

# Inhibiting Factors for Publishing in Reputable International Journals among Doctoral Students : An Exploratory Mixed Method Study

Agus Purwanto<sup>1</sup>, Jeffri Ardiyanto<sup>2</sup>, Yuli Sudargini<sup>3</sup>

<sup>1</sup>Pelita Harapan University, Indonesia

<sup>2</sup>Poltekkes Kemenkes Semarang, Indonesia

<sup>3</sup>Universitas Negeri Semarang, Indonesia

\*Corresponding author: [aguspurwanto.prof@gmail.com](mailto:aguspurwanto.prof@gmail.com)

**Abstract-** This study aims to explore the inhibiting factors of Indonesian doctoral students in carrying out reputable international publications. This research is a sequential mixed method exploration with qualitative exploration methods and to determine the relationship between the inhibiting factors of publication performance and quantitative methods. This study used a mixed sequential exploratory method. The first step was a qualitative analysis that explored the inhibiting factors for doctoral student publication. Primary data collection used open and unstructured interviews in depth to 7 (seven) doctoral program student participants who were selected and determined using purposive sampling method. The second step is to conduct a quantitative analysis to determine the correlation between inhibiting factors and publication performance. Primary data collection used an online questionnaire with 250 respondents selected using the snowball sampling method and then analyzed using the SmartPLS program. The results of this study indicate that the doctoral program student respondents have several obstacles to publishing in internationally reputable journals such as negative results, lack of funding, long response time, low English language skills, insufficient writing time, limited writing skills, limitations. submission capability. , high publication costs, inadequate facilities, limited journal references, limited technology skills. The novelty of this research is the first research on obstacles in the publication of doctoral students in Indonesia using the Exploratory Sequential Mixed Methods with the scope of a country. This research can serve as a reference for similar research, and further research can be carried out in other countries.

Keywords: Reputable International Journal, Doctoral Students, **Exploratory Mixed Method Study**

## 1. INTRODUCTION

According to Ristekdikti data, the number of doctoral students in Indonesia has increased significantly every year, in 2019 the number of doctoral students was 34,364 students and those who graduated in 2019

were 6,041 students. Indonesia reached first place in Southeast Asia, overtaking neighboring Malaysia, Singapore and Thailand. Indonesia also has more than one hundred thousand researchers who can publish their research results in both national and international landscapes. With the number of universities, Indonesia has more than 4,500 public and private bodies (PDDIKTI, 2020). An international journal with a good reputation in Indonesia has shown a significant increase in the number of publications, namely 33,177 in 2019 (Kuwado, 2019). In accordance with the Circular Number B / 323 / B.B1 / SE / 2019 concerning the Publication of Scientific Work for Undergraduate Programs, Masters Programs and Doctoral Programs which produce the quantity and quality of scientific work publications for undergraduate students, master programs, and doctoral programs. national and international scale programs as an effort to develop science and technology and improve national competitiveness. Doctoral program graduates compile dissertations and papers that have been published in reputable international journals; and graduates of the applied doctoral program prepare dissertations and papers that have been published in accredited national journals with a minimum rank of 3 or received in international journals or works presented or exhibited in international forums. According to the Regulation of the Minister of Education and Culture of the Republic of Indonesia Number 3 of 2020 concerning National Standards for Higher Education the Depth and Extent of Learning Materials in programs, doctors and applied doctors are obliged to take advantage of research results and research results. Society service. graduates from doctoral, applied doctoral, and subspecialty programs have at least mastered scientific philosophy in certain fields of science and skills. Able to discover or develop theories of new scientific ideas, contribute to the development and practice of science and technology that pays attention to and applies humanities values in their fields of expertise, by producing scientific research based on scientific, logical, critical, systematic methodology. and creative thinking; able to carry out interdisciplinary, multidisciplinary or transdisciplinary research, including theoretical and experimental studies in the fields of science, technology, art and innovation as outlined in the form of a dissertation, and papers that have been published in reputable international journals; Being able to choose the appropriate, current, most advanced, and research that benefits humanity through an interdisciplinary, multidisciplinary or transdisciplinary approach, in order to develop and produce problem solutions in the fields of science, technology, arts, or society, based on the results of studies on the availability of internal resources and external; able to compile a research road map with an interdisciplinary, multidisciplinary, or transdisciplinary approach, based on research on the main research objectives and constituents on a broader target; able to compile scientific, technological or artistic arguments and solutions based on a critical view of facts, concepts, principles or theories that can be accounted for ethically scientifically and academically, and communicate them through the mass media or directly to the public.

According to the Law of the Republic of Indonesia Number 12 of 2012 concerning Higher Education, the goal of the doctoral program is to foster and strengthen students to become wiser by increasing their abilities and independence as philosophers and / or scholars, scientists who are cultured and produce and or develop theories through comprehensive and accurate to advance human civilization. A doctoral program is an academic education that is intended for graduate masters or equivalent programs so that they are able to seek, be creative, and or contribute to the development and practice of Science and Technology through reasoning and scientific research. The obligation to publish research by doctoral students in Indonesia in international journals indexed by Scopus is one of the obstacles to student graduation. Not only doctoral students, even lecturers have difficulty penetrating reputable international

journals (mediaindonesia.com, 2019), more than 100 diplomas have not published reputable international journals (Tribunnews.com, 2019). The obligation to publish research through international journals indexed by Scopus appears to be one of the obstacles to graduate doctoral students. Some doctoral students experience problems in publishing reputable international journals, namely busy work, unreachable costs, availability of online journal subscriptions and limited access to reputation.

The Directorate General of Higher Education (Ditjen Dikti) of the Ministry of Education and Culture issued a circular number 152 / E / T / 2012 regarding the publication of scientific papers. The letter, dated January 27, 2012, is addressed to the Chancellors / Chairmen / Directors of State Universities and Private Universities throughout Indonesia. As published on the [www.dikti.go.id](http://www.dikti.go.id) page, the letter signed by the Director General of Higher Education, Djoko Santoso, contains three points which are the graduation requirements for doctoral students to publish their scientific work. It was stated that currently the number of scientific papers by universities in Indonesia is still very low. In fact, only one seventh of the total number of scientific papers from universities in Malaysia. Therefore, this provision aims to increase the number of scientific papers in Indonesia. 1. To graduate from the Bachelor program, you must produce a paper published in a scientific journal. 2. To pass the Masters program must have produced a paper published in a national scientific journal, preferably accredited by the Higher Education. 3. To pass the Doctoral program, you must have produced a paper that is accepted for publication in an international journal. This provision applies from graduation after August 2012. Some time ago it was revealed that the journals of Indonesian tertiary institutions indexed in the database of international journals and research proceedings, such as Scopus and Google Scholar, are still very low. Not only the scientific works of students, the lack of research results from Indonesian researchers published in international research journals.

