>3.063</td>
</tr>
<tr>
<td>8</td>
<td>Intrinsic Rewards (X₃) → Self-Development (X₄) → Work Engagement (Y)</td>
<td>0.270</td>
<td>6.786</td>
</tr>
</tbody>
</table>

In Table 5 it can be seen that the variables that provide a greater contribution than the direct influence are the variables of Intrinsic Rewards as a mediator of the work environment and Organizational Justice.

**DISCUSSION**

The effect of organizational internal communication on work engagement

The results of hypothesis testing in this study indicate that the organization's internal communication is empirically tested to have a direct effect on work engagement of 0.269. The results of this study are in line with the results of research by (Markos et al., 2010), (Balakrishnan & Masthan, 2013), (Hayase, 2009), (İnce & Gül, 2011) which state that organizational internal communication has a significant effect on work engagement.

Organizational internal communication affects the work engagement of lecturers indirectly, namely through organizational justice variables, intrinsic rewards, and self-development. Based on Table 7 above, it can be seen that the role of organizational justice variables, intrinsic rewards, and self-development as mediating variables between organizational internal communication and work engagement has a significant effect, but does not provide a path coefficient that is greater than the direct effect.
The organization's internal communication has a dominant indicator of vertical communication and the instrument that has a dominant loading factor is the statement of structural position holders assessing that the information obtained from lecturers and employees is quite important. This means that to increase the work engagement of lecturers, it can be done through increasing internal communication, especially in terms of vertical communication, namely communication between leaders and subordinates. With effective communication and mutual trust between leaders and subordinates, it will increase the comfort of lecturers in working, information from lecturers is conveyed properly and lecturers also trust leaders who listen to lecturers' complaints. With the comfort in communicating vertically, it will increase the work engagement of lecturers.

**The effect of organizational justice on work engagement**

Organizational justice has a positive direct effect of -0.688 on lecturers' work engagement. The direct effect of organizational justice on negative work engagement caused by primary data filling by respondents regarding perceptions of organizational justice in institutions is very low and respondents' perceptions of work engagement tend to be high. So the results of this study contradict the results of previous studies, conducted by Dwitya (2018), Indrayani & Suwandana (2016), Handayani et al., (2015), Wongan, (2014) which resulted in the conclusion that organizational justice affects employee work engagement.

The dominant indicator on the organizational justice variable is procedural justice and the instrument that has the dominant factor loading is the statement of the university leadership clarifying decisions and providing information when needed by lecturers and employees.

Procedural justice is the perception of fairness of the procedures used to make decisions so that every member of the organization feels involved in it. Greenberg in (Ansari et al., 2007) say that one of the significant problems of procedural justice is the behavior of the leader of the decision maker towards the individuals who are affected by the decision. The honest and kind attitude of the managers towards the people affected by the decision, timely feedback on the decisions taken, with respect to the rules are counted among the basic indicators of procedural fairness evaluation.

Organizational justice also affects the work engagement of lecturers indirectly (Table 7), the role of the intrinsic reward variable and self-development as a mediating variable has a positive and significant effect. This means that the perception of intrinsic appreciation and motivation for self-development of the lecturers neutralizes the perception of the lecturers on organizational justice. So it can be said that intrinsic rewards and self-development are effective as mediating variables.

**The effect of intrinsic rewards on work engagement**

Intrinsic rewards have a direct positive effect on work engagement of 0.435. The results of this study are in line with the results of research by Rafiq et al., (2012), Syahril & Nurbiyati, (2018), Edirisooriya, (2014), Gohari et al., (2013) who concluded that intrinsic rewards have a significant effect on work engagement.
Intrinsic rewards have a dominant indicator is recognition and an instrument that has a dominant factor loading is a statement that universities provide rewards if the lecturer is disciplined at work. This means that lecturers' work engagement can be further enhanced through an intrinsic reward program set by the institution, namely the existence of awards for lecturers who are disciplined in carrying out their duties.

With the recognition or award from the institution for disciplined lecturers, it will increase the motivation of lecturers in carrying out the obligations of implementing the Tridharma of Higher Education, namely in teaching, research and community service. And with the increasing motivation of lecturers in carrying out their duties, it will increase the work engagement of lecturers.

Intrinsic rewards indirectly affect work engagement through the lecturer's self-development with a magnitude of 0.270. The intrinsic rewards will motivate lecturers to do self-development so that they can carry out their duties better, and finally, with high motivation in carrying out tasks and self-development, lecturers' work engagement will increase.

The effect of self-development on work engagement

Self-development has a direct positive effect of 0.420 on work engagement. The results of this study are in line with research (Amstrong & Taylor, 2014), (Ueda, 2012), (Hameed, Abdul, 2011), (Pranitasari et al., 2019), (Pranitasari, 2019a) which also concluded that employee self-development affects work engagement.

The dominant indicator in this variable is self-assessment and the instrument that has the dominant loading factor is the lecturer's statement setting the goal of developing future teaching abilities. Lecturers who routinely conduct self-assessments and are followed by setting plans to develop teaching skills will be able to increase lecturers' work engagement.

This has been supported by several STIEs who routinely evaluate teaching lecturers (EDOM) which are carried out by students every semester. The results of the EDOM are returned to the lecturer concerned to be used as input for improving teaching abilities.

The results of the EDOM can also be used as a basis for leadership to make decisions on future lecturer development plans.

Based on the characteristics of the respondents in this study, the majority of respondents have the rank of Lecturer and the majority have a working period of more than 10 years, which means that respondents do self-development well so that they have good work engagements as well.

