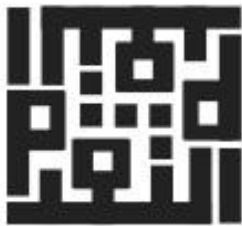


## Relevance of Key Performance Indicators and Islamic Higher Educations Reputation

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### ABSTRACT

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The university ranking is an achievement indicator based on reputation, especially global reputation. The objectives of this study are (1) To determine the relevance of Key Performance Indicators (KPI) and PTKINs' reputation based on SMS and Webometrics ranking; (2) To find out the correlation between KPI and PTKINs' Reputation. This study uses mixed methods or integration of quantitative and qualitative research. The research objects were 17 PTKINs. For the analysis technique, it uses person correlation and explorative analysis. The results showed that of 51 KPI criteria, only one was relevant to the reputation of PTKINs based on the SMS ranking. In contrast, there are 13 KPI criteria that fit PTKINs' reputation based on Webometrics ranking. KPI does not correlate with PTKINs' reputation based on SMS ranking, while KPI correlates with PTKINs' reputation based on Webometrics ranking. For this reason, a policy is needed to synchronize KPI with WCU standards that have been recognized globally. While the implementation of ranking based on SMS needs to be reviewed because it does not reflect PTKINs' reputation.

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### Introduction

Higher education institutions are often referred to as professional organizations operated by values and norms related to academia (Reddy, Xie, and Tang, 2016). Therefore, education is an effective tool to develop the scientific and technological capabilities needed to improve the standard of living of the world economy (Ding and Zeng, 2015). Several related studies (Campbell, 2019; Jabnoun, 2015; Yaisawarnng & Ng, 2014; Kantola &

Kettunen, 2012) have examined the performance of higher education institutions, the relationship between higher education reform and economic performance, curriculum development, student assessment, and the job market. While other researchers specifically examine the internationalization of the higher education sector, ranking universities, building world-class universities, collaborative research, and others (Estera & Shahjahan, 2019; Doğan, G., & Al, 2018; Daraio, Bonaccorsi, & Simar, 2015; Millot, 2015).

In today's globalized climate, higher education is under intense pressure for change, and university reform agendas worldwide have emerged from the crisis faced by higher education in various countries with different cultures and political situations (Altbach, Yudkevich, and Rumbley, 2015). Globalization has brought higher education into a new world, a world of change, instability, and ambiguity caused by an increasingly integrated world economy, technology, international knowledge networks, and other forces beyond the control of higher education institutions (Mense et al., 2018). Therefore, higher education must adapt to globalization.

Globalization has implications for improving the quality of education, access to education, accountability, and education authorities. Gao, (2017) argues that the vital function of education in this global era has brought consequences in the management of education, especially facing market pressures that demand higher education with good quality. In a global environment, competition between

universities is increasing, so universities offer good quality education (Junusi, Musahadi and Yuningrum, 2019). Likewise, the management of State Islamic Higher Education (Perguruan Tinggi Keagamaan Islam Negeri, PTKIN) is faced with the same challenges. According to Ismail Sukardi (2017), "PTKINs' strategic issues and policy include (1) catching up with the quality of education and (2) higher education management, by being oriented to lecturers and students and increasing the authority of higher education. This policy is principally oriented towards improving the quality of PTKINs."

The ranking of universities worldwide is one indicator of improving the quality of higher education (Reddy, Xie and Tang, 2016). Meanwhile, reputation can be used to measure the quality and academic performance of higher education institutions (Sidorenko and Gorbatova, 2015). Therefore, the ranking has a relationship with the reputation of the university. However, until now, not a single PTKIN has been included in the world's top 100 universities, as shown as follows.

**Table 1.**

*University Ranking according to Webometrics version, 4 ICU, QS Universities Ranking and Times Higher Education (THE) in 2018.*

<b>Universities</b>	<b>WEB</b>	<b>4ICU</b>	<b>QS</b>	<b>THE</b>
University of Indonesia	856	277	57	82
Bandung Institute of Technology	1132	331	73	164
Gadjah Mada University	845	401-410	74	251-300
Bogor Agricultural University	1288	751-800	130	251-300
UIN Syarif Hidayatullah	4006	2511	-	-
UIN Sunan Kalijaga	4196	3135	-	-
UIN Maulana Malik Ibrahim	4430	3219	-	-
UIN Sunan Ampel Surabaya	4731	2946	-	-
UIN Walisongo	4406	4116	-	-

UIN Alauddin	5012	5747	-	-
UIN Sunan Gunung Djati	5583	5864	-	-
UIN Ar-Raniry	8393	-	-	-
UIN Sulthan Syarif Kasim	4248	4254	-	-
UIN Raden Fatah	5635	5703	-	-
UIN Antasari	11554	-	-	-

Sources: web Webometrics, 4ICU, QS, THE in 2020

Table 1 shows that several PTKINs are included in the Webometrics and 4ICU rankings. Still, based on the QS universities ranking and Times Higher Education (THE) version, none of the PTKIN is included in the world ranking universities. For this reason, PTKIN must take strategic steps to support the achievement of PTKIN's vision towards a world-class university (WCU) to continue to exist in the global environment.