Provisions for publication in reputable international journals, especially those indexed by Scopus, often become a frightening specter for Doctoral program students. Many think that it is very difficult to penetrate Scopus indexed journals. The obstacles that cause students to fail to be accepted in Scopus indexed journals are more due to students' ignorance about the compatibility of the submitted manuscripts with the scope of the journal. In fact, this is the determining factor whether or not a manuscript is accepted by the chief editor. Manuscripts that are rejected are not necessarily because the quality of the script is poor, but because there is no match between the script and the scope of the journal. Another reason that journal chief editors reject a manuscript is the inability to present the novelty and attractiveness of the research. Writing a script in English is not a major problem because many institutions can help to translate academic English into correct language and also become a proof reader. Old [www.grammarly.com](http://www.grammarly.com), [www.plagscan.com](http://www.plagscan.com), [www.mendeley.com](http://www.mendeley.com), and the like can be used to improve the written script. It takes about 3-6 months to be able to publish a manuscript in a Scopus indexed journal, starting from the stages of finding the right journal, writing the manuscript according to the template requested, the manuscript submission process, the pre-review process by the chief editor, the double-blind peer process. review by reviewers, improvement of manuscripts, decision process for acceptance / rejection, to publication process.

## **2. METHOD**

This research uses a mixed method approach with a sequential exploration design conducted from January 2020 to March 2020. The sequential exploration design is characterized by the collection and analysis of qualitative data in the first phase followed by the collection and analysis of quantitative data in the second phase (Creswell 2014). This research uses exploratory sequential mixed methods. The first stage is a qualitative analysis exploring factors inhibiting the publication of doctoral students. Primary data collection using in-depth interviews with 7 (seven) doctoral program students who were selected and determined using purposive sampling method. Participants selected by criteria have published in reputable international journals. The next step is to conduct a quantitative analysis to get the correlation between the inhibiting factors and the performance of the publication. Collecting primary data using an online questionnaire with 250 respondents who were selected using the snowball sampling method and then analyzed Partial least square using the SmartPLS program.

### Qualitative Phase

In the first phase, this research used a case research approach with a qualitative method. Determination of participants using purposive sampling, non-probability, for this research determined the number of participants as many as 7 doctoral students who have been determined with the criteria of having published articles in reputable international journals. From 7 students who were invited to participate, all students confirmed their agreement to be involved. Participants' ages varied from 35 years to 45 years. The participants were 3 students from Java Island, 1 students from Sumatra, 1 student from Kalimantan, 1 student from Papua and 1 student from Sulawesi. All participants have published an article in a reputable international journal.

Table 1. Participant Profile

Initial	Age	Gender	Location
R1	35	Male	Java
R2	56	Male	Java
R3	34	Female	Java
R4	27	Male	Sumatra
R5	47	Female	Kalimantan
R6	37	Female	Sulawesi
R7	23	Male	Papua

There are three main interview questions based on relevant literature review to get in-depth information about obstacles. Three questions that were asked to all participants namely RQ 1 was "how do you see the policy regarding journal publications before graduating from the doctoral program?" "and RQ 3 is" what recommendations do you want to propose? "Questions focus on Inhibitors to publication and interviews carried out for about 30 minutes. Participant involvement is voluntary, Participant participation is voluntary and interviewed using in Indonesian, for participants who are outside the island are interviewed by telephone. In this research, participants 'names, universities, and other personal information were hidden in the initials, which are pseudonyms to protect participants' confidentiality. All participants were given initials as R1 to R7 for the current research report. The output of this qualitative phase is

determined by the inhibiting factors of doctoral students for publication in reputable international journals which will be defined as variables X1, X2, X2, X3, X4, X5 to Xn. Based on the results of qualitative data reduction obtained independent variables as follows Negative result reviewer (X1) Lack of Funding, (X2) Long Response time, (X3) Low skills in English, (X4) Lack of time to write, (X5) Limiting writing skills , (X6) Limiting submission skills, (X7) High Publication Fee, (X8) Inadequate Facilities, (X9) Limited reference, (X10) Limited Technology skill, (X11) Limited Destinations journal

According to Creswell (2014) Data validity tests in qualitative research include tests of credibility (internal validity), transferability (external validity), dependability (reliability), and confirmability (objectivity). According to Creswell (2014) Testing the credibility of data or trust in data from qualitative research results can be done by extending the observation by re-interviewing some of the participants who have been interviewed, Transferability Testing shows the degree of accuracy or the applicability of the results of the research to the population where the sample was taken, So that other people can understand the results of this qualitative research so that it is possible to apply the results of the research. This test is conducted on other doctoral students who have not become participants. Dependability Testing is when someone else can replicate this research process by conducting an audit of the entire research process by the supervisor. According to Creswell (2014) Conformability Testing is if the research is said to be objective if the research results have been agreed by many people

**Quantitative Phase**

After analyzing the qualitative phase, the next step is the quantitative phase. This second step of this research is quantitative and the method used in this research is a survey method and data collection by distributing The first step in developing the survey was to set the survey instrument based on the analysis of the interview data in qualitative phase, the independent variable is the result from qualitative phase, namely X1, X2, X3, X4, X5 and Xn. Each question item is given five answer options, namely: strongly agree (SS) score 5, agree (S) score 4, disagree (KS) score 3, no agree (TS) score 2, and strongly disagree (STS) score 1. Data collection is done by online questionnaire via google form, then data processing uses partial least square with the SmartPLS program. Respondents in this research were 250 doctoral students who had conducted research publications in reputable international journals, respondents were selected by the snowball sampling method, each respondent helped distribute questionnaires to other respondents.

