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The case of employed accountants in Mindanao: Effect of COVID-19 pandemic on salary

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ABSTRACT

This study aims to identify the group of accountants affected by the COVID-19 Pandemic through salary reduction and what group assistance should be focused on in terms of financial aid. A total of 366 accountants from Mindanao participate in the study. A survey questionnaire was utilized to collate demographics and the effect of the COVID-19 Pandemic on the salaries of Mindanao Accountants. The cross-tabulation between variables is utilized to determine the age, employer's industry, certifications or licenses, and salary range greatly affected by COVID-19, comparing it with the two-way ANOVA test to study their association. This was tested to determine if COVID-19 affected the Mindanao accountants and resulted in salary reductions. This paper discovered that accountants in Mindanao are affected by the COVID-19 Pandemic with a negative impact on the salaries of accountants aged 46 and above, employed in the academic sector or earning P35,000–P39,000, regardless of whether they are certified practicing accountants (CPA) or Non-CPA with or without other certifications or licenses. Also, the study revealed a significant association between the employment effect of COVID-19 and the industry group of Mindanao Accountants compared to the COVID-19 impact on salaries. Recommending for pandemic responses to accountants be grouped based on their industry.

1. Introduction

The COVID-19 Pandemic has negatively impacted many nations globally, with around 562.4 million individuals and 6.4 million deaths as of July 2022 (Kaye et al., 2021). With limited preparations, many government agencies embraced numerous strategies to contain the spread of COVID-19 (Osewe, 2021). Some of these strategies include the imposition of partial or complete limitations to social activities, commonly known as lockdowns, limiting local and international travels, observing social distance, and practicing self-hygiene such as wearing masks and disinfecting (Faria de Moura Villela et al., 2021). Many accountants have already used new technologies yet are facing many challenges, especially cybersecurity issues due to lesser security on data and increasing job insecurity, leading to dramatic changes in the accounting profession (Jabin, 2021). A study shows that 3 million opted to exit the labor force, and an additional 5 million were unemployed based on the Labor Force Survey in April 2020 (De Borja, 2021).

The subject at hand is whether COVID-19 has had a negative impact on Filipino accountants' incomes and which group of accountants the government, including public and private entities, should focus on if financial help is necessary to make up for accountants' financial losses. While research has been done on the impact of the COVID-19 Pandemic on salaries generally, less research has been done on the particular accounting profession, particularly in the case of Mindanao, Philippines (Rinaldi, 2021).

While some researchers claim that COVID-19 have negatively affected the compensation of accountants, other authors also believe that it depends on their groups by age, industry, licenses, or salary range.

Many studies have been conducted on the impact of COVID-19 on remunerations. Still, based on my research efforts, almost no research was conducted

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specifically for Mindanao accountants. Hence, this paper is performed to determine the groups of accountants affected by COVID-19 in terms of their salary as to their age, industry, license, and salary ranges, including the association of these variables to the COVID-19 effect. This research will assist the regulating body of Mindanao Accountants, including various government agencies and public and private institutions, in identifying groups of accountants facing financial consequences in a pandemic like COVID-19. Descriptive statistical analysis will be used to determine the groups affected by COVID-19. Whereas, to identify the association of the variable, an inferential statistical analysis will be used. This research output will expand the literature and strengthen this area's hypothesis materials.

2. Review of related literature

2.1. The accountancy profession now and then

The accounting profession has experienced a drastic change over the past decades (Yoon, 2020). Rapid globalization transformed the accounting profession from purely paper-based to technologically driven (Surendar and Rathnakar, 2019). The key drivers of this change include mass production, increased competition among accounting firms, advances in information technology, saturation in the audit service market, pressures on audit service partners, globalization, and the ever-changing regulatory environment (Holtzman, 2004). With these transformations, the quality of information has become one of the most significant concerns in recent times that can have an unfavorable effect on the user of the financial reports and lead to the transition of financial and accounting services (Abdelraheem et al., 2021). The role of professional accountants is becoming increasingly important as it contributes to the emerging business partner roles of accountants through varying organizational needs (Robalo and Costa, 2017).

