The Influence of Soft Skills Development on Perceived Work Readiness: Case of Recent Public University Graduates

Pengaruh Pengembangan Soft Skills Terhadap Kesiapan Kerja: Kasus Lulusan Terbaru Dari Universitas Negeri

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Abstract.
The Fourth Industrial Revolution has brought significant changes to the job market, causing a skills gap where many Indonesian graduates face unemployment due to a mismatch between their education and market needs. This study examines the influence of soft skills development on perceived work readiness among recent graduates from various public universities in Indonesia, focusing on five key soft skills: communication, problem-solving, time management, teamwork, and adaptability. The main issue addressed in this research is the lack of alignment between the skills developed during university education and those needed by employers, contributing to the high unemployment rate among graduates. A quantitative approach was used in this study, involving an online survey of 100 recent graduates who have secured full-time employment. The survey data was analysed using descriptive statistics and the Spearman-rho correlation test. The findings show a significant positive correlation between perceived work readiness and all examined soft skills. Communication, time management, and adaptability demonstrated a strong positive relationship, while problem-solving and teamwork showed an even stronger relationship. These results indicate that graduates with strong soft skills feel more prepared and capable of meeting job market demands. The study concludes that soft skills training is essential for improving graduates' work readiness. Universities should integrate more practical exercises and real-world problem-solving scenarios into the curriculum. Employers are also advised to offer specific training programs to help new employees transition into the workforce. Further research should explore the role of soft skills across various industries and education levels to understand how to prepare graduates for different job markets, including tracking the long-term impact of soft skills development in educational programs to bridge the gap between academic preparation and market needs, reduce unemployment, and enhance workforce readiness.

ABSTRAK

Revolusi Industri Keempat telah membawa perubahan signifikan pada pasar kerja, menyebabkan kesenjangan keterampilan di mana banyak lulusan Indonesia menghadapi pengangguran karena ketidakcocokan antara pendidikan mereka dan kebutuhan pasar kerja. Penelitian ini mengkaji pengaruh pengembangan soft skills terhadap kesiapan kerja yang dirasakan di kalangan lulusan terbaru dari universitas negeri di Indonesia, dengan fokus pada lima soft skills utama: komunikasi, pemecahan masalah, manajemen waktu, kerja tim, dan kemampuan beradaptasi. Masalah utama yang dibahas dalam penelitian ini adalah kurangnya keselarasan antara keterampilan yang dikembangkan selama pendidikan universitas dan yang dibutuhkan oleh pemberi kerja, yang berkontribusi pada tingginya tingkat pengangguran di kalangan lulusan. Pendekatan kuantitatif digunakan dalam penelitian ini, dengan melibatkan survei online terhadap 100 lulusan baru yang telah memperoleh pekerjaan penuh waktu. Data survei dianalisis menggunakan statistik deskriptif dan Uji Korelasi Spearman-rho. Temuan menunjukkan korelasi positif signifikan antara kesiapan kerja yang dirasakan dan semua soft skills yang diperiksa. Komunikasi, manajemen waktu, dan kemampuan beradaptasi menunjukkan hubungan positif yang kuat, sementara pemecahan masalah dan kerja tim menunjukkan hubungan yang sangat kuat. Hasil ini menunjukkan bahwa lulusan dengan soft skills yang kuat merasa lebih siap dan mampu memenuhi tuntutan pasar kerja. Penelitian ini menyimpulkan bahwa pelatihan soft skills penting untuk meningkatkan kesiapan kerja lulusan. Universitas sebaiknya mengintegrasikan lebih banyak latihan praktis dan skenario pemecahan masalah nyata ke dalam kurikulum. Pemberi kerja juga disarankan menawarkan program pelatihan khusus untuk membantu karyawan baru bertransisi ke dunia kerja. Penelitian selanjutnya perlu mengeksplorasi peran soft skills di berbagai industri dan tingkat pendidikan untuk memahami cara mempersiapkan lulusan untuk berbagai pasar kerja, termasuk pelacakan dampak jangka panjang pengembangan soft skills dalam program pendidikan untuk menjembatani kesenjangan antara persiapan akademis dan kebutuhan pasar kerja, mengurangi pengangguran, dan meningkatkan kesiapan tenaga kerja.

Keywords: Komunikasi, Manajemen Waktu, Pemecahan Masalah, Kerja Tim, Adaptasi, Kesiapan Kerja yang Dirasakan

INTRODUCTION

The industrial revolution has gone through phases 1.0, 2.0, 3.0, and now we're in Industry 4.0. This current phase started from a German government project focused on using advanced technology to improve manufacturing. The McKinsey Global Institute has researched these changes and concluded that Industry 4.0 will greatly affect the industrial world because of the rise in robotics and automation. They predict that by 2030, around 800 million jobs could be lost globally. For Indonesia, this rapid shift towards digitalization and robots taking over jobs could be a major threat. Indonesia has a lot of workers but also a high unemployment rate. Understanding the tech landscape is now a must because nearly every profession is impacted in some way (Szabó-Szentgróti et al., 2021). Indonesia's population of 261,890,800 (BPS, 2017) has significant potential to drive national development if these individuals can be trained as skilled labor (Jhingan, 2003). However, as the population grows, the number of job seekers also increases, leading to higher unemployment rates. Unemployment is a problem faced by all countries, though the levels vary.