Table 2. Respondent Distribution

Location	Male	Female	Total
Java	48	34	82
Sumatra	34	23	57
Kalimantan	14	12	26
Sulawesi	16	13	29
Maluku Papua	15	14	29
Bali Nusa Tenggara	12	15	27
TOTAL	139	111	250

Based on the results of qualitative data reduction obtained independent variables as follows Negative result reviewer (X1) Lack of Funding, (X2) Long Response time, (X3) Low skills in English, (X4) Lack of time to write, (X5) Limiting writing skills , (X6) Limiting submission skills, (X7) High Publication Fee, (X8) Inadequate Facilities, (X9) Limited reference, (X10) Limited Technology skill, (X11) Limited Destinations journal and the dependent variable is Publication Inhibitors (Y). So that this quantitative research model can arrange the research framework as follows

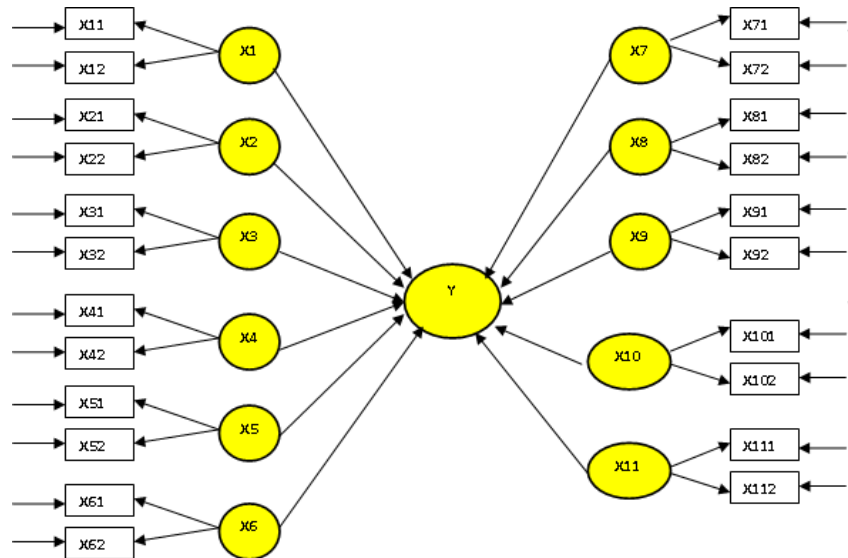


Figure 1. Research Model

X1-Negative Result Reviewer, X2 – Lack of Funding, X3 – Long Respon Time, X4 – Low English Skill, X5 – Lack of Time, X6 – Limiting Writing Skill, X7 – Limiting Submission Skill, X8 – High Publication Fee, X9 – Inadequate Facilities, X10 – Limited Reference, X11 – Limited Technology Skill

The research hypothesis is as follows:

- H1: Negative result reviewer (X1) has positive effect on Publication Inhibitors (Y).
- H2: Lack of Funding (X2) has positive effect on Publication Inhibitors (Y).
- H3: Long Response time (X3) has a positive effect on Publication Inhibitors (Y).
- H4: Low skills in English (X4) have a positive effect on Publication Inhibitors (Y).
- H5: Lack of time to write (X5) has a positive effect on Publication Inhibitors (Y).
- H6; Limiting writing skills (X6) have a positive effect on Publication Inhibitors (Y).
- H7: Limiting submission skills (X7) have a positive effect on Publication Inhibitors (Y).
- H8: High Publication Fee (X8) has a positive effect on Publication Inhibitors (Y).
- H9: Inadequate Facilities (X9) has a positive effect on Publication Inhibitors (Y).
- H10: Limited reference (X10) has a positive effect on Publication Inhibitors (Y).
- H 11: Limited Technology skill (X11) has a positive effect on Publication Inhibitors (Y).



### 3. RESULT

The findings of this research are discussed in two phases namely the first phase is qualitative and the second phase is quantitative as follows:

#### Qualitative Phase Result

In this qualitative phase, There are three main interview questions based on relevant literature review to get in-depth information about obstacles. Three questions that were asked to all participants namely RQ 1 was "how do you see the policy regarding journal publications before graduating from the doctoral program?" "and RQ 3 is" what recommendations do you want to propose? "Questions focus on Inhibitors to publication and interviews carried out for about 30 minutes. The results of the interview in open questions to seven participants were summarized as follows:

#### Negative result reviewer (X1)

There were five participants who gave an opinion that one of the publication Inhibitors in international reputable journal was the negative result reviewer

R6 "... My paper must be totally revised, major revision and I will not proceed and I will withdraw my paper ..."

R5 "... All the papers I submitted were major revision results, lots of notes from reviewers. then I replace with another paper ... "

R7 "... Every paper that I submit can always get a lot of notes from reviewers and need time to revise them ..."

R1 "... I have submitted three papers and all of my papers were rejected by journal reviewers ..."

R2 "... My paper was rejected by reviewers and editors and commented on a lot and I had to revise my total paper ..."

#### Lack of Funding (X2)

There were five participants who gave an opinion that one of the publication Inhibitors in international reputable journal was the lack of funding

R4 "... My money is limited which is a problem for me ..."

R5 "... I have difficulty getting research funding ..."

R3 "... My funds are limited which is my main problem ..."

R7 "... sometimes I can't afford to fund research... "

R1 "... I am experiencing Inhibitors of limited funds to conduct research ..."

#### Long Response time (X3)

There were five participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Long Response time

R1 "... Responses from editors and reviewers sometimes take too long, three to six months ..."

R5 "... International journals have a long review process, sometimes one year gets a response ..."

R2 "... I have been waiting for the results of the review for one year, in my opinion this is too long ..."