2.2. Accountants as employed and self-employed

Like any other profession, accountants could be employed or self-employed (Jackson, 2020). The prevalence of dependent self-employment ranges from 9 percent of total employment in Portugal, 8 percent in Italy, Greece, and Romania, to one percent in Denmark and Sweden, and two percent in Belgium, Estonia, France, and Germany. However, it is not significantly associated with specific demographic and socio-economic groups (e.g., genders, age groups, educational levels). It is significantly associated with various organizations, occupations, and sectors (William and Lapeyre, 2017). In 2016, about 40.84 million, or 94.6 percent of the labor force in the Philippines, were employed (William and Lapeyre, 2017). Employment distribution reflects those of the working age population. LFPR–NCR, CALABARZON, and Region III accounted for 37 percent of all employment and, together with West Visayas and Central Visayas, have 53 percent of total work (ILO, 2017).

2.3. Accountants and factors affecting their salaries

Despite the competition within the accounting profession, it was observed that there were still negative connotations on accountants' salaries. One reason accountant is employed is to receive a salary as their source of income, but the amount received is not uniform throughout the different industries (Jackson, 2020). These differences may be attributed to age, licenses obtained, and industry. The general salary at all levels with accounting-related occupations, except for managers and supervisors, has gradually decreased (Hidalgo, 2021).

Meanwhile, labors can obtain higher salaries by earning professional career-related licenses. It was also mentioned that personality affects income (Denissen et al., 2018); age causes income inequality (Hungerford, 2020); and gender also contributes to the pay gap (Terada-Hagiwara et al., 2018). Aside from professional background and educational certifications, salary structures in the Philippines are determined by other factors, including the type of industry/sector an employee is contracted with (Bonacini et al., 2021).

2.4. COVID-19 effect on age group of accountants

Approximately 25% no longer work in January 2021, affecting both young and older adults (Suleman et al., 2021). In Europe, an observed mean loss rate of 10%-16.2% during the lockdown period, and more than 50% are changing operation hours (Palomino et al., 2020). Given the observed negative impact of COVID-19 on the workforce, it is a tremendous challenge for Filipino accountants to survive and maintain the provision of quality services amidst the Pandemic (ILO, 2017).

2.5. COVID-19 effect on salary-range group

The COVID-19 Pandemic has exposed the increasing gap in salary inequality among many employees (Park and Inocencio, 2020). A survey on the effect of COVID-19 on a range of income, classified as upper income, middle income, and lower income, shows that those adults receiving minor payments have suffered the most wage cuts (Parker et al., 2020). One effect of the COVID-19 lockdowns was the decrease of the income level by 90%, which affected 97.33% of the respondent's livelihood, resulting in to decrease in their income level (Fattah et al., 2022). Another article says that the Hospitality industry, a low-earning salary group, is suggested to have a disproportion effect caused by the COVID-19 Pandemic (Aharon et al., 2021).

2.6. COVID-19 effect on industry group of accountants

Due to the COVID-19 Pandemic, many accelerated their digitalization efforts to address challenges in the computer era, which also poses accountants to provide solutions to companies using information technologies (Jabin, 2021). A shift in the academe sector has been seen due to the closure of many academic institutions, affecting many individuals in the education sector (Alshurafat et al., 2021). Moreover, wage disparity between public and corporate accounting is proven to affect the quality of the information provided to various clients (Clark et al., 2021).