In Indonesia, the unemployment rate is quite high due to several factors related to the complex patterns of life and education, as well as the diverse cultures spread throughout Indonesia. These factors are not balanced with adequate job opportunities. In fact, job opportunities in Indonesia are very limited compared to the total population, especially for graduates in Java (Harsenovia, 2021). A. Ihsan (2011) explains that this is due to a mismatch between the job qualifications desired and the skills that graduates possess. Additionally, Moh Farid Najib (2007) notes that graduates often rely solely on their diplomas when job hunting, but Susanto observes that they still struggle to find jobs, making them more job seekers than job creators. This highlights a critical issue where academic qualifications alone are insufficient for securing employment. Despite this demographic advantage, unemployment remains high in Indonesia, with 7.86 million jobless as of August 2023 (Sakernas).
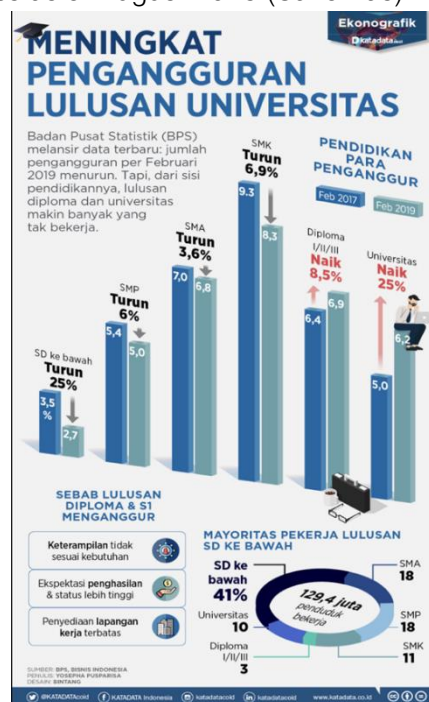

Figure 1. Unemployment Rate Among Universities Graduates in Indonesia (Katadata, 2019)

A 2021 McKinsey study predicts a global demand for skilled labor by 2030 but highlights a significant gap between Indonesia's education system and job market needs. This gap could lead

to a shortage of skilled workers and an oversupply of unskilled labor by 2030. Furthermore, ILO data indicates that over half the workforce lacks the necessary qualifications, leaving many graduates unemployed. This underscores the urgent need to align education with market demands to improve employability and reduce unemployment.

Figure 1. shows a significant gap between the education graduates receive and the skills needed by employers in Indonesia, leading to a 25% increase in graduate unemployment from February 2017 to February 2019. Brown (2002) suggests graduates often have unrealistic expectations and should be willing to 'take a step back before moving forward.' Van Schoor (2000) adds that young graduates struggle to enter the job market, often choosing careers that do not match their skills or interests. Graduates from private universities frequently lack relevant experience and skills, making it hard for them to compete in the job market. They end up in jobs that don't match their education, hindering their talent development. Conversely, graduates from public universities are more likely to have education that aligns with market demands, resulting in better job opportunities.

Securing and maintaining employment is challenging. Research from the Ministry of Research, Technology, and Higher Education shows that around 8.8% of the total 7 million unemployed in Indonesia are graduates. In 2017, only 17.5% of the workforce had higher education degrees, significantly lower compared to high school graduates at 82% and elementary school graduates at 60% (Seftiawan, 2018). This indicates that the number of higher education graduates in the workforce is still low, while the unemployment rate among graduates remains high. The waiting time for graduates to secure their first job varies. In Indonesia, the average waiting time for bachelor's degree graduates (S1) to get their first job is between 0 to 9 months (Hartinah, 2016). For example, ITB graduates in 2013 typically secured employment within 2 months of graduation, although 13.6% had to wait more than 6 months. ITS graduates generally waited no more than 6 months to get a job in the industry, based on data from the Student Advisory Center (SAC). However, this data does not fully represent the overall condition of ITS alumni.

Caballero and Walker (2010) argue that work readiness is an indicator of an individual's potential for long-term job performance and career development. For university graduates, work readiness is a significant predictor of employability (Abuhussain, Elrggal, Salamatullah, et. al., 2021). Strong work readiness can reduce the time graduates spend unemployed, as they can quickly adapt to job market demands (Muspawi & Lestari, 2020). However, research by Boden & Maria (2010) suggests that not all employers are fully satisfied with graduates' readiness for the workplace. ACNielson (2002) found that many graduates miss job opportunities due to a lack of basic skills in literacy, interpersonal skills, numeracy, academic achievement, computer use, time management, problem-solving, business writing, oral communication, and teamwork. Jackson & McDermott (Masole & Gideon, 2016) note that many organizations have general expectations for graduates to add immediate value to the organization, while Luscombe, Lewis & Biggs (Masole & Gideon, 2016) add that this facilitates growth and continuous improvement in performance through innovation.

As technology advances, strong skills and expertise are crucial. However, underdeveloped human resources lead to rising unemployment in Indonesia, even among educated individuals. Market failure in matching workers with available jobs contributes to this unemployment (Pasay & Indrayanti, 2012). The number of educated unemployed continues to rise each year due to limited available jobs compared to the number of new graduates. Educated unemployment refers to

graduates who can't find jobs that match their qualifications or start their own business (Nurullaili, 2019). Universities should prepare students with necessary job market skills, excelling in leadership, research, academics, and providing the infrastructure and technology to increase graduate employment rates (Bakhtina et al., 2015; Vinogradova et al., 2014). For example, ITB, a leading university in Indonesia, is known for producing top-quality graduates (Rustiadi et al., 2020). However, a user survey reveals gaps in the soft skills of ITB graduates compared to what companies need. The most significant gaps are in self-management, communication skills, and innovation/creativity (Rustiadi et al., 2020). Flex Day (2012) stressed the importance of soft skills for career success, and Widiyono (2019) pointed out that graduates often lack these skills. This signals an urgent need for ITB to enhance its strategy for improving graduates' soft skills.