R3 "*... the response from the editor in my opinion is very long ... it can take up to 8 months ...*"

R4 "*... I waited too long for the results of the review, then I submitted it to another journal ...*"

#### **Skills in English (X4)**

There were four participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Skill in English

R2 "*... My tone is a reputable international journal requiring good English...*"

R7 "*... all the papers that I submitted were rejected and the major revision was due to poor English...*"

R4 "*... My main problem is my foreign language mastery which is not good ...*"

R5 "*... Some of my papers were rejected because English grammar is not good ...*"

#### **Lack of time to write (X5)**

There were five participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Lack of time to write

R2 "*... I am experiencing time Inhibitors to do research and make paper ...*"

R6 "*... sometimes I don't have time to do research...*"

R7 "*... my time is limited and I have little time to write research papers ...*"

R4 "*... my time is limited which is my main problem in making paper ...*"

R5 "*... I am too busy and have trouble getting research time ...*"

#### **Limiting writing skills (X6)**

There were six participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Limiting writing skills

R1 "*... My constraint is an internationally reputed journal requiring good writing skills.*"

R2 "*... My writing ability is still lacking while reputable international journals require good quality paper.*"

R7 "*... all the papers I submitted were rejected and major revision was due to poor writing skills ...*"

R3 "*... My main problem is my lack of mastering Limiting writing skills ...*"

R5 "*... I still have a lot to learn to write papers ...*"

R6 "*... Some of my papers were rejected because of poor writing skills ...*"

#### **Limiting submission skills (X7)**

There were four participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Limiting submission skills

R1 "*... My obstacle is a reputable international journal that requires good submission skills.*"

R7 "*... all the papers I submitted were rejected and major revision was due to my poor submission skills ...*"

R3 "*... My main problem is that my submission skills are poor.*"

R6 "*... Some of my papers were rejected because submissions were not good ...*"



### **High Publication Fee (X8)**

All participants who gave an opinion that one of the publication Inhibitors in international reputable journal were High Publication Fee

R1 "*... My constraint is a reputable international journal requiring a High Publication Fee.*"

R2 "*... My main problem is High Publication Fee ...*"

R5 "*... publication costs are high and my money is limited which is a problem for me ...*"

R6 "*... I have difficulty paying high publication fees ...*"

R7 "*... sometimes I can't afford to pay publication fees*"

R3 "*... Some of my papers were withdrawn because of the High Publication Fee ...*"

R4 "*... I can't afford the high publication fees ...*"

### **Inadequate Facilities (X9)**

There were six participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Inadequate Facilities

R1 "*... I am experiencing Inhibitors of limited facilities to conduct research ...*"

R7 "*... sometimes I don't have the facilities to make a research paper*"

R2 "*... My facilities are not adequate ...*"

R3 "*... My facilities are limited which is my main problem ...*"

R6 "*... I have difficulty finding research facilities and making research papers.*"

### **Limited reference (X10)**

There were five participants who gave an opinion that one of the publication Inhibitors in international reputable journal was Limited reference

R2 "*... I have a limited reference constraint to do research ...*"

R6 "*... I am having trouble finding references to the latest updates for my paper.*"

R7 "*... sometimes I don't have a reference to do research*"

R3 "*... My reference is limited which is my main problem ...*"

R5 "*... I have difficulty finding research references ...*"

### **Limited Technology skill (X11)**

There were four participants who gave an opinion that one of the publication Inhibitors in international reputable journal was the Limited Technology skill

R1 "*... I am experiencing Limited Technology skills to do research and paper writing ...*"

R7 "*... sometimes I experience Limited Technology skills to make research papers..*"

R4 "*... My limited technology skills are limited which is my main problem ...*"

R6 "*... I have difficulty making research papers because of Limited Technology research skills ...*"

All participants gave answers and all answers from all 7 participants were summarized in the following table as follows:

**Table 3.Data Reduction of Participants Answers**

No	Variabel	R1	R2	R3	R4	R5	R6	R7	Total
X01	Negative result reviewer	V	V	-	-	V	V	V	5
X02	Lack of Funding	V	-	V	V	V	-	V	5
X03	Long Respon time	V	V	V	V	V	-	-	5
X04	Skills in English	-	V	-	V	V	-	V	4
X05	Lack of time to write	-	V	-	V	V	V	V	5
X06	Limiting writing skill	V	V	V	V	V	V	-	6
X07	Limiting submission skill	V	-	V	-	-	V	V	4
X08	High Publication Fee	V	V	V	V	V	V	V	7
X09	Inadequate Facilities	V	V	V	-	-	V	V	5
X10	Limited reference	-	V	V	-	-	V	V	4
X11	Limited Technology skill	V	-		V	-	V	V	5

From the table above, it can be concluded that the negative result reviewer variable is 5 participants, Lack of Funding is 5 participants, Long Response time is 5 participants, Skills in English is 4 participants, Lack of time to write is 5 participants, Limiting writing skill is 6 participants ,Limiting submission skills are 4 participants, High Publication Fee is 7 participants, Inadequate Facilities are 5 participants Limited references were 4 participants, Limited Technology skills were 5 participants.

**Credibility Test**

The next step is to conduct a validity and reliability test with a credibility test carried out with extensive observations, increased persistence in research, triangulation and member checks.

**Triangulation of Time**

Credibility Test with time triangulation was conducted by re-interviewing 2 participants namely R3 and R7 a month later and the following results were obtained:R3 "*... I agree that the factors inhibiting publication in international journals are Lack of Funding, Long Response Time, Skills in English, Lack of time to write, Limiting writing skills, Limiting submission skills, High Publication Fee, Inadequate Facilities, Limited references , Limited Technology ...* " and R7 "*... I also agree and agree the factors inhibiting publication in international journals are Lack of Funding, Long Response time, Skills in English, Lack of time to write, Limiting writing skills, Limiting submission skills, High Publication Fee, Inadequate Facilities , Limited references, Limited Technology ...* "

From the results of the re-interview the results were the same as the results of this research so that this research concluded that it was credible.

**Source Triangulation**

Credibility test with source triangulation is done by reading books and reading references, based on research conducted by Prasojo et al (2019), Okoduwa et al (2018), Julianto (2018), Pardjono et al (2017), Sihite et al (2020), Mokhtari (2020), Noorelahi (2015), Osman (2016) and Dadipool (2020) found that the inhibiting factors of publication in international journals were Lack of Funding, Long Response Time,

Skills in English, Lack of time to write, Limiting writing skills, Limiting submission skills, High Publication Fee, Inadequate Facilities, Limited references and Limited Technology. From the results of several international journal references, the results are the same as the results of this research, so that this research is concluded credible.