Key Performance Indicators (KPI) are part of the strategic plan used to measure the success of PTKINs. The KPI is structured to improve the quality and reputation of education, while the targets in the KPI serve as a measure of PTKINs' success. In reality, the performance indicators of PTKIN has not been able to increase the WCU rankings, especially the QS and THE versions (table 1). Since 2016 the Directorate of Islamic Higher Education has established a policy on ranking PTKINs based on the Strategic Management System (SMS). PTKINs' ranking is a reflection of its quality and reputation. Therefore, the purpose of this research is (1) knowing the relevance of performance indicators to PTKINs' reputation and (2) knowing the correlation of performance indicators with PTKINs' reputation.

The related studies, such as Renny (2016) concluded that implementation of budget

absorption for performance indicators affects BPPK budget realization. The implementation of budget absorption for performance indicators encourages improvements made by work units within the BPPK in budget management. In addition, the implementation of KPI has an impact on the emergence of leadership commitment and concern for budget realization. Likewise, Permana (2018) shows that there are three stages in designing a comprehensive higher education performance measurement system. Based on the results of the performance measurement system design, it can be seen that the greater the achievement of performance gains at the Input stage, the greater the impact on the improvement of the overall performance of higher education institutions. Pratiwi, Purwanggono, & Bakhtiar (2017) also state that based on the results of the study, there are 15 Undip (University of Diponegoro) Performance Indicators that are not in line with the QS. Again, there are 17 QS sub-criteria that are not in line with the KPI. The internationalization criterion is the most crucial criterion compared to the other 13 QS assessment criteria. While a study by Nursito, Julianto, & Nugroho (2013) shows there is an antecedent of university reputation with the results of student relations with universities. Where the quality of educational services and the organizational culture of higher education

affect the university's reputation. Several studies have shown that reputation plays a central role in higher education management. Quintal, Mazzarol, & Soutar (2012) also state that a strong reputation is crucial for higher education institutions to compete successfully in the global market.

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### Literature Review

#### Key Performance Indicators (KPI)

Gosselin (2005) stated performance indicators can be defined as values used to measure, compare, and manage the organization's overall performance. Performance indicators can include quality (Pan and Pan, 2010), cost (Choong, 2013), financial (Ameer and Othman, 2012), flexibility (Santos-Vijande, López-Sánchez and Trespalacios, 2012), reliability delivery (Toor and Ogunlana, 2010), employee satisfaction (Den Hartog et al., 2013), customer satisfaction (Setijono and Dahlgard, 2007), safety (Huang et al., 2010), and learning and growth (Santos-Vijande, López-Sánchez and Trespalacios, 2012).

Some studies have discussed performance indicators, and most organizations use these performance indicators to measure and manage organizational performance. The measure is a factor used to determine organizational performance defined by key performance indicators (Diana Heckl and Moerhiono (2014) "Performance measurement is used as a basis for assessing the success and failure of implementing activities in accordance with the goals and objectives that have been set to realize the vision and mission of government agencies. The measurement

results from a systematic assessment and is based on indicators of inputs, outputs, benefits, and impacts. The assessment is inseparable from the process which is the activity of managing inputs into outputs or assessments in the process of formulating policies/programs/activities that are considered important and affect the achievement of goals and objectives."

The Key Performance Indicators according to the Regulation of the Minister of State for Empowerment of State Apparatus Number PER/20/M.PAN/11/2008 is "a measure of the success of a government agency's strategic goals and objectives. The objectives of determining the KPI for each government agency are (1) To obtain important and necessary performance information in carrying out good performance management and (2) To obtain a measure of success from the achievement of an organization's strategic goals and objectives that are used to improve performance and performance accountability." In this study, the performance indicators for PTKINs include increased access, improved service quality, improved quality of lecturers and staff, increased quality of research results, and increased innovation results.

#### Reputation and Global Universities Rankings

Reputation is a broad concept in organizational theory in economics, sociology, and business, with various definitions (Lee and Van Ryzin, 2019). Fombrun & Gardberg (2000) define reputation as a collective construct that describes the aggregate perception of multiple stakeholders about the company's performance. Again, Carpenter & Krause,

(2012) define bureaucratic reputation as a symbolic set of beliefs about an organization's unique capacities, roles, and obligations, where these beliefs are embedded in an audience network. Fombrun & Shanley (1990), argues that reputation is the overall form that describes the assessment and attitude of various individuals who are interested in the condition of an organization. Meanwhile, according to Van Vught, (2008) reputation in higher education is defined as the image (quality, influence, trust) it has in the eyes of others. Reputation is a subjective reflection of an institution's various actions to create an external image.