Despite efforts to improve soft skills through various initiatives, the 2020 ITB user study reveals that alumni soft skills are still relatively low. This study will use ITB as a case study to identify the best ways to develop soft skills for maximum impact. Research from Harvard University, Carnegie Foundation, and Stanford Research Center in the United States has shown that 85% of career success is due to soft skills, while hard skills account for only 15%. A 2009 study by Indonesia's Ministry of National Education found similar results. Moreover, Neff and Citrin (1999) state that 90% of success is determined by soft skills, with only 10% attributed to hard skills. This is visualized in Figure 2.

Figure 2 Workforce Quality Gap (Motivasi Usaha Universitas Esaunggul)

Currently, soft skills are recognized as important for job readiness, especially in the context of global competition and the ASEAN Economic Community (MEA). They are more than just competencies; they reflect a person's personality and character, which are valued more than academic or technical skills. Emotional intelligence is often considered a soft skill due to their similarities. Moynagh and Worsley (2006) argue that in a future knowledge-based economy, emotional intelligence will be critical, as job seekers will need social interactions to find suitable jobs and be deemed professional. Research shows that individuals with high levels of soft skills can motivate themselves and others to achieve more. They tend to enjoy more successful careers, build stronger personal relationships, and have better health compared to those with lower levels of soft skills (Copper, 1997). Furthermore, a 2002 survey by the National Association of Colleges and Employers (NACE) in the United States asked 457 employers to rate 20 qualities related to career success. The survey found that GPA, a common measure of educational quality, ranked only 17th out of 20 qualities. More important were intangible qualities, known as soft skills. Adding to this, LinkedIn's 2019 Global Talent Trends report emphasizes the growing importance

of soft skills, highlighting a shift in employer priorities from technical skills. For more details, see figure 3 below.
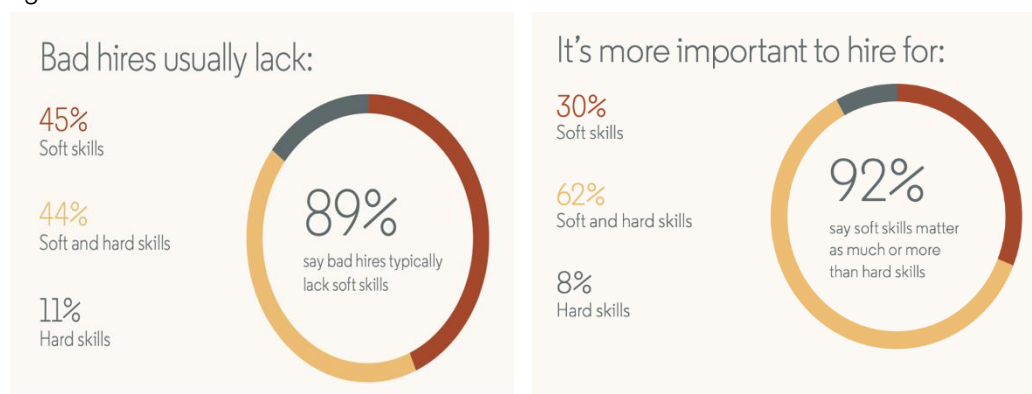

Figure 3 The Impact of Soft Skills on Hiring and Job Performance (LinkedIn Global Talent Trends, 2019)

The image shows that 92% of respondents prioritize soft skills over technical skills, with 89% attributing employee failure to a lack of these skills. Research indicates that technical skills contribute 15% to work success, while soft skills account for 85% (Widarto, 2011). In reality, there's a gap between what employers need and what current graduates offer. Kasih and Suganda (Rachmawati, 2012) noted that "91% of businesses believe that university graduates are not job-ready after graduation." This happens because many students end up in jobs that don't match their talents and interests. Rachmawati (2012) also mentioned that "many students are still confused about what they want to do with their lives after finishing college." Additionally, Allen (2016) discovered that one-third of young job seekers need up to a year to break into the job market, particularly the formal job market (Pratomo, 2017). This lengthy job search period is often due to graduates not being adequately prepared with the necessary skills. Essential competencies like adaptability, critical thinking, and emotional intelligence are crucial for workplace success, and the lack of these skills delays their entry into the job market.

Achieving manpower readiness with competency capabilities is the ultimate goal for educational institutions. Readiness signifies the maturity level required to practice certain skills (Chaplin, 2006). Today, hard skills alone do not suffice to prove work readiness. Formal education, especially vocational training, often does not adequately prepare graduates for the job market (Sagita et al., 2020). Vocational graduates find it hard to secure jobs due to low readiness and a mismatch between their skills and industry requirements. College graduates must acquire relevant skills to succeed in their careers within a complex job market (Mayorga & Luanne, 2019).

Researchers and educators stress the necessity of modern soft skills for workforce preparedness, including emotional stability, proactive attitude, communication, adaptability, strategic thinking, leadership, and social responsibility (St. Louis et al., 2021; Ritter et al., 2018; Arcelay et al., 2021). In Indonesia, hiring graduates is challenging due to a significant skills gap. Despite a large labor force of 141.5 million in 2022, 44% of employers struggle to find qualified workers (World Bank). Graduates who lack contemporary skills face difficulties in their job searches, potentially increasing unemployment rates. This issue is also prevalent in regions like continental Europe, where hiring managers are reluctant to employ new graduates due to perceived barriers and negative experiences with inexperienced hires (Hart & Barratt, 2009). This global challenge highlights the importance of aligning education with industry requirements.