2.7. Accountants and the COVID-19 pandemic

One recent phenomenon which greatly affected the Philippine economy is the spread of COVID-19 worldwide. Given the preceding statement, one will ask: Are employed accountants affected by the COVID-19 Pandemic? This leads to several economic problems, especially for the workforce, including the accountants. The COVID-19 Pandemic has significantly influenced several accountants who have no other options than to create changes in their routine job while facing the challenges of adapting to the emerging demands of their expertise (Papadopoulou and Papadopoulou, 2020). COVID-19 has contributed to many changes in the working landscape of millions of employees who now have options to work from home, which may continue post-pandemic (Oakman et al., 2020). This is brought about by the effect of the COVID-19 Pandemic on the accounting arena.

3. Research methods

3.1. Research design

The researcher used the purposive sampling technique. The technique chooses employees who meet specific criteria to represent a set of sound samples. In this method, judgment is used to select a sample that is most relevant to the purpose of the study. The total number of respondents reached 366 samples using a survey questionnaire conducted through Google. All respondents were working in Mindanao at the time the survey was initiated.

The set of criteria at the time the survey was conducted includes the following:

1. The respondents must be employed in any accounting-related field; and
2. The respondent's employer and employment location must be within Mindanao.

3.2. Research respondents

A total of 366 samples were involved in the study. Approximately 69.2% of the respondents earn less than P25,000, while 30.8% earn at least P25,000. As to age, Table 1 shows that the majority of the respondents are 21–30. Also, a more significant portion of the respondents is from the Private Sector, composing 63.4% of the responses, followed by Government, Public Practice, and Academe, respectively. Moreover, the respondents are 49.2% Non-certified practicing accountant (CPA), 36.3% CPA only, 8.7% Non-CPA with another professional license, and 5.7% CPA with another professional license.

Table 1: Indexed data distribution

Variables	f	%
A. Entire group	366	100
B. Salary range		
Less than 10,000	30	8.2
10,000–14,000	80	21.9
15,000–19,000	72	19.7
20,000–24,000	71	19.4
25,000–29,000	39	10.7
30,000–34,000	21	5.7
35,000–39,000	9	2.5
40,000–44,000	10	2.7
45,000–49,000	15	4.1
50,000–above	19	5.2
C. Age range		
21–25	186	50.8
26–30	129	35.2
31–35	31	8.5
36–40	8	2.2
41–45	4	1.1
46–above	8	2.2
D. Industry		
Academe	17	4.6
Government	67	18.3
Private	232	63.4
Public practice	50	13.7
E. Certification/license		
CPA only	133	36.3
CPA with another professional license	21	5.7
Non-CPA	180	49.2
Non-CPA with another professional license	32	8.7

3.3. Research instrument

In this study, a survey questionnaire using google forms was used as a research instrument. The survey questionnaire was divided into three parts: the basic profile in the initial section, work-related details in the second part, and COVID-19-related details in the final part. The first part contains the respondents' age and names (optional). Moreover, the second part shows the location, industry of the employer, licenses, and salary of the respondents. Finally, the last part contains the respondents' responses on whether COVID-19 affected their employment and wages.

The researcher used Facebook as the primary medium of communication with the respondents. Due to the Pandemic and discouraging physical contact, the researcher communicated with accountants through Facebook and Facebook pages, mainly composed of Accountants in Mindanao.

3.4. Data analysis

In this study, cross-tabulation and Two-Way ANOVA Tests were used. Cross-tabulation gives good

information about the relationship between the variables. A two-way ANOVA is used to compare groups' mean differences to understand the interaction between two independent and one dependent variable (Iskandar et al., 2016).

4. Results and analysis

This section provides the problem statement's presentation, analysis, and interpretation. The discussion focuses on determining the association of the COVID-19 effect on remunerations of the Mindanao Accountants and identifying the age, industry, certificate holders, and salary group of accountants significantly impacted by COVID-19 in the Mindanao Region.

4.1. COVID-19 response

To define the consequence of the COVID-19 Pandemic, respondents are asked whether the COVID-19 Pandemic has affected their profession as an accountant and if the effect includes a reduction in their salaries in any form.