### **Member Check**

Credibility Test with member check is done by re-interviewing 2 participants namely R1 and R4 a month later and the following results are obtained:

R3 "... I agree that the factors inhibiting publication in international journals are Lack of Funding, Long Response Time, Skills in English, Lack of time to write, Limiting writing skills, Limiting submission skills, High Publication Fee, Inadequate Facilities, .. ". R7 "... I also agree and agree the factors inhibiting publication in the international journal Skills in English, Lack of time to write, Limiting writing skills, Limiting submission skills, High Publication Fee, Inadequate Facilities, Limited references, Limited Technology ...". R6 "'I agree that the inhibiting factors for publication in international journals are Long Response Time, Limited Writing Skills, Lack of Funding English Skills, Lack of Writing Time, Limited Submission Skills, High Publication Costs" R9" High Publication Costs, Inadequate Facilities, References. Limited, Limited Technology, Inadequate Facilities, I also agree and agree with the inhibiting factors of publication in international journals. Skills in English, Limited writing time, Limitation of writing skills, Limitation of delivery skills " From the results of the member check, the results are the same as the results of this research so that this research concluded that it is credible.

### **Transferability**

In order to understand the results of this qualitative research so that it is possible to apply the results of the research elsewhere, interviews were conducted with 3 other doctoral students namely initial S1, S2 and S3. The results of the interview are as follows: S1 students say "... *"I think this research I can make and develop in the future", "This research can be applied in other places and different times" I can do this research in another place and at another time ...*", S2 students argue "... *I can do this research at another place and time*" ... and S3 Doctoral student said "... *It's easy for me to replicate this research . "I think this research I can make and develop in the future", "This research can be applied in other places and different times".."*. From the interviews of 3 doctoral students it was concluded that this research was transferable.

### **Quantitative Phase Result**

Stages on the testing model of measuring involve convergent validity tests and discriminant validity. While the value of Cronbach's alpha and composite reliability is needed in testing for construction reliability. PLS analysis results could be used to test for research hypothesis if all indicators in the PLS model has met the requirements of convergent validity, discriminant validity, and reliability test.

### **Convergent Validity Testing**

A convergent validity test is done by seeing the value of the loading factor of each indicator towards the construct. In most references, with factor weighing from at least 0.5 is considered to have validity that is strong enough to explain the latent construct (Chin, 1998; Ghazali, 2014; Hair et al., 2010). In this

research, the minimum limit of loading factor that is accepted is 0.5, with the condition of AVE score for every construct, which is  $> 0.5$  (Ghozali, 2014). After passing the process of Smart PLS 3.0, all indicators have met the condition of AVE score above 0.5. The model that is fit and valid from the research could be seen in Figure 2. Therefore, convergent validity from this research model has met all of the requirements. The loading score, Cronbach’s alpha, composite reliability, and AVE in every construct can be seen in Table 2 below:

**Table 4.** Items Loadings, Cronbach’s Alpha, Composite Reliability, and Average Variance Extracted (AVE)

<b>Variables</b>	<b>Items</b>	<b>Loadings</b>	<b>Cronbach’s Alpha</b>	<b>Composite Reliability</b>	<b>AVE</b>
X1- Result Reviewers	X11	0.903	0.922	0.940	0.760
	X12	0.846			
	X13	0.899			
X2 - Lack of Time	X21	0.826	0.935	0.947	0.720
	X22	0.808			
	X23	0.876			
X3 - Long Response Time	X31	0.892	0.912	0.932	0.697
	X32	0.829			
	X13	0.897			
X4 - Low English Skill	X41	0.903	0.922	0.940	0.760
	X42	0.846			
	X43	0.864			
X5 - Lack of Time	X51	0.826	0.935	0.947	0.720
	X52	0.808			
	X53	0.876			
X6 - Writing Skill	X61	0.892	0.912	0.932	0.697
	X62	0.843			
	X63	0.897			
X7 - Limiting Skill	X71	0.903	0.922	0.940	0.760
	X72	0.846			
	X73	0.899			
X8 - High Publication Fee	X81	0.826	0.935	0.947	0.720
	X82	0.808			
	X83	0.876			
X9 - Inadequate Facilities	X91	0.892	0.912	0.932	0.697
	X92	0.834			
	X93	0.897			
X10 - Limited Reference	X101	0.903	0.922	0.940	0.760
	X102	0.846			
	X103	0.899			
X11 - Limited Technology	X111	0.826	0.935	0.947	0.720
	X112	0.808			
	X113	0.876			

***Hypothesis Examination***

The hypothesis test in PLS is also denoted as an inner model test. This test covers a significance test that has a direct and indirect impact as well as how large is the measurement of the exogenous variable impact towards the endogenous variable. To discover the effect of transformational leadership on employee’s performance is through readiness for change as a mediation variable that needs a direct and indirect impact test. The impact test is done by using a T-Statistic test in an analysis model called Partial Least Squared (PLS) with the help of SmartPLS 3.0 software. With the bootstrapping technique, R square value and significance test value can be obtained as shown in Table 5 and Table 6 below:

**Table 5. R Square Value**

	<b>R Square</b>	<b>R Square Adjusted</b>
Publication Inhibitors	0.83	0.079

Based on Table 5 above, the R Square value of Publication Inhibitors is 0.83, which mean the variable of Publication Inhibitors can be explained by X1-Negative Result Reviewers, X2 - Lack of Time, X3 - Long Response Time, X4 - Low English Skill, X5 - Lack of Time, X6 - Limiting Writing Skill, X7 - Limiting Submission Skill, X8 - High Publication Fee, X9 - Inadequate Facilities, X10 - Limited Reference, X11 - Limited Technology Skill variable in the percentage of 83%, while the other has the percentage of 17% clarified by other variables that are not discussed in this research.

**Table 6. Hypotheses Testing**

<b>Hypotheses</b>	<b>Relationship</b>	<b>Beta</b>	<b>SE</b>	<b>T Statistics</b>	<b>P-Values</b>	<b>Decision</b>
H1	X1 -> Y	0.163	0.042	3.845	0.000	Supported
H2	X2 -> Y	0.289	0.058	4.939	0.000	Supported
H3	X3 -> Y	0.716	0.039	5.564	0.000	Supported
H4	X4 -> Y	0.163	0.042	3.845	0.000	Supported
H5	X5 -> Y	0.289	0.058	4.939	0.000	Supported
H6	X6 -> Y	0.716	0.039	1.964	0.000	Supported
H7	X7 -> Y	0.163	0.042	3.845	0.000	Supported
H8	X8 -> Y	0.289	0.058	4.939	0.000	Supported
H9	X9-> Y	0.716	0.039	8.564	0.000	Supported
H10	X10 -> Y	0.163	0.042	2.845	0.000	Supported
H11	X11 -> Y	0.289	0.058	2.939	0.000	Supported