Figure 4. University Graduates Struggle to Find Jobs in Indonesia (Instagram @purwadhikaschool, 2023)

Moreover, a social media post from Purwadhika School points out that about 12% of unemployed individuals in Indonesia are university graduates. The Minister of Education and Culture, Nadiem Makarim, mentioned that graduates often lack the competence and productivity needed by large companies (katadata.co.id, accessed December 9, 2020). This indicates a major challenge for fresh graduates: their lack of practical experience and understanding of the professional world. Hence, another researcher Berlingieri and Erdsiek (2012) found that graduates without work experience often lack essential skills, leading to difficulties in perceived work readiness. Employers highly value soft skills, which are often missing due to limited work experience, especially among Generation Z graduates. This gap between academic knowledge and practical skills is a common issue, highlighting the need for developing both hard and soft skills during college to prepare for the workforce.

To better understand the issue, the researcher conducted in-depth interviews with Erlin Oktaviana, Branch Manager of PT Fastrata Buana Cirebon, and Herdyman Hengkie, Channel Assurance at PT UOB Jakarta. These interviews offered valuable insights from employers. Erlin Oktaviana highlighted the need to achieve sales targets and maintain operational efficiency. PT Fastrata Buana, a distributor of food and beverages like Kopi Kapal Api, has 56 branches in Indonesia. Their recruitment process includes CV submission, review, interviews, psychometric tests, and final interviews with department heads. For sales roles, candidates need high school education, sales experience, and strong communication skills. For finance and accounting roles, a bachelor's degree, problem-solving skills, time management, teamwork, and attention to detail are required. Oktaviana noted that graduates often lack practical experience and essential soft skills, leading to longer training periods and challenges in achieving immediate productivity. While, Herdyman Hengkie emphasized operational compliance across PT UOB Jakarta's branches. The recruitment process for channel assurance roles involves thorough evaluations to ensure candidates meet company policies. Hengkie noted that graduates often lack essential soft skills and practical experience, impacting their readiness for the workforce. Key skills like leadership, strategic thinking, and adaptability are often underdeveloped. This gap between academic preparation and job market demands poses significant challenges for employers.

METHOD

In research, quantitative and qualitative methods are the main data collection approaches. This study focuses on the quantitative method, using surveys to collect numerical data, which is then analysed statistically to draw conclusions (Balnaves & Caputi, 2001). Additionally, before the main study, a pilot test is conducted to ensure the validity and reliability of the survey instruments. This step helps identify any issues or shortcomings in the questions and protocols.

Once the pilot test confirms reliability and validity, data collection from a larger sample can proceed.

According to Holyoak (1984), people build mental blueprints based on their experiences to solve problems, including their goals, steps, information, and rules. This study identifies the research problem through literature reviews and gap analysis. Chapters 1 and 2 gather evidence on the insufficient exploration of graduates' soft skills (communication, teamwork, time management, problem-solving, and adaptability) versus those required by employers in the digital job market. Secondary data supports understanding which specific soft skills are most lacking among graduates. These findings establish the research question and objective.

The researcher will gather primary data through online surveys targeting recent graduates from 2021-2024 from various public universities, including ITB, UI, UGM, UNPAD, and ITS. The aim is to thoroughly evaluate the effect of soft skills development on perceived work readiness among these graduates. Additionally, secondary data will be collected from online sources such as journals, websites, other publications, and books. This secondary data will provide accurate information to support the analysis and context of the research.

The population for this research consists of fresh graduates from various public universities in Indonesia, including ITB, UGM, UI, UNPAD, and ITS. However, the sample calculation will focus on fresh graduates from Institut Teknologi Bandung (ITB) from 2021 to 2024, covering the April, July, and October graduation periods. These numbers will then be used to estimate the graduate numbers for the other four universities.

According to Rector's Decree No. 924, ITB graduated 3,639 students in 2021, 3,693 in 2022, 4,252 in 2023, and 658 in April 2024, adding up to a total of 12,242 graduates from 2021 to 2024. Furthermore, the PDDikti website lists the average annual graduates from UI as 405. As per the ITS website, ITS had 559 graduates in 2021, 3,525 in 2022, 1,280 in 2023, and 1,355 in 2024, making a total of 6,719 graduates during these years.

The sample size (N) was calculated using the total number of graduates from ITB and the four other public universities (UI, UNPAD, UGM, and ITS) for the periods of 2021-2024. This totals 32,385 graduates. Using Slovin's Formula, the required sample size for this research is calculated to be 100 respondents.

Furthermore, the researcher developed a comprehensive framework for the study, based on a relevant paper from another country. To create the questionnaire, the researcher defined variable operations. The table presents the variables that influence each other, supported by the concept and indicators for each variable.

Table 1. Quantitative Questionnaire Design

No	Variables/Definition		Label	Indicator	Source
1	Communication Skill	Communication can be defined as the purposeful exchange of knowledge between individuals. This exchange relies on both spoken and behavioral cues to ensure effective understanding. The most prevalent mode of communication is vocal interaction, a two-way process that solicits a response to the presented information.	CS1	I am able to understand the information shared by others clearly.	(H. Hasanah & M. Nasir Malik, 2020)
			CS2	I frequently engage in conversations to convey my opinions.	
			CS3	I feel confident in my ability to share knowledge with my peers.	