4.1.1. Overall analysis

Table 2 shows the Mindanao Accountants affected by COVID-19 and Table 3 for the Mindanao Accountants facing salary distortion brought by COVID-19. Table 2 reveals that 52.2% responded that they were not affected by the COVID-19 Pandemic. In comparison, 47.8% of the respondents disclosed that they were affected by the COVID-19 Pandemic. The result shows that the COVID-19 Pandemic significantly contributed to the challenges faced by the Mindanao Accountants.

Table 2: Accountants affected by COVID-19 pandemic

Response	f	%
Yes	175	47.8
No	191	52.2

Meanwhile, Table 3 shows that 41.7% of the respondents have no salary reduction during COVID-19. Furthermore, 58.3% of the respondents disclosed that a salary reduction happened during the COVID-19 Pandemic. The result revealed that the COVID-19 Pandemic had significantly affected the salary received by the Mindanao Accountants inflicted COVID-19 Pandemic.

Table 3: Accountants affected by COVID-19 pandemic through salary reduction

Response	f	%
Yes	102	58.3
No	73	41.7

4.1.2. By age

Fig. 1 exhibits the effect of COVID-19 on Mindanao Accountants through salary distortion classified by their age range. Most respondents aged 21–35 and 46 and above disclosed their salaries lessened during the COVID-19 Pandemic. Meanwhile, the age range 36–40 is equally affected and unaffected by COVID-19 through salary reduction. However, the survey shows that a big chunk of the Mindanao Accountants in the age range 41–45 have not experienced lowering salaries during the COVID-19 Pandemic.

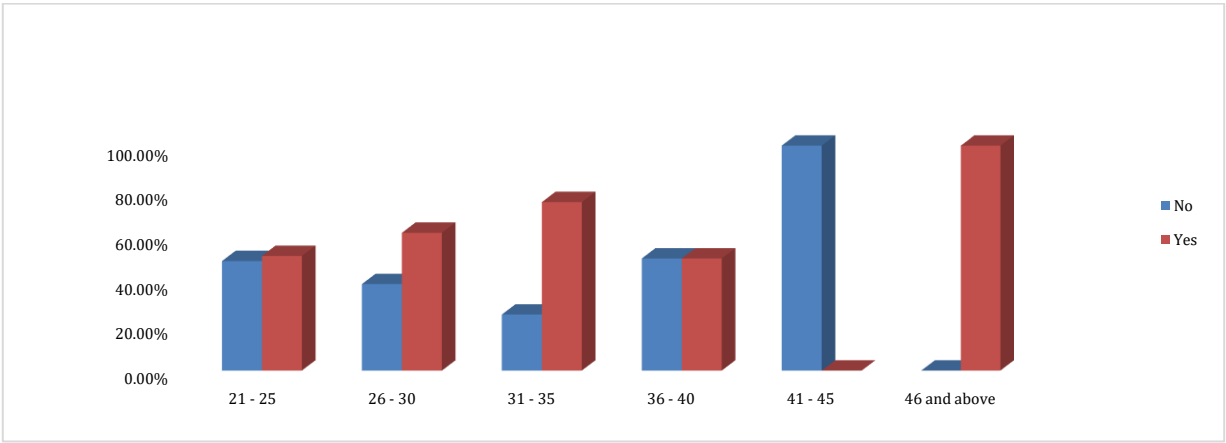

Fig. 1: Salary effect of COVID-19 by age

Comparing the (1) age classification and (2) COVID-19 employment effect to the COVID-19 effect on accountants' salaries, using the two-way ANOVA test in Table 4, the p-value was higher than the standard alpha value of 0.05. Hence, the null hypothesis that the (1) age and (2) COVID-19 effect on employment is independent of the COVID-19 effect on salaries is accepted, resulting in having no significant association of (1) age and (2) COVID-19 employment effect to COVID-19 salary effect.