Reputation has long been a significant aspect in higher education, with aspects of quality and prestige being necessary to “differentiate” among other higher education institutions (van Vught, 2008) which involves a shift from local competition to global competition among universities (Marginson, 2014). One of the main aspects of reputation enhancement is a global-based assessment (Hazelkorn, 2011). The global universities rankings (GUR) assessment results have become one of the most awaited academic events worldwide because each party is interested in referring to the ranking of higher education institutions. Therefore, the effect of the ranking is comprehensive (Marginson, 2014; Hazelkorn, 2011).

GUR has had a lot of impact around the world. Van Vught (2008) studies that higher education institutions compete for reputation. One of the dynamics is university rankings that could accelerate competition among higher education institutions. Their reputation is usually

characterized by attracting talented students, scholars, and research resources. The behavior of higher education institutions is triggered by competition for the institution's reputation (Van Vught, 2008). This implies that a "world-class" reputation is earned if higher education institutions, as stated by Marginson (2010), are included in the list of the top 200 or 500 as the definition of WCU. Naturally, all universities in developed countries are willing to maximize their rankings in that category, and all developing countries, and all leading research universities in those countries, want to be part of the "world-class" category and to rise as high as possible (Marginson, 2010).

In higher education, competing for global rankings to improve the reputation of universities is a critical concern for leadership in strategic decision-making. Measurement of PTKINS' reputation uses national and global rankings. Nationally, it usually uses SMS ranking with four indicators, such as (a) Good university governance with the criteria: facilities, resources, and supporting staff 25%; teaching 20%; leadership, management, and governance 40%; and research, publication, community services and cooperation 15%; (b) University's performance improvement with criteria: teaching improvement 45%, improvement of facilities, resources, and supporting staff 12.5%; socioeconomic impacts 2.5%; excellence in leadership, management, and governance 20%; and improvement of research, publication, community services and cooperation 20%; (c) Competitive advantages university with the following criteria: quality teaching 35%; competitive socioeconomic impacts 20%; fiber quality of research, publication, community

services and cooperation 45%; and (d) Global recognition university with the criteria: international outlook in socioeconomic impacts 45%; international outlook in teaching 20%; and international outlook in research, publication, community services and cooperation 35% (Darmalaksana, 2016).

Meanwhile, to measure global reputation, it uses Webometrics with four indicators, among others: "(a) Presence (20%) is the number of web pages hosted in the main webdomain (including all subdomains and directories) of the university indexed by the Google search engine, (b) Impact (50%) is the quality of content evaluated through a

virtual referendum by counting all external links received by the University's web domain from third parties, (c) Openness (15%) is the number of Adobe Acrobat (.pdf) document files, Adobe PostScript (.ps, .eps), Microsoft Word (.doc, .docx) and Microsoft Powerpoint (.ppt, .pptx) which are online/open under the domain of university websites caught by search engines (Google Scholar), (d) Excellence (15 %) is the number of scientific articles published by the university which are indexed in the Scimago Institution Ranking." Therefore, the theoretical framework of this study is described as follows.