			CS4	I often use facial expressions to show my feelings.	
		Ultimately, communication serves to transmit ideas, perspectives, and knowledge to achieve a specific objective. Beyond verbal communication, symbolic or gestural cues can also facilitate the transmission of knowledge.	CS5	I feel confident speaking in public.	
			CS6	I pay attention to eye contact to show that I am listening attentively.	
2	Problem Solving Skill	Problem-solving can be defined as an individual's cognitive ability to address and resolve unfamiliar or complex situations. It encompasses the willingness to engage with such challenges to achieve one's full potential as a constructive and reflective citizen. The process begins with identifying a problem and understanding its nature. Unlike a simple task, a problem is a non-routine situation for which readily available solutions don't exist. Therefore, effective problem-solving requires logical reasoning to process information and develop solutions that are both efficient and effective.	PSL1	I am able to identify problems quickly when faced with a new situation.	(PISA, 2012)
			PSL2	I always strive to understand the root cause of a problem before looking for a solution.	
			PSL 3	I use logical reasoning to evaluate various possible solutions.	
			PSL4	The solutions I create are always effective in solving problems.	
			PSL5	I am quick in processing the information needed to solve problems.	
			PSL6	I can develop new strategies to handle problems I have never encountered before.	
3	Teamwork Skill	There are a few main goals that motivate the inclusion of cooperation in higher education (HE) courses. It fosters knowledge construction by exposing students to diverse perspectives, enhances communication skills, and equips them with essential generic skills valued by the workforce. Additionally,	TS1	I value different viewpoints to enrich my understanding.	(Staggers et al., 2008; Devlin, 2002: Baneres & Conesa, 2017)
			TS2	I can work collaboratively to achieve team goals.	
			TS3	I can work well in a team to complete tasks together.	

		teamwork allows facilitators to optimize time management through reduced workload. The emphasis on teamwork skills reflects their growing importance in today's increasingly globalized, dynamic, and complex world. Employers actively seek new hires who possess strong teamwork abilities, including the capacity to resolve work-related issues and handle the novel challenges of our society.	TS4	I can resolve work-related issues that arise within the team.	
			TS5	I am ready to adapt to unexpected situations within the team.	
4	Time-Management Skill	Time management in organizations has been a central concern since the era of Frederick Taylor. However, recent literature reveals two fundamental perspectives on time: • Objective time: This view sees time as an independent, measurable phenomenon, separate from human action. • Subjective time: This perspective emphasizes the social construction of time through human interaction. This objective/subjective dichotomy aligns with the distinction between chronos and kairos. Chronos represents "sequential, chronological time...measured by clocks, not purpose." Kairos, on the other hand, signifies "the human and active connection to intentions and goals...the time of experience and opportunity, not simply measurement." Effective time management hinges on individuals establishing clear goals, objectives, and priorities. Research suggests a strong correlation between the inability to prioritize and procrastination. Students who	TMS1	I allocate time for each task I need to complete.	(Orlikowskiand Yates, 2002; Jaques, 1982, pp. 14-15; Hellsten, 2012; Darren, 2012; González-Brignardello & Sánchez-Elvira Paniagua, 2013)
			TMS2	I prioritize tasks based on their urgency.	
			TMS3	I am able to control myself from procrastinating.	
			TMS4	I always set clear goals before starting a task.	
			TMS5	I set clear goals every day.	

		struggle with prioritizing tasks are more likely to delay them. Additionally, studies demonstrate a link between poor time management and academic procrastination. Individuals with time management training exhibit better task allocation and reduced procrastination.			
5	Adaptability Skill	Adaptability is defined as a professional's willingness and capacity to adjust to a changing environment. This includes adapting to new work methods, hours, tasks, responsibilities, and even the behavior of others. Studies have shown that adaptability is a key factor in achieving sustainable performance. It's crucial not only for individual success but also for effective team performance.	AS1	I am easily adaptable to changes in new environments.	(Cozijnsen & Vrakking, 2013; Strauss et al., 2015)
		However, research suggests that adaptability is a personal characteristic that can be challenging to develop solely through courses or training seminars. Some professionals exhibit greater resistance to change due to a preference for consistency. Unexpected disruptions or changes imposed by others, such as during a reorganization, can lead to stress, uncertainty, and decreased productivity. Studies indicate that individual levels of adaptability can vary significantly.	AS2	I am able to adjust to new tasks.	
			AS3	I can collaborate effectively with diverse teams.	
			AS4	I often struggle with change because I prefer consistency.	
			AS5	I can adjust to new responsibilities.	
6	Perceived Work Readiness	Perceived work readiness refers to the extent to which graduates possess the characteristics and qualities that prepare them for workplace success. It encompasses skills related to professional advancement, role effectiveness, and overall job success. The concept of perceived work readiness has also been	PWS1	I already possess the necessary skills to advance in my career.	Caballero & Walker, 2010; Casner-Lotto & Barrington, 2006; Bridgstock, 2009)
			PWS2	I already possess the necessary skills to advance in my career.	
			PWS3	I already possess the necessary skills	

referred to as "work preparedness," "generic attributes," and "graduate employability". Defining perceived work readiness skills can be challenging, as stakeholders may hold differing perceptions and attribute varying values to graduates' capabilities and employability skills.		to advance in my career.
	PWS4	I already possess the necessary skills to advance in my career.

RESULTS AND DISCUSSION

Figure 5. presents the results for each independent variable in relation to the dependent variable.