The effect of organizational internal communication on organizational justice

Organizational internal communication has a positive direct effect of 0.758 on organizational justice. (İnce & Gül, 2011), (Azhariman, 2014), (Yulianti, 2016) conclude that the research results are in line with the results of this study, namely...
organizational internal communication affects a person's perception of procedural justice which is one indicator of fairness. organization.

The most dominant indicator in the organization's internal communication is vertical communication and the instrument that has a dominant loading factor is the statement of structural position holders assessing that the information obtained from lecturers and employees is quite important. While the dominant indicator on the organizational justice variable is procedural justice and the instrument that has the dominant factor loading is the statement of the university leadership clarifying decisions and providing information when needed by lecturers and employees.

From the dominant indicators of the two variables, it can be concluded that with effective vertical communication between leaders and lecturers, namely the trust from both parties, this affects procedural justice set by the institution, namely by providing clarification and information from the leadership to lecturers.

**The effect of organizational internal communication on intrinsic rewards**

Organizational internal communication has a positive direct effect of 0.303 on intrinsic rewards. The results of this study are in line with the results of Gilbert's research in (Arcella, 2018) and James in (Huma Haroon & Malik, 2016) who also concluded that organizational internal communication has a significant effect on the intrinsic rewards given by the organization.

In determining the intrinsic reward policy for lecturers, it is necessary to have open and effective internal communication including horizontal and vertical communication. Due to the need for socialization regarding the policy of giving intrinsic rewards by universities. In addition, there is also a need for openness in giving intrinsic rewards.

Organizational internal communication affects the intrinsic rewards of lecturers also indirectly and significantly by being mediated by organizational justice variables with a large effect of 0.22 (Table 7). The direct effect of organizational internal communication on intrinsic rewards is greater than through organizational justice.

**The effect of organizational justice on intrinsic rewards**

Organizational justice has a positive direct effect of 0.288 on intrinsic rewards. This means that the better the justice policy in the organization will provide a comfortable working situation for lecturers so as to increase the work motivation of lecturers in carrying out their duties better and ultimately will allow lecturers to obtain intrinsic rewards. The results of this study are in line with the results of research by (Kholis, 2018), (Shu, 2015), (Tett et al., 2005), show a positive relationship between organizational justice and procedural justice and distributive justice.

Organizational justice with the dominant indicator of procedural justice and the instrument that has the dominant factor loading is the statement of the university leadership clarifying decisions and providing information when needed by lecturers and employees. While intrinsic rewards have the dominant indicator is recognition and the instrument that has a dominant loading factor is the statement that universities provide...
Intrinsic rewards have a direct positive effect of 0.644 on self-development. Research by Koen coro et al. in Syahril and Nur biyati (2018) and Zhou et al., (2011) also concludes the same results as this study, namely that intrinsic rewards have a direct effect on self-development.

The intrinsic rewards of lecturers include task completion, achievement, autonomy, personal growth and recognition. In this case, the dominant indicator in recognition and the dominant loading factor is found in the statement that the university provides rewards if the lecturer is disciplined at work. The existence of an award program for lecturers who are disciplined in carrying out their duties will motivate lecturers to always improve their abilities and skills in terms of teaching, research and community service.

**CONCLUSION**

Organizational internal communication has a direct positive effect on work engagement. This means that the better the organization's internal communication which is indicated by good vertical communication, it will further increase the work engagement of lecturers. Organizational justice has a direct negative effect on lecturers' work engagement. This means that the better the application of justice in the organization which is indicated by procedural justice, it will reduce the work engagement of lecturers. Intrinsic rewards have a direct positive effect on work engagement. This means that the better the intrinsic reward program set by the institution to the lecturers with an indication of recognition or reward for the lecturers who are disciplined in their work, the greater the work engagement of the lecturers. Self-development has a direct positive effect on work engagement. This means that the greater the motivation of lecturers in carrying out self-development indicated by the existence of self-assessment by always setting goals for developing teaching abilities, it will increase work engagement. Organizational internal communication has a direct positive effect on organizational justice. This means that the more effective internal communication within the organization, which is indicated by good vertical communication, it will increase organizational justice. Organizational internal communication has a direct positive effect on intrinsic rewards. This means that the more effective the organization's internal communication, which is indicated by good vertical communication within the organization, it will increase the intrinsic reward program policy. Organizational justice has a direct positive effect on intrinsic rewards. This means that the better the justice policy in the organization which is indicated by procedural justice, it will improve the organization in determining the intrinsic reward policy for lecturers. Intrinsic rewards
have a direct positive effect on self-development. That is, the better the intrinsic reward program given by the institution to lecturers will increase the motivation of lecturers to carry out self-development.

From the results of this study, it can be suggested for universities to increase direct involvement by improving internal communication, especially in vertical communication, namely the existence and trust between structural position holders and lecturers as well as the existence between lecturers and office holders to interact and communicate with each other to provide information, suggestions/opinions on working conditions and knowledge development. Organizational justice is still needed to increase lecturers’ work engagement through intrinsic rewards, especially in providing recognition through lecturer participation, system rewards, and promotions.

The limitation of this research is that it only looks at factors related to work engagement in terms of organizational culture. There are still many factors that determine work engagement from the other side, so it is necessary to carry out ongoing research on work engagement from other factors.

REFERENCES


https://doi.org/10.1037/A0034508


https://doi.org/10.1177/0893318988002002008


https://doi.org/10.1080/09585192.2011.637072

https://doi.org/10.30659/jikm.6.1.31-45


https://doi.org/10.18535/fjsshi/V3i3.01