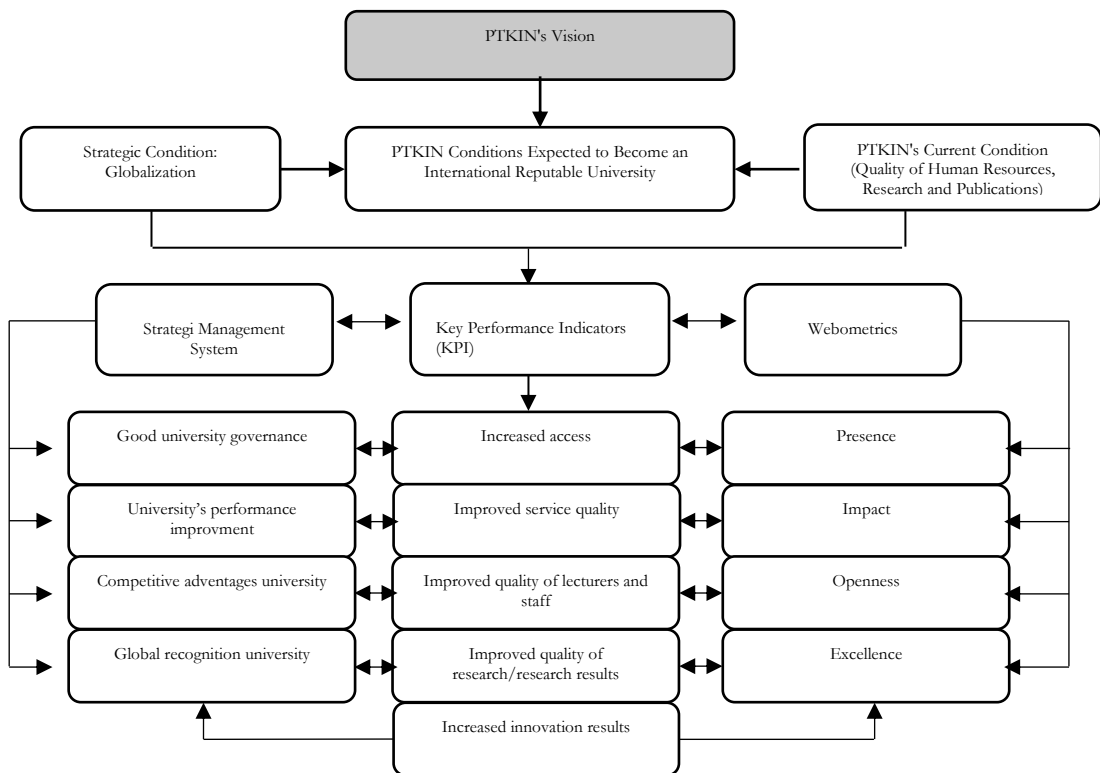


Figure 1: Research framework

## Research Method

This study uses multiple methods (mixed methods), one of the three main research paradigms, namely quantitative research, qualitative research, and mixed methods research (R. Burke Johnson, Anthony J. Onwuegbuzie, 2007). In the mixed methods, researchers collect, analyze, integrate findings, and conclude with qualitative and quantitative approaches in research (Tashakkori and Creswell, 2007). The correlative investigative model from McMillan Sally & Schumacher (2014) is used for the quantitative approach. This model is one of the most commonly applied models in the related study. Correlative investigative models are used to determine correlations between various educational and social research variables and aim to identify the presence or degree of coordinated change between two or more variables. While the qualitative approach of Tashakkori and Creswell (2007) provides a collection of data and allows researchers to explore findings and thereby increase the reliability of research findings.

The data used in the study are secondary, i.e., documents or archives related to the 2018 Key Performance Indicators report and the results of the 2018 SMS Implementation survey at the Directorate of Islamic Higher Education, Ministry of Religious Affairs, and from the 2018 Webometrics rankings. The research population is PTKINs (State Islamic Higher Educations) under the Ministry of Religious Affairs. Meanwhile, the research sample used the purposive random sampling technique. Purposive Random Sampling is a sampling technique with specific considerations (Singarimbun, 2008). In this study, the research samples were 17 PTKINs, in this regards, State Islamic University (UIN), registered in the Diktis ranking based on SMS and Webometrics. The technical analysis used is Pearson correlation with the help of the SPSS program and explorative analysis.

Operationalization of research variables is needed to determine the types and indicators of the variables involved in this study. In more detail, the operationalization of variables in this research can be seen in as follows:

**Table 2.**  
*Operationalization of Research Variables*

Variables	Definition	Indicator	Measurement	Sources
Key Performance Indicators (KPI)	The measure of success of a PTKINs' strategic goals and objectives	Increased access	51 question indicators to measure PTKINs' performance, and ratio data	Diktis Ministry of Religious Affairs
		Improved Service Quality		
		Improved quality of lecturers and education staff		
		Improved quality of research results		
		Improved innovation results		

PTKINs' reputation	Good university governance	Measurement of the strategic management system carried out by Diktis for ranking PTKINs, ratio data	Diktis Ministry of Religious Affairs
	University's performance improvement		
Collective representation of internal and external stakeholders to universities from time to time	Competitive advantages university	The rating measure used by Webometrics to rank global universities, ratio data	Webometrics
	Global recognition university		
	Presence		
	Impact		
	Openness		
	Excellence		

Source: developed for research

### Result and Discussion

PTKINs' ranking based on the Strategy Management System (SMS) can be seen in table 3 as follows.

**Table 3.**  
*PTKINs' Ranking Based on Strategy Management System (SMS) 2016-2018*

NO	PTKINs	SCORE		RANGKING		INFO
		2016	2018	2016	2018	
1	UIN Syarif Hidayatullah Jakarta	72,21	2.705,52	1	2	Up
2	UIN Sunan Kalijaga Yogyakarta	71,23	2.488,69	2	3	Down
3	UIN Maulana Malik Ibrahim Malang	68,06	2.836,61	3	1	Up
4	UIN Sunan Ampel Surabaya	67,60	432,97	4	16	Down
5	UIN Walisongo Semarang	65,12	2.478,00	5	4	Up
6	UIN Alauddin Makasar	63,83	2.133,17	6	7	Down
7	UIN Sunan Gunung Djati Bandung	62,57	2.365,11	7	5	Up
8	UIN Ar-Raniry Banda Aceh	62,25	1.800,95	8	9	Down
9	UIN Sultan Syarif Kasim Riau	62,09	563,12	9	15	Down
10	UIN Raden Fatah Palembang	61,98	1.637,58	10	10	Constant
11	UIN Sumatera Utara Medan	61,90	1.980,24	11	8	Up
12	UIN Raden Intan Bandar Lampung	61,79	1.343,08	12	13	Down
13	UIN Antasari Banjarmasin	60,74	1.233,23	14	14	Constant
14	UIN Sultan Thaha Saifuddin Jambi	59,82	294,44	16	17	Down
15	UIN Imam Bonjol Padang	55,90	2.232,38	21	6	Up
16	UIN Mataram	55,57	1.613,08	23	11	Up
17	UIN Sultan Maulana Hasanuddin	54,39	1.529,58	27	12	Up