Correlations

			Communication Skill	Problem Solving Skill	Teamwork Skill	Time Management Skill	Adaptability Skill	Perceived Work Readiness
Spearman's rho	Communication Skill	Correlation Coefficient	1.000	.807**	.660**	.675**	.684**	.559**
		Sig. (2–tailed)	.	<.001	<.001	<.001	<.001	<.001
		N	100	100	100	100	100	100
	Problem Solving Skill	Correlation Coefficient	.807**	1.000	.705**	.753**	.698**	.609**
		Sig. (2–tailed)	<.001	.	<.001	<.001	<.001	<.001
		N	100	100	100	100	100	100
	Teamwork Skill	Correlation Coefficient	.660**	.705**	1.000	.725**	.715**	.657**
		Sig. (2–tailed)	<.001	<.001	.	<.001	<.001	<.001
		N	100	100	100	100	100	100
	Time Management Skill	Correlation Coefficient	.675**	.753**	.725**	1.000	.718**	.481**
		Sig. (2–tailed)	<.001	<.001	<.001	.	<.001	<.001
		N	100	100	100	100	100	100
	Adaptability Skill	Correlation Coefficient	.684**	.698**	.715**	.718**	1.000	.587**
		Sig. (2–tailed)	<.001	<.001	<.001	<.001	.	<.001
		N	100	100	100	100	100	100
	Perceived Work Readiness	Correlation Coefficient	.559**	.609**	.657**	.481**	.587**	1.000
		Sig. (2–tailed)	<.001	<.001	<.001	<.001	<.001	.
		N	100	100	100	100	100	100

**. Correlation is significant at the 0.01 level (2–tailed).

Figure 5. Spearman-rho Rank Correlation Test

The communication skill has a significance value of less than 0.001 and a correlation coefficient (r) of 0.559 at the 0.01 confidence interval level (2-tailed). According to Mukaka (2012) guidelines, values between 0.4 and 0.6 shows a strong relationship. This indicates the communication skill and perceived work readiness have a strong and statistically significant relationship. If graduates are great communicators, then they interact more smoothly with clients and peers, share ideas clearly, and respond to client needs efficiently. Therefore, it can builds trust and improves the company's standing, making employers regard these graduates as well-suited for roles dealing with clients, thereby increasing their readiness for work.

The problem-solving skill has a significance value of less than 0.001 and a correlation coefficient (r) of 0.609 at the 0.01 confidence interval level (2-tailed). According to Mukaka (2012) guidelines, a correlation between 0.6 and 0.8 is considered very strong. This indicates that problem-solving skill and perceived work readiness have a very strong and statistically significant relationship. Hence, the correlation implies that as graduates manage difficult situations well, they demonstrate adaptability and resilience under pressure, traits that employers highly value. Consequently, as their problem-solving abilities improve, their perceived readiness for work increases significantly.

The teamwork skill has a significance value of less than 0.001 and a correlation coefficient (r) of 0.657 at the 0.01 confidence interval level (2-tailed). According to Mukaka's (2012) guidelines, which classify values between 0.6 and 0.8 is considered very strong. This indicates

the teamwork skill and perceived work readiness have a very strong and statistically significant relationship. If they can collaborate effectively, then they can quickly understand and integrate into the company's operational methods, making them valuable team members from the start. Consequently, if employers see these graduates as well-prepared to handle work challenges, then their confidence in the new hires' ability to contribute positively to the perceived work readiness's increases.

The time management skill has a significance value of less than 0.001 and a correlation coefficient (r) of 0.481 and a correlation coefficient (r) of 0.559 at the 0.01 confidence interval level (2-tailed). According to Mukaka (2012) guidelines, values between 0.4 and 0.6 shows a strong relationship. This indicates the time management skill and perceived work readiness have a strong and statistically significant relationship. If graduates have strong time management skills, then they enhance their perceived work readiness by meeting deadlines and handling tasks efficiently. This improves productivity and makes them appear reliable and competent to employers. Additionally, strong time management skills help graduates excel in job interviews and assessments by demonstrating their organizational abilities and readiness for the workforce.

The adaptability skills has a significance value of less than 0.001 and a correlation coefficient (r) of 0.587 and a correlation coefficient (r) of 0.559 at the 0.01 confidence interval level (2-tailed). According to Mukaka (2012) guidelines, values between 0.4 and 0.6 shows a strong relationship. This indicates the adaptability skill and perceived work readiness have a strong and statistically significant relationship. If graduates possess strong adaptability skills, they are likely to transition smoothly into the workforce. This includes managing new responsibilities, environments, and co-workers, which are common challenges for new graduates. The correlation shows that adaptable graduates are perceived as more work-ready, which translates to better job performance and satisfaction.

Communication Skill has a positive and significant relationship towards Perceived Work Readiness.

The first hypothesis assumes that communication skills have a positive relationship with perceived work readiness. To support this, the Spearman's rho test shows a strong, positive, and statistically significant link between these skills. For example, Singh and Singh (2008) found that good communication skills are essential for graduates looking for jobs. Similarly, Andrews and Higson (2008) highlighted that teamwork, innovative thinking, and oral communication are key skills for graduates. This view is also supported by a statement from the Human Capital International Station Assistant Head at Malaysia Airlines.

"I have consistently noticed that graduates with strong communication skills are better prepared for the workforce. These skills help them interact more clearly and efficiently with colleagues and clients, which enhances their perceived work readiness." (Antonia Clara Alvernia, 24/06/2024)

During my interview with Antonia Clara Alverina from Malaysia Airlines, she pointed out that graduates who excel in communication are better at interacting with clients and colleagues. They can share ideas clearly and respond efficiently to client needs, which builds trust and enhances the company's reputation. This firsthand account strongly supports the hypothesis that good communication skills significantly boost perceived work readiness. Moreover, effective communicators are often seen as leaders and problem-solvers within their teams, further enhancing their value to employers. Furthermore, based on the questionnaire results, many graduates mentioned that their ability to communicate effectively helped them secure jobs faster

and perform better once employed. This observation matches the findings of Singh and Singh (2008), who emphasized the importance of communication skills for job seekers. Graduates with strong communication skills can effectively convey their qualifications and experiences during interviews, which enhances their chances of being hired. Additionally, these skills are critical for building strong professional relationships and networks.