4.1.3. By industry

Fig. 2 presents the COVID-19 effect on the Mindanao Accountants through the decrease in salaries classified by their industry groups. Fig. 2 reveals that Mindanao Accountants in the academe and private sector experienced a salary reduction during the COVID-19 Pandemic, while the rest of the industry group are mainly experiencing no decline in salary during the COVID-19 Pandemic.

Table 4: ANOVA test result–age*pandemic effect on employment (Dependent variable: Pandemic effect on salary)

Source	Type III sum of squares	df	Mean square	F	Sig.
Corrected model	29.679[a]	11	2.698	20.383	<.001
Intercept	164.680	1	164.680	1244.079	<.001
Age	1.182	5	.236	1.787	.115
Pandemic effect on employment	4.216	1	4.216	31.848	<.001
Age*pandemic effect on employment	1.043	5	.209	1.576	.166
Error	46.859	354	.132		
Total	1137.000	366			
Corrected total	76.538	365			

a: R squared=.388 (adjusted R squared=.369)

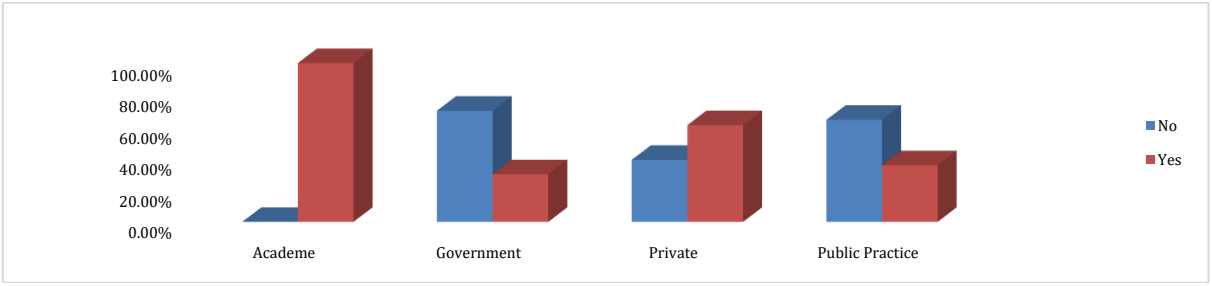

Fig. 2: Salary effect of COVID-19 by industry

In Table 5, using the comparison of (1) industry classification and (2) COVID-19 employment effect to the COVID-19 effect on accountants' salaries, the two-way ANOVA test revealed that the p-value was lower than the standard alpha value of 0.05. Therefore, the null hypothesis that the (1) industry group and (2) COVID-19 effect on employment is independent of the COVID-19 effect on salaries is rejected having a significant association of (1) industry group and (2) COVID-19 employment effect to COVID-19 salary effect.

This indicates that the government must concentrate on responding to the needs of the Mindanao Accountants in the academe and private sector, considering the employment income challenges working for employers under the two-industry group during the COVID-19 era. The two-way ANOVA test also suggests using the accountants' industry to identify groups needing COVID-19 pandemic financial assistance.

4.1.4. By salary range

Furthermore, Fig. 3 exhibits Mindanao Accountants with diminished employment income from the COVID-19 Pandemic analyzed by their salary range. Mindanao Accountants with salary ranges of less than P14,000, P20,000–P39,000, and P45,000 and above-experienced salary reductions during the COVID-19 Pandemic. Meanwhile, salary ranges of P40,000–P44,000 are on equal footing. However, despite the challenge, Mindanao Accountants' earnings of P15,000–P19,000 are dominantly immune to salary reductions.

Contrasting the (1) salary range classification and (2) COVID-19 employment effect to the COVID-19 effect on accountants' salaries, using the two-way ANOVA test, the p-value was higher than the standard alpha value of 0.05 as shown in Table 6. Consequently, the null hypothesis that the (1) industry group and (2) COVID-19 effect on employment is independent of the COVID-19 effect on salaries is accepted, resulting in having no significant association between (1) salary range group and (2) COVID-19 employability to COVID-19 salary effect.