Source: Diktis processed in 2019



Table 3 shows that the PTKINs' ranking based on SMS in 2016 and 2018 fluctuated; two PTKINs remained in the same position, seven PTKINs decreased, while eight PTKINs increased. PTKINs that experienced an increase in ranking include: (1) UIN Maulana Malik Ibrahim Malang, ranked 3rd in 2016, rose to rank 1st in 2018, or increased by two levels. The increase was mainly in good university governance and university's competitive advantages, (2) UIN Walisongo Semarang, ranked 5th in 2016, rose to rank 4th in 2018 or increased by one level. The increase, especially in the aspect of indicators of good university governance, and has the highest score compared to other PTKINs, (3) UIN Sunan Gunung Djati Bandung, ranked 7th in 2016, rose to rank 5th in 2018, or increased by two levels. The increase was mainly in the indicator of university's performance improvement (UPI), (4) UIN Imam Bonjol Padang and UIN Sultan Maulana Hasanuddin Banten were PTKINs that experienced a relatively significant increase by 15 levels from the previous year. This increase was due to a rise in indicators of good university governance, university performance improvement, and university's competitive advantages.

While, PTKINs that experienced a decline in ranking, among others: (1) UIN Syarif Hidayatullah Jakarta, ranked 1st in 2016 down to 2nd in 2018. It was due to a decrease in indicators of good university governance; (2) UIN Sunan Kalijaga ranked 2nd in 2016, down to 3rd in 2018 that caused by a decrease in indicators of good university governance, (3) UIN Sultan Syarif Kasim Riau ranked 9th in 2016, down to 15th place in 2018. The decline was caused by a decrease in all SMS indicators, including good university governance, university's performance improvement, university's competitive advantages and global recognition university, (5) UIN Sunan Ampel is the PTKIN that experienced the significant decline in ranking, in 2016 it was ranked 4th and in 2018 down to 14th (or 12 levels degradation). This decline was due to a decrease in all SMS indicators: good university governance, university performance improvement, university's competitive advantages, and global recognition university. Then, the PTKINs' ranking based on Webometrics is described in table 4.

**Table 4.**  
*PTKINs' Ranking Based on Webometrics in 2017-2018*

NO	PTKINs	YEAR		INFO	POINT
		2017	2018		
1	UIN Syarif Hidayatullah Jakarta	3502	3993	Down	-491
2	UIN Sunan Kalijaga Yogyakarta	5976	4183	Up	1793
3	UIN Walisongo Semarang	5528	4393	Up	1135
4	UIN Maulana Malik Ibrahim Malang	4528	4417	Up	111
5	UIN Sunan Ampel Surabaya	4591	4715	Down	-124
6	UIN Sultan Syarif Kasim Riau	5465	4235	Up	1230

7	UIN Sunan Gunung Djati Bandung	5622	5567	Up	55
8	UIN Alauddin Makassar	4859	4994	Down	-135
9	UIN Raden Fatah Palembang	4603	5620	Down	-1017
10	UIN Antasari Banjarmasin	7189	11551	Down	-4362
11	UIN Sultan Thaha Saefudin Jambi	8716	6811	Up	1905
12	UIN Ar Raniry Banda Aceh	11229	8387	Up	2842
13	UIN Sultan Maulana Hasanuddin Banten	17738	15899	Up	1839
14	UIN Mataram	23761	11801	Up	11960
15	UIN Sumatera Utara Medan	13040	10124	Up	2916
16	UIN Raden Intan Lampung	16708	12409	Up	4299
17	UIN Imam Bonjol Padang	20206	22404	Down	-2198

Source: data processed in 2019

Table 4 shows that the PTKINs' ranking based on Webometrics varied from 2017 to 2018. Eleven PTKINs have increased in rank, while six PTKINs decreased. In 2017, five PTKINs were joining 5000 WCU and seven PTKINs in 2018. The

relevance of the KPI, which consists of 51 Key Performance Indicators with PTKINs' reputation as measured by SMS and webometrics ranking can be seen in Table 5 as follows:

**Table 5:**

*KPI relevance with PTKINs' reputation based on SMS ranking and Webometrics*

Performance Indicator	SMS	Info	Web	Info
Number of new students accepted	-0,209	Irrelevant	-0,002	Irrelevant
Number of students receiving BIDIKMISI	0,013	Irrelevant	0,686**	<b>Relevant</b>
Number of students receiving academic and achievement scholarships	0,303	Irrelevant	-0,394	Irrelevant
Number of students receiving Tahfidz Qur'an scholarships	0,045	Irrelevant	-0,315	Irrelevant
Institutional accreditation quality and scores	0,197	Irrelevant	0,665**	<b>Relevant</b>
Percentage of departments with accreditation A	0,15	Irrelevant	0,12	Irrelevant
Number of departments with accreditation A	0,184	Irrelevant	0,714**	Irrelevant
Percentage of departments with accreditation B	0,118	Irrelevant	-0,219	Irrelevant
Number of departments with accreditation B	0,094	Irrelevant	0,028	Irrelevant
Number of departments that apply the IQF curriculum	0,311	Irrelevant	0,128	Irrelevant
Average length of study for undergraduate students	0,463	Irrelevant	0,302	Irrelevant
The average cumulative achievement	0,185	Irrelevant	-0,175	Irrelevant

index of undergraduate students				
Number of accredited national journals, subscribed/accessed	0,277	Irrelevant	-0,305	Irrelevant
Number of international journals subscribed/accessed	0,033	Irrelevant	-0,41	Irrelevant
Number of lecture halls in good condition (meets standard)	0,346	Irrelevant	0,544*	<b>Relevant</b>
Number of laboratories with infrastructure meets the standards	.544*	<b>Relevant</b>	-0,381	Irrelevant
Number of book collections in the library	0,013	Irrelevant	0,697**	Irrelevant
Number of e-book collections in the library	0,068	Irrelevant	-0,432	Irrelevant
Availability of e-library	. <sup>a</sup>	Irrelevant	. <sup>a</sup>	Irrelevant
Number of student activity unit rooms	0,076	Irrelevant	-0,034	Irrelevant
Lecturer workspace area ratio	0,269	Irrelevant	0,203	Irrelevant
Ratio of reading room area to number of libraries	0,273	Irrelevant	0,002	Irrelevant
Number of facilities and infrastructure for the academic community with special needs that meet the standards (disabled, lactation, child care)	0,214	Irrelevant	0,617**	<b>Relevant</b>
The ratio of the area of the worship space to the number of the academic community	0,039	Irrelevant	-0,42	Irrelevant
Percentage of lecturers with doctoral qualifications	0,461	Irrelevant	0,006	Irrelevant
Number of lecturers with doctoral qualifications	0,168	Irrelevant	-0,208	Irrelevant
Percentage of certified lecturers	0,323	Irrelevant	0,127	Irrelevant
Number of certified lecturers	0,286	Irrelevant	0,037	Irrelevant
Number of professors	0,111	Irrelevant	0,611**	<b>Relevant</b>
Number of educational staff receiving master's scholarships	0,344	Irrelevant	0,064	Irrelevant
Number of lecturers participating in international scientific forums	0,427	Irrelevant	-0,257	Irrelevant
Number of certified education staff (doctors, auditors, nurses, laboratories, librarians, and archivists)	0,023	Irrelevant	0,674**	<b>Relevant</b>
Number of researches carried out	0,12	Irrelevant	0,024	Irrelevant
Number of publications in nationally accredited journals (Sinta 2)	0,153	Irrelevant	0,655**	<b>Relevant</b>
Number of publications in internationally accredited journals	0,376	Irrelevant	0,589*	<b>Relevant</b>
Number of registered Intellectual Property Rights (IPR)	0,088	Irrelevant	0,118	Irrelevant

Number of nationally accredited journals managed by university	0,1	Irrelevant	-0,195	Irrelevant
Number of scholarship recipients in the Islamic Sciences department	0,166	Irrelevant	-0,313	Irrelevant
Number of students taking apprenticeship programs to the business/industrial world	0,365	Irrelevant	-0,05	Irrelevant
Number of community service performed	0,146	Irrelevant	0,141	Irrelevant
Percentage of graduates who go straight to work	0,199	Irrelevant	-0,087	Irrelevant
Number of research in collaboration with the business world/industrial world	0,415	Irrelevant	-0,421	Irrelevant
Number of MoUs with international institutions	0,125	Irrelevant	-0,374	Irrelevant
Number of students who won gold medal at national and international levels	0,137	Irrelevant	0,638**	<b>Relevant</b>
Availability of Development Plan/ Strategic Plan/ RKT	0,173	Irrelevant	-0,267	Irrelevant
Percentage of achievement of output volume in RKA-KL	0,222	Irrelevant	-0,265	Irrelevant
Percentage of budget performance achievements in the SMART-DJA application	0,067	Irrelevant	-0,331	Irrelevant
Number of SOPs generated	0,135	Irrelevant	-0,478	Irrelevant
Percentage of nominal decrease in BPK audit findings	-0,059	Irrelevant	0,486*	<b>Relevant</b>
Percentage increase in PNB target	0,287	Irrelevant	0,118	Irrelevant
Number of partnerships in PTKINs funding with government and industry	0,083	Irrelevant	0,496*	<b>Relevant</b>

Source: data processed in 2019

Table 5 shows the relevance of KPI to SMS ranking; only one performance indicator is relevant, i.e., the number of laboratories with infrastructure that meet the standards. The quality of laboratory infrastructure can support the quality of education. According to the author's investigation, "There are many PTKINs who don't pay attention to management in the laboratory, even though the laboratory can be a source of inspiration after studying theory."