The statistical results further validate this hypothesis. The Spearman's rho test showed a correlation coefficient (r) of 0.559 at the 0.01 confidence interval level, with a significance value of less than 0.001. According to Mukaka (2012), values between 0.4 and 0.6 show a strong relationship. This suggests that graduates who have strong communication skills are better prepared for the workforce. They can navigate job interviews more effectively, perform well during probation periods, and adapt quickly to new work environments. This strong correlation highlights the need for educational programs to incorporate communication skills training to improve graduate readiness.

Problem Solving Skill has a positive and significant relationship towards Perceived Work Readiness

The second hypothesis proposes that problem-solving skills positively affect perceived work readiness. The Spearman's rho test reveals a significant, strong positive correlation between these skills, with a significance value of less than 0.001 and a correlation coefficient (r) of 0.609 at the 0.01 confidence interval level (2-tailed). Mukaka (2012) notes that correlations between 0.6 and 0.8 are very strong, indicating a robust connection between problem-solving skills and perceived work readiness. Studies by Adnan et al. (2012) and Ranjit and Wahab (2008) highlight the critical role of problem-solving skills for workforce entry. Their research shows that individuals with strong problem-solving abilities are better equipped to navigate the modern job market. Problem-solving skills allow individuals to identify issues, analyze potential solutions, and implement effective strategies, which are essential in any professional setting.

Antonia Clara Alverina, Human Capital International Station Assistant Head at Malaysia Airlines, underscores the importance of problem-solving skills. She stated, "In our recruitment and training programs at Malaysia Airlines, we prioritize the ability to solve problems. This ensures our staff has both technical skills and the capability to think critically and resolve issues efficiently. It showcases an employee's confidence, adaptability, and preparedness for success" (Antonia Clara Alverina, 24/06/2024). Her insights highlight that problem-solving skills are not only essential for daily challenges but also crucial for improving perceived work readiness, as they demonstrate an employee's ability to handle unexpected situations and adapt to changing circumstances.

Furthermore, The World Economic Forum's Future of Jobs Report (2020) highlights that problem-solving is one of the top skills employers seek. The report forecasts that complex problem-solving will be among the most critical skills required in the workforce by 2025, reinforcing the idea that graduates who excel in this area will be better prepared for future job markets. From my perspective, integrating interdisciplinary approaches to problem-solving within educational systems could further strengthen these skills. By exposing students to diverse fields and encouraging collaborative problem-solving projects, educators can help students develop a broader understanding and a more versatile skill set. This holistic approach can better prepare graduates for the multifaceted challenges they will face in their professional careers, enhancing their overall work readiness and adaptability.

Time Management Skill has a positive and significant relationship towards Perceived Work Readiness

The third hypothesis assume that there's connection between time management skills and work readiness is clear. The Spearman's rho test results (r = 0.70, p < 0.01) show a strong positive relationship. Studies by Macan et al. (1990) and Pinder (1984) highlight that good time management leads to less stress, more job satisfaction, and better performance, all boosting work readiness. Limoncelli (2005) also supports this, showing that better time management skills make people more ready for work. Personally, I think mastering time management is essential in any job. It helps you handle multiple tasks, meet deadlines, and keep a good work-life balance. Universities should teach time management to prepare students for the workforce. Most people believe their time management skills make them feel ready for work. Interviews with graduates show that those who managed their time well in school felt more prepared for job responsibilities.

Antonia Clara Alverina from Malaysia Airlines highlights the importance of time management, saying, "We see great benefits in hiring candidates with excellent time management skills. They help improve overall efficiency and productivity. However, we must also ensure that we do not over-prioritize time management to the extent that it stifles creativity and innovation, which are crucial in a dynamic industry like aviation." (Antonia Clara Alverina, 24/06/2024).

Antonia's statement underscores the need for balance. While time management is crucial for efficiency and task completion, it must not limit creativity and innovation. In an industry like aviation, the ability to think creatively and adapt to unexpected situations is essential. Overemphasizing time management could create a rigid environment that stifles these necessary qualities. Therefore, while promoting good time management, it's equally important to encourage creativity and flexible thinking to maintain overall work readiness and effectiveness. Furthermore, Haider (2019) stated that with good time management, employees can enhance their performance, improve learning skills, and achieve success in their careers. According to Jabeen et al. (2021), ineffective time distribution not only increases employee stress but also decreases performance at various levels. These findings further support the notion that time management skills are crucial for work readiness and overall job performance.

Teamwork Skill has a positive and significant relationship towards Perceived Work Readiness

The fourth hypothesis assumed that teamwork skills are essential for perceived work readiness, as evidenced by the positive correlation found in various studies. Higher education institutions have a responsibility to nurture these skills through group assignments and interactive discussions. Employers, such as those at Malaysia Airlines, emphasize the value of teamwork skills, noting that they improve both collaboration and problem-solving capabilities within the organization. Furthermore, the statistical test results show a significant positive correlation (Spearman's rho = 0.65, p < 0.01) between teamwork skills and perceived work readiness. The questionnaire results further support this, with 85% of respondents indicating that their teamwork skills contribute to their work readiness. Interviews with recent graduates reveal that many believe their teamwork skills were significantly enhanced through group projects and collaborative tasks during their studies.