#### **4. RESULT AND DISCUSSION**

Based on the qualitative analysis of 7 participants, it can be concluded that the negative result of the reviewer variable is 5 participants, Lack of Funding is 5 participants, Long Response time is 5 participants, Skills in English is 4 participants, Lack of time to write is 5 participants, Limiting writing skills are 6 participants, Limiting submission skills are 4 participants, High Publication Fee is 7 participants, Inadequate Facilities are 5 participants Limited references were 4 participants, Limited Technology skills were 5 participants. These results complement and strengthen research with qualitative research conducted by Parsojo et al (2019) who found that the factors preventing students from publishing in reputable international journals were lack of funding, long response time, low skills in foreign languages, inadequate of time to write and limiting submission skills. According to Julianto et al (2018) that the factors preventing students from publishing in reputable international journals are low skills in foreign languages, Low Collaborative Networks, Limited references and Limited Technology skills. According to Sihiteet all (2020) who found that factors preventing students from publishing in reputable international journals were lack of funding, low skills in foreign languages, inadequate facilities.

Based on data analysis using quantitative methods the following results are obtained:

##### **H1: Negative result reviewer (X1) has positive effects on Publication Inhibitors (Y).**

The relationship between independent variables X1-Negative Result Reviewer with Public Inhibitors (Y) obtained t-value of 3.845 and p value is 0.000 so that it can be concluded that the Negative result reviewer has a positive effect on Public Inhibitors. These results are the same as the results of research with a quantitative method conducted by Duracinsky et al (2017), Garnet et al (2012) ,Okoduwa et al (2018) and Julianto et al (2018) who found that the Negative result reviewer has a positive effect on Public Inhibitors.

##### **H2: Lack of Funding (X2) has a positive effect on Publication Inhibitors (Y).**

The relationship between independent variables Lack of Funding (X2) with Public Inhibitors (Y) obtained t-value of 4.939 so that it can be concluded that Lack of Funding has a positive effect on Publication Inhibitors. These results are the same as the results of research with a quantitative method conducted by Pardjono et al (2017) and Mokhtariet all (2020) who found that the Lack of Funding has a positive effect on Public Inhibitors.

##### **H3: Long Response time (X3) has a positive effect on Publication Inhibitors (Y).**

The relationship between independent variables Long Response time (X3) with Public Inhibitors (Y) obtained t-value of 5.564so that it can be concluded that Long Response time has a positive effect on Public Inhibitors. These results are the same as the results of research using quantitative methods conducted by Duracinsky et al (2017), Garnet et al (2012) ,Noorelahi et all (2015) and Osman et all (2016) who found that Long Response time has a positive effect on Public Inhibitors.

##### **H4: Low skills in English (X4) have a positive effect on Publication Inhibitors (Y).**

The relationship between independent variables Low skills in English (X4) with Public Inhibitors (Y) obtained t-value of 3.845so that it can be concluded that Low skills in English has a positive effect on



Publication Inhibitors. These results are the same as the results of research using quantitative methods conducted by Julianto et al (2018) and Pardjono et al (2017) who found that Low skills in English has a positive effect on Public Inhibitors.

**H5: Lack of time to write (X5) has a positive effect on Publication Inhibitors (Y).**

The relationship between independent variables Lack of time to write (X5) with Public Inhibitors (Y) obtained t-value of 4.939 so it can be concluded that Lack of time to write has a positive effect on Publication Inhibitors. These results are the same as the results of research using quantitative methods conducted by Mokhtari et al (2020), Noorelahiet all (2015) and Osman et al (2016) who found that Lack of time to write has positive effects on Public Inhibitors.

**H6: Limiting writing skills (X6) have a positive effect on Public Inhibitors (Y).**

The relationship between the independent variable Limiting writing skills (X6) and Publication Inhibitors (Y) obtained t-value of 1.964 so that it can be concluded that Limiting writing skills have a positive effect on Publication Inhibitors. These results are the same as the results of research with quantitative methods conducted by Duracinsky et all (2017), Garnet et all (2012), Noorelahi et all (2015), Osman et all (2016) and Dadipool et all (2020) who found that Limiting writing skills have positive effects on Publication Inhibitors.

**H7: Limiting submission skills (X7) have a positive effect on Publication Inhibitors (Y).**

The relationship between independent variable Limiting submission skills with Publication Inhibitors (Y) obtained t-value of 3.845 so it can be concluded that Limiting submission skills have a positive effect on Publication Inhibitors. These results are the same as the results of research using quantitative methods conducted by Julianto et al (2018), Pardjono et al (2017) and Mokhtari et all (2020) who found that limiting submission skills have positive effects on Public Inhibitors.

**H8: High Publication Fee (X8) has a positive effect on Publication Inhibitors (Y).**

The relationship between the independent variable High Publication Fee and Publication Inhibitors (Y) obtained t-value of 4.939 so that it can be concluded that the High Publication Fee has a positive effect on Publication Inhibitors. These results are the same as the results of research using quantitative methods conducted by Noorelahiet all (2015), Osman et all (2016) and Dadipool et all (2020) who found that the High Publication Fee has a positive effect on Public Inhibitors.

**H9: Inadequate Facilities (X9) has a positive effect on Publication Inhibitors (Y).**

The relationship between independent variables Inadequate Facilities and Publication Inhibitors (Y) obtained t-value of 8.564 so that it can be concluded that Inadequate Facilities have a positive effect on Public Inhibitors. These results are the same as the results of research using quantitative methods conducted by Okoduwa et al (2018), Julianto et all (2018) and Pardjono et al (2017) who found that Inadequate Facilities has a positive effect on Public Inhibitors.

**H10: Limited reference (X10) has a positive effect on Publication Inhibitors (Y).**

The relationship between independent limited reference variables with Publication Inhibitors (Y) obtained t-value of 2.845 so it can be concluded that the Limited reference has a positive effect on Public Inhibitors. These results are the same as the results of research using quantitative methods conducted by Julianto et al (2018), Pardjono et al (2017) and Mokhtari et al (2020) who found that Limited reference has a positive effect on Publication Inhibitors.