Improving the management of laboratory infrastructure that meets standards can improve the quality of learning and ultimately improve reputation (Thomson Reuters and Scopus).

Meanwhile, the KPI that are relevant to the Webometrics ranking are 13 indicators, including "Number of students receiving BIDIKMISI; the quality and score of the institution's accreditation; Number of department accredited A; Number of lecture halls in good condition (meeting

standards); Number of book collections in the library, Number of facilities and infrastructure for academics with special needs that meet the standards (disabled, lactation, child care); Number of professors; Number of certified education staff (doctors, auditors, nurses, laboratory assistants, librarians, and archivists); Number of publications in nationally accredited journals (Sinta 2); Number of students who won gold medal at national and international levels; Percentage of nominal decrease in BPK audit findings; and Number of partnerships in PTKINs funding with government and industry."

So, it can be concluded that the performance indicators of PTKINs, which consists of 51 performance indicators, need to be adjusted. While indicators that are not relevant to improving PTKINs' reputation are eliminated and even need to be added to the main performance that is directly related to PTKINs' reputation, including Number of Guest Lecturers/foreign guests who have visited UIN Walisongo, Number of lecturers participating in the sabbatical/postdoctoral program (abroad), The number of departments offering international programs, increasing the number of professors; Number of internationally accredited departments, Number of lecturers involved in research with international funding / joint research with international funding, Number of patents (HaKI) produced, Number of prototypes required by the industry, Number of R & D prototypes, Productivity/number of reputable international publications. In reality, the PTKINs' performance indicators show that they have not been able to lift the reputation of PTKINs. This can be seen from the absence of PTKINs

included in the WCU ranking based on the QS World Ranking and THES. PTKINs are only included in the Webometrics Ranking lists. Only four of the 55 PTKINs included in the 500 WCU in 2019, such as UIN Syarif Hidayatullah Jakarta, UIN Maulana Malik Ibrahim Malang, UIN Walisongo Semarang, and UIN Sultan Syarif Kasim Riau.

Based on an interview with the Head of Division of Planning Diktis, Directorate of Islamic Higher Education (Interview, 15 October 2018), there is no policy or research on the importance of aligning the performance indicators of PTKINs with the WCU assessment indicators. The performance indicators formulated by Diktis seem to be a top-up policy, not yet adjusted to the condition of the resources owned by each university (PTKIN). Moreover, in 2016, Diktis has set a policy, namely SMS, which is a policy to improve performance and reputation through PTKINs' ranking. There are some differences in the assessment criteria, which causes the indicators to overlap. There are seven programs targetted in the KPI with 51 performance indicators. Therefore, this research aims to align the PTKINs' performance indicators to obtain a more efficient and integrated KPI to improve competitiveness and reputation of PTKINs at the national and international levels.

Based on an interview with the Head of Administrative Subdivision of Diktis of the Ministry of Religious Affairs of the Republic of Indonesia (18 October 2019), "Some of the KPI set by Diktis have been achieved, but the others have not. However, the achievement of the KPI is not the duties and responsibilities of the

Diktis only but requires the participation of all PTKINs in Indonesia. The PTKINs can take some roles. Firstly, translating the Diktis Development Roadmap for PTKINs above into the main elements in the Development Master Plan (Rencana Induk Perencanaan, RIP) for each PTKIN in Indonesia. It can be executed, of course, with various adjustments according to the resources and conditions faced by each PTKIN. Secondly, translating the KPI of Diktis into the KPI of each PTKIN or the Rector's KPI. Of course, it is not only the KPI of Diktis which must be the reference for performance indicators of PTKINs, but also the vision, mission, goals, and core values of each PTKIN, the National Higher Education Standard (SN-Dikti) which is the reference for assessing the feasibility of PT by the Accreditation Board, National Higher Education (BAN-PT), and even quality standards at regional

and international levels. After the PTKINs' performance indicators are structured, it is then brought down to the KPI of the faculty/dean and the KPI of the departments/head of department at each PTKIN to make it more operational/implementative. Thirdly, translating the KPI of PTKIN into concrete and measurable programs at the university, faculty, and departments levels. Of course, this program is arranged according to a priority scale and adjusted to the budget and resources owned by each PTKIN."

**Correlation between KPI and PTKINs' Reputation**

The correlation between KPI and PTKINs' reputation based on SMS and Webometrics ranking is explained in table 6 as follows:

**Table 6**

*Correlation between KPI and PTKINs' reputation based on SMS ranking and Webometrics*

		<b>SMS</b>	<b>Webometrics</b>
KPI	Pearson Correlation	0,156	0,639**
	Sig. (2-tailed)	0,549	0,006
	N	17	17

Source: data processed in 2019

Table 6 shows that KPI is not correlated with PTKINs' reputation based on SMS ranking, while KPI is significantly correlated with PTKINs' reputation based on Webometrics ranking.