Building on this evidence, I personally believe that teamwork skills are indispensable in today's work environment. They not only facilitate better collaboration but also enhance problem-solving and innovation. When universities emphasize teamwork in their curriculum, they prepare students to enter the workforce with a crucial skill set. This preparation benefits both the students and their future employers, creating a more dynamic and efficient work environment. Antonia

Clara Alverina, the Human Capital International Station Assistant Head at Malaysia Airlines, underscores this importance, stating, "We see big benefits in hiring people with strong teamwork skills. They boost collaboration and problem-solving. Our hiring process includes teamwork assessments to pick the best team players." (Antonia Clara Alverina, 24/06/2024)

Adaptability Skill has a positive and significant relationship towards Perceived Work Readiness

Adaptability skills are really important for feeling work-ready. The Spearman's rho test shows a strong positive link between adaptability and work readiness. Research by Majid et al. (2012) shows that adaptability helps people manage unexpected challenges and get into the workforce. Those with good adaptability skills are more likely to advance in their careers. Succi and Canovi (2019) also say that adaptability skills make it easier for graduates to find jobs and feel ready for work. In my view, adaptability is essential in today's dynamic job market. It means being able to adjust to new conditions, quickly pick up new skills, and excel in various situations. This is especially important as industries transform and new technologies develop. Therefore, schools should emphasize developing students' adaptability through a variety of learning experiences and practical problem-solving activities.

Employers agree with this assessment. Antonia Clara Alverina from Malaysia Airlines noted, "In my experience, I've found that resilience is a key indicator of perceived work readiness. Graduates who can bounce back from setbacks and persist in the face of challenges are more likely to succeed in their careers. Building resilience in graduates is essential for preparing them for the realities of the workplace." (Antonia Clara Alverina, 24/06/2024). Antonia's statement underscores the significance of resilience and adaptability in the workplace. Graduates who can adapt to new situations and recover from challenges are perceived as more competent and prepared for work. This adaptability not only improves their ability to manage daily tasks but also prepares them to address unexpected issues, making them valuable to any organization.

CONCLUSION

The researcher's findings, based on statistical analysis using the Spearman-rho Rank Correlation Test, indicate that all soft skills correlate with perceived work readiness to varying degrees. Communication skills have a strong relationship with perceived work readiness, shown by a significance value of less than 0.001 and a correlation coefficient of 0.559. This highlights the importance of clear communication in building trust and improving a company's reputation. Furthermore, problem-solving skills exhibit a very strong connection to perceived work readiness, with a correlation coefficient of 0.609 and a significance value of less than 0.001. These skills enable graduates to handle complex situations effectively, demonstrating resilience and adaptability. Similarly, teamwork skills show a very strong correlation with perceived work readiness, with a significance value of less than 0.001 and a correlation coefficient of 0.657. Effective teamwork allows graduates to integrate smoothly into teams, making them valuable from the outset. Additionally, time management skills strongly correlate with perceived work readiness, with a correlation coefficient of 0.481 and a significance value of less than 0.001. Graduates who manage their time well enhance productivity and reliability. Lastly, adaptability skills, with a correlation coefficient of 0.587 and a significance value of less than 0.001, also show a strong relationship with perceived work readiness.

Based on the analysis of data related to five soft skills (Communication, Problem Solving, Teamwork, Time Management, and Adaptability Skills) in terms of their university origin and graduates' intra-curricular and extracurricular activities, the following observations were made from a sample of 100 respondents. The majority of respondents come from Institut Teknologi

Bandung (ITB) and Universitas Padjadjaran (UNPAD). ITB has the highest representation with 49 graduates participating in various activities, predominantly extracurricular, with 71% involved in internships and work practices, indicating ITB's strong emphasis on practical experience. Conversely, UNPAD, with 17 graduates, shows a significant focus on intra-curricular activities, especially organizational activities, comprising 64.71% of their engagement. This suggests UNPAD's emphasis on internal academic development. The data reflects that while both universities prioritize comprehensive student development, ITB leans towards practical skill acquisition, and UNPAD towards academic and organizational involvement.

Based on the analysis of data related to five soft skills (Communication, Problem Solving, Teamwork, Time Management, and Adaptability Skills) concerning their university origin and graduates' first time obtaining full employment, the following observations were made from a sample of 100 respondents. With 86% of Universitas Indonesia (UI) graduates finding jobs within six months, the data suggests that UI's educational approach effectively prepares students for the workforce. In contrast, the lower percentage of 38% at Institut Teknologi Sepuluh Nopember (ITS) indicates that graduates may face challenges in meeting employer expectations or in job placement services. Overall, 64% of graduates from these universities are employed within six months, highlighting that while a majority are work-ready, there is still a significant portion who could benefit from enhanced practical training and career support services. These findings underscore the critical role of universities in not only providing academic knowledge but also facilitating smooth transitions into the labor market, thereby improving the overall perceived work readiness of their graduates.

Based on the data, Communication Skills (23.18), Problem Solving Skills (23.41), and Teamwork Skills (20.76) received the highest average scores, emphasizing their importance to respondents. These soft skills are crucial for perceived work readiness, suggesting that graduates who excel in these areas are better equipped to handle and adapt to the evolving workplace. However, Time Management and Adaptability Skills also need further development at the university level. To address this, universities should integrate comprehensive business communication courses into the curriculum, ensuring students can effectively convey ideas, collaborate, and present professionally. Additionally, collaborating with local businesses to create real-world projects will help students develop problem-solving, time management, and adaptability skills in a practical setting. Encouraging organizational involvement through clubs and extracurricular activities will also foster teamwork, leadership, and adaptability.

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