**H 11: Limited Technology skill (X11) has a positive effect on Publication Inhibitors (Y).**

The relationship between the independent variable Limited Technology skill with Publication Inhibitors (Y) obtained t-value of 2.939 so that it can be concluded that the Limited Technology skill has a positive effect on Publication Inhibitors. These results are the same as the results of research using quantitative methods by Okoduwa et al (2018), Julianto et al (2018), Pardjono et al (2017), Mokhtari et al (2020), Noorelahi et al (2015), Osman et al (2015) 2016) and Dadipool et al (2020) who found that Limited Technology skills had a positive effect on Publication Inhibitors.

There are three initial things that need to be known in order to publish a manuscript in a Scopus indexed journal, namely: (1) don't write a script before finding the right journal, (2) don't look for a journal before understanding the contents of the manuscript to be written, and (3) don't send the manuscript to journals that are not related to the contents of the manuscript written. The author feels that the process of finding the right journal takes longer than the process of writing the script. Searching for the right journal is carried out through [www.scimagojr.com](http://www.scimagojr.com) and [www.scopus.com](http://www.scopus.com), then digging for more in-depth information on their respective journal pages. The thing that must be done is to send the manuscript to a journal that has the scope of the written script. As a beginner writer, you should look for it from the journal Q4 but have an H-index that is not too small, is still in the status of 'on-going' (not 'canceled'), has published several editions, has a positive citation trend, has an acceptance rate that is not too small (ideally 10% -40%), requires a process that is neither too long nor too fast (ideally 1-6 months), and is not published by certain countries that have many predatory journals. There are paid journals (usually those that are open access or self-financed publisher), and there are also journals that do not ask their authors for publication fees. Both types of journals have their own advantages and disadvantages, the writer of the script should consider the alignment between the journal's publication goals and his future academic career plans. Some suggestions to attract the attention of chief editors and reviewers, namely: (1) the title does not only translate the full dissertation title but must be written briefly, interestingly and intriguing, (2) research and cases written should not be too 'local' because they are considered less useful at the international level, (3) raise new things or become trends in the future, (3) sharply describe problems, methods, and results, (4) do not discuss cases that are too general or are often written by other researchers but research must have novelty, (5) quote several journals that have been published by the journal publisher, (6) use academic English with minimal errors, and (7) follow author's guidance set by journal publishers.

The importance of making a reputable international journal for lecturers and academics. Not only as a prerequisite but this is also done for the future of the Indonesian nation. Reputable international scientific journal publications are also the main evidence of the originality of the research carried out and can

become a track record of researchers as academics. More broadly, researchers can build international networks through these publications. Publication demands made by the academic community of Higher Education have a considerable impact on the awareness of lecturers on the importance of conducting studies, research and writing scientific papers. The development of scientific work in Indonesia is relatively better, especially since the implementation of government regulations, which oblige undergraduate, postgraduate and doctoral students to write reputable international scientific articles as one of the prerequisites for graduation.

Lecturers are of course increasingly demanding to be active in writing in international scientific journals with national and international reputation. An international network that can be built can occur if many scientific journals are used as reference sources and are also quoted in scientific journals of other researchers. In fact, the more scientific journals that are quoted by other researchers, the higher the researcher's reputation as academics will be.

#### Practical Strategies for Writing Reputable International Scientific Journal

To be able to write an international scientific journal requires several ways that are considered not easy enough. From some research that we can see and read, researchers / lecturers often find it difficult to achieve reputable international publications. So it takes a precise strategy in order to write a reputable international scientific journal.

##### # 1. Confident of being able to make quality articles

Self-confidence is a major factor. Self-confidence is built when a person's self-concept is positive. Self-concept is a person's way of looking at himself and how other people perceive him. Lecturers must have a positive self-concept, one of which is through the statement "I can"; "Other people can, I am biased, why not?". If the stimulus is positive and occurs repeatedly, our self-concept also tends to be positive. However, this stimulus must be accompanied by real action, namely continuing to learn and try.

##### # 2. Do your research well (journal-oriented research)

Research is the main material of publication writing activities. Without research, it is difficult to get valid and updated material. Do research in a manner that is always oriented towards international journal publications, so that starting from determining themes, formulating problems, collecting data to making conclusions has been directed to comply with international publication standards

##### # 3. Data according to international publication standards (quality and quantity)

In relation to the requirements for good research, the quality of reputable international scientific journal writings is largely determined by the quality and quantity of data obtained from research. Data quality is determined by the technique of selecting respondents or informants, namely whether the respondent reflects the representation of the phenomenon under study.

##### # 4. Take a look at the journal template and customize it according to the wishes of the editor

Each journal has its own policies regarding writing techniques. Usually put in the section 'Author Guidelines' which is equipped with a template. From experience, compliance with this template is the initial screening for articles that enter the editor's desk.

##### # 5. Use of good English and native speaker logic

Using English for academic writing is usually an obstacle experienced by lecturers who are compiling reputable international scientific journals. To get around this, the lecturer should practice writing skills in English. Lecturers can spend time learning the basics of English grammar and read lots of international journal articles as a learning tool. From reading examples of articles in reputable international scientific

journals, we can recognize and understand the use of words in accordance with the speech habits of native speakers.

## 5. CONCLUSION

The results of qualitative analysis of this research indicate that doctoral student respondents have had several constraints to publish in journals international reputation such as follows negative result reviewer, lack of Funding, long Response time, low skills in English, lack of time to write, limiting writing skills, limiting submission skills, high publication fees, inadequate facilities, limited references, limited technology skills, limited destinations journal. Based on quantitative analysis found that the most influential variables are high publication fees, limiting writing skills and limited technology skills. Novelty of this research is the first research of the publication of doctoral students in Indonesia with the Exploratory Sequential Mixed Methods method with the scope in a country region. This research will be a new reference for similar topic of research, and subsequent research can be conducted in other countries. This research produces novelty which is a new model that is the relationship between the factors that inhibit publication with publication Inhibitors so that it can be an additional reference and can be used as a new reference for further research. Some recommended recommendations are doctoral students can find scholarships, sponsors or donors to overcome the problem of high publication costs and attend paper training to improve competence so that writing skills and technology skills increase. This study has several limitations namely the number of participants for qualitative analysis only 7 students and the number of respondents for quantitative analysis is only 110 students and for further research can increase the number of participants and the number of respondents. For further research, you can continue this research in other countries or other regions with different participants and respondents.