The ranking policy issued by Diktis in 2016, i.e., PTKINs' ranking based on SMS, is a response to global rankings to identify and define ambitions and strategies for global ranking requirements so that PTKINs can be included in the top 100 of

the WCU. However, based on the correlation results from computational data, there is no significant relationship between KPI and SMS. For this reason, it is necessary to make adjustments or studies and research on the criteria and important indicators of SMS. It is supposed to not overlap with the KPI and confuses PTKINs that wants to implement the SMS.

Diktis needs to review and conduct an in-depth study on ranking policies based on SMS. Prior to the policy, there are several

questions that must be answered, including how far does Diktis really know and understand about rankings and what do PTKINs measure? What is the PTKINs' standard? Can ranking raise the standard by boosting PTKINs' performance? Is the measurement in accordance with the vision and mission of each PTKIN, in the broader sense, in providing education? Can rankings measure the quality of education at PTKIN? Should students use the ranking to help them decide where to study? Should ranking be used to help determine education policy and resource allocation? Is the ranking an appropriate guide for stakeholders used to recruit employees from alumni? Should PTKINs' policy aim to develop a world-class university or create a world-class system? The SMS-based ranking policy needs to be reviewed, extensively tested, so as not to confuse PTKINs. Statistically, SMS is not correlated with the KPI set by Diktis, so the policy really focuses on building the capacity of world-class universities or on the capacity of the higher education system; in other words, building a world-class higher education system. Today, the only institution that gives an assessment to the universities in Indonesia is BAN-PT (National Accreditation Board for Higher Education) by giving a rank A, B, or C.

In addition to national rankings, university leaders within PTKINs need to know world rankings conducted by international ranking agencies. Higher education institutions worldwide include the Time Higher Education, QS World University Ranking (THE-QS), and the Academic Ranking of World Universities (ARWU). Although there are some differences in the assessment criteria in ranking universities, some institutions focus on the quality of

teaching. Assessments from these institutions must be "clean" from personal interests, transparent, and use indicators that are in accordance with the conditions of each PTKIN. Ranking on Webometrics is based on the number of web publications. This method has many weaknesses, especially from the ranking method. If PTKIN's quality is good but does not have good web publications, the ranking will be low. Therefore, it is necessary to improve the method of assessing the quality of university websites to identify the rankings by WCU. Therefore, in compiling the performance indicator of PTKIN, Higher Education must pay attention to and consider the main performance indicators that refer to the indicators in the WCU. The alignment and adjustment of KPI with credible global university standards, such as QS and THE, will give accurate ranking results and can be used to measure PTKINs' performance and reputation.

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## Conclusion

From the discussion, this study concludes that (1) There is one Key Performance Indicators relevant to PTKINs' reputation based on the strategic management system (SMS) ranking, namely the number of laboratories with infrastructure that meet the standards. Besides, there are 13 KPI relevant to PTKINs' reputation based on a ranking provided by Webometrics World Rankings, including: "Number of students receiving BIDIKMISI, The quality and score of the institution's accreditation, Number of departments accredited A, Number of lecture halls in good condition (meet the standards), Number of book collections in the library, Number of

facilities and infrastructure for academics with special needs that meet the standards (disabled, lactation, child care), Number of professors, Number of certified education staff (doctors, auditors, nurses, laboratory assistants, librarians and archivists), Number of publications in nationally accredited journals (Sinta 2), Number of students who won gold medal at national and international levels, Percentage of nominal decrease in BPK audit findings, and Number of partnerships in funding PTKIN with the government and industry; (2) The correlation between KPI and PTKIN's reputation based on the Webometrics World University Ranking version is significant, while the correlation between KPI and PTKINs' reputation based on SMS ranking is not significant. It means that to measure the reputation of PTKINs, rankings from Webometrics can represent PTKIN's reputation from rankings based on SMS.

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### Recommendation

Based on the results of the study, several recommendations are made: (1) Synchronizing Key Performance Indicators of the PTKINs with WCU standards. So far, the indicators are too many and inefficient and overlapping. It is necessary to be reduced, especially those that are not relevant to WCU standards, and add indicators relevant to PTKINs' reputation; (2) There are problems regarding the implementation of ranking based on SMS as a tool or method for ranking PTKINs because there is no correlation with KPI. So, the Diktis of the Ministry of Religious Affairs needs to study the implementation of SMS in the preparation of criteria used for ranking

PTKINs; (3) PTKINs' ranking towards World Class University now still refers to Webometrics where its ranking system is only Web-based. For this reason, in the future, in compiling KPI, it must refer to the QS university rankings standards and THES ranking system because the research indicators are more substantive for PTKINs to be World Class University; (4) To ensure the continuity of the quality of PTKIN, good university governance is needed.

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