## 6. REFERENCES

1. Creswell, J. W., (2014). Research design: qualitative, quantitative, and mixed methods approaches. Thousand Oaks, CA: Sage.
2. Behl, A., Chavan, M., Dutta, P. and Sheorey, P.A. (2019), "Benchmarking publication metrics for Indian business researchers: Exploring the role of collaboration", *Benchmarking: An International Journal*, Vol. 27 No. 2, pp. 571-591. <https://doi.org/10.1108/BIJ-04-2019-0184>
3. Delgado, J.E. (2021), "University Policies and Arrangements to Support the Publication of Academic Journals in Chile, Colombia, and Venezuela", Sengupta, E. and Blessinger, P. (Ed.) *International Perspectives on Emerging Trends and Integrating Research-based Learning across the Curriculum (Innovations in Higher Education Teaching and Learning, Vol. 36)*, Emerald Publishing Limited, pp. 69-84. <https://doi.org/10.1108/S2055-364120210000036006>
4. Duracinsky, M., Lalanne, C., Rous, L., Dara, A.F., Baudoin, L., Pellet, C., Descamps, A., Péretz, F., & Chassany, O. (2017). Barriers to publishing in biomedical journals perceived by a sample of French researchers: results of the DIAzePAM study. *BMC Medical Research Methodology*, 17 (96), 1-10. <https://doi.org/10.1186/s12874-017-0371-z>

5. [Galyani-Moghaddam, G.](#), [Jafari, H.](#) and [Sattarzadeh, A.](#) (2017), "Publications by faculty members indexed in Science Citation Index and Scopus: an Iranian case study", *The Electronic Library*, Vol. 35 No. 6, pp. 1247-1258. <https://doi.org/10.1108/EL-04-2016-0102>
6. Hair, J. F., Risher, J. J., Sarstedt, M., & Ringle, C. M. (2019). When to use and how to report the results of PLS-SEM. *European Business Review*, 31(1), 2-24. <https://doi.org/10.1108/EBR-11-2018-0203>
7. Hair, J.F., Black, W.J., Babin, B.J., & Anderson, R.E. (2010). *Multivariate data analysis*. Englewood Cliff, NJ: Prentice Hall.
8. Garnet, A., & Mahomed, F.E. (2012). I want to publish but ...: Barriers to publishing for women at a University of Technology. *Perspectives in Education*, 30(2), 81-90.
9. Ghozali I., & Fuad. (2012). *Structural equation modeling, teori, konsep dan aplikasinya dengan program LISREL 8,8*. Semarang: Universitas Diponegoro.
10. Joreskog, K. & Sorbom, D. (2008). *Lisrel 7: A guide to the program and applications* (2nd edition). Chicago:, Inc.
11. Okoduwa, James O. Abe, Blessing I. Samuel, Aimee O. Chris, Richard A. Oladimeji, Olanipekun O. Idowu, Ugochi J. Okoduwa. (2018). Attitudes, Perceptions and Barriers to Research and Publishing among Research and Teaching Staff: A Case Study. *bioRxiv* 347112; doi: <https://doi.org/10.1101/347112>
12. Otto Berman Sihite, Agus Purwanto, Leo Hutagalung, Rosma Indriana Purba, Anggaripeni Mustikasiwi, Juliana Liem, Masduki Asbari. (2020). Interests and Obstacles to Publication of Articles in Reputable International Journals: Exploratory Studies of Doctoral Students at Private Universities in Jakarta. *International Journal of Control and Automation*, 13(02), 176 - 184. Retrieved from <http://sersec.org/journals/index.php/IJCA/article/view/7627>
13. Pardjono, Nuchron, Suro, Sulaeman Deni Ramdani. (2017). ANALYSIS OF FACTORS INHIBITING PUBLICATION PRODUCTIVITY OF SCIENTIFIC STUDENTS OF PPs UNY
  - a. IN THE INDEXED JOURNAL. *Jurnal Dinamika Vokasional Teknik Mesin*. Volume 2 Nomor 2 Oktober 2017 hal 139-147 <https://journal.uny.ac.id/index.php/dynamika/issue/view/1445>
14. Prasajo, Lantip Diatprasajo; Habibi, Akhmad; Sofwan, Muhammad; Mohd Yaakob, Mohd Faiz; Mukminin, Amirul; and Yuliana, Lia, "Barriers to Publication: Stories of Ph.D. Students from Malaysian Universities" (2019). *Library Philosophy and Practice* (e-journal). 3567. <https://digitalcommons.unl.edu/libphilprac/3567>
15. Purwanto, A., Pramono, R., Bernarto, I., Asbari, M., Santoso, P., Saifuddin, M., Hyun, C., Wijayanti, L., Ong, Freddy, & Kusumaningsih, W. (2020). Minat dan Hambatan Publikasi Artikel pada Jurnal Internasional Bereputasi: Studi Eksploratori pada Mahasiswa Doktor di Sebuah Perguruan Tinggi Swasta di Jakarta. *Edumaspul: Jurnal Pendidikan*, 4(1), 219-228. <https://doi.org/10.33487/edumaspul.v4i1.348>
16. Purwanto, Mochammad Fahlevi, Suesthi Maharani, Fauzi Muharomd, Suryanto, Wahyu Setyaningsih, A. Faidi, Al Azhar, Rudy Pramono, Innocentius Bernarto (2020) Indonesian DOCTORAL Students ARTICLE Publication Barriers in International High Impact Journals: A Mixed METHODS RESEARCH . *Systematic Reviews in Pharmacy*, 11 (7), 547-555. doi:10.31838/srp.2020.7.79

17. [Shtovba, S.](#), [Shtovba, O.](#) and [Filatova, L.](#) (2019), "The current state of brand management research: An overview of leaders and trends in branding research over the past 20 years", *The Bottom Line*, Vol. 33 No. 1, pp. 1-11. <https://doi.org/10.1108/BL-08-2019-0106>
18. Very Julianto (2018). Inhibiting Factors Increased Publication Capability in the Psychology Study Program of UIN SunanKalijaga Yogyakarta. *JurnalPsikologiIntegratif Prodi Psikologi UIN SunanKalijaga*, Vol. 6, Nomor 2, 2018, 131-140
19. Wijayanto, S.H. (2008). *Structural equation modeling dengan LISREL 8.8*. Yogyakarta: GrahaIlmu