4.1.5. By professional license

In addition, Fig. 4 describes the influence of the COVID-19 Pandemic in terms of the employment income of the Mindanao Accountants. Non-CPAs with or without other professional licenses seem, in the majority, to have a large share of respondents with salaries negatively impacted by the COVID-19 Pandemic. Mindanao Accountants who are CPAs with no other professional license were also likely affected by COVID-19 in terms of their wages. Meanwhile, CPAs with additional professional license seems to be on equal footing.

Table 5: ANOVA test result–industry*pandemic effect on employment (Dependent variable: Pandemic effect on salary)

Source	Type III sum of squares	df	Mean square	F	Sig.
Corrected model	32.251[a]	7	4.607	37.244	<.001
Intercept	350.116	1	350.116	2830.222	<.001
Pandemic effect on employment	7.453	1	7.453	60.247	<.001
Industry	3.400	3	1.133	9.161	<.001
Pandemic effect on employment*industry	1.108	3	.369	2.986	.031
Error	44.287	358	.124		
Total	1137.000	366			
Corrected total	76.538	365			

a: R squared=.421 (adjusted R squared=.410)

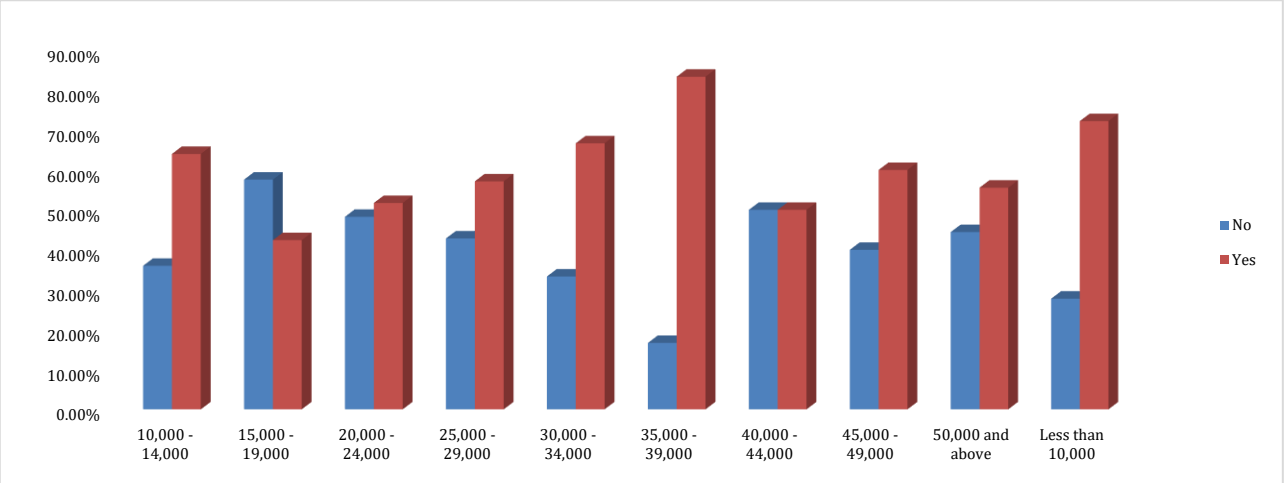

Fig. 3: Salary effect of COVID-19 by salary range

Table 6: ANOVA test result–salary range*pandemic effect on employment (Dependent variable: Pandemic effect on salary)

Source	Type III sum of squares	df	Mean square	F	Sig.
Corrected model	29.517[a]	19	1.554	11.431	<.001
Intercept	506.041	1	506.041	3723.635	<.001
Pandemic effect on employment	14.924	1	14.924	109.817	<.001
Salary range	.945	9	.105	.772	.642
Pandemic effect on employment*salary Range	1.101	9	.122	.900	.525
Error	47.021	346	.136		
Total	1137.000	366			
Corrected total	76.538	365			

a: R squared=.386 (adjusted R squared=.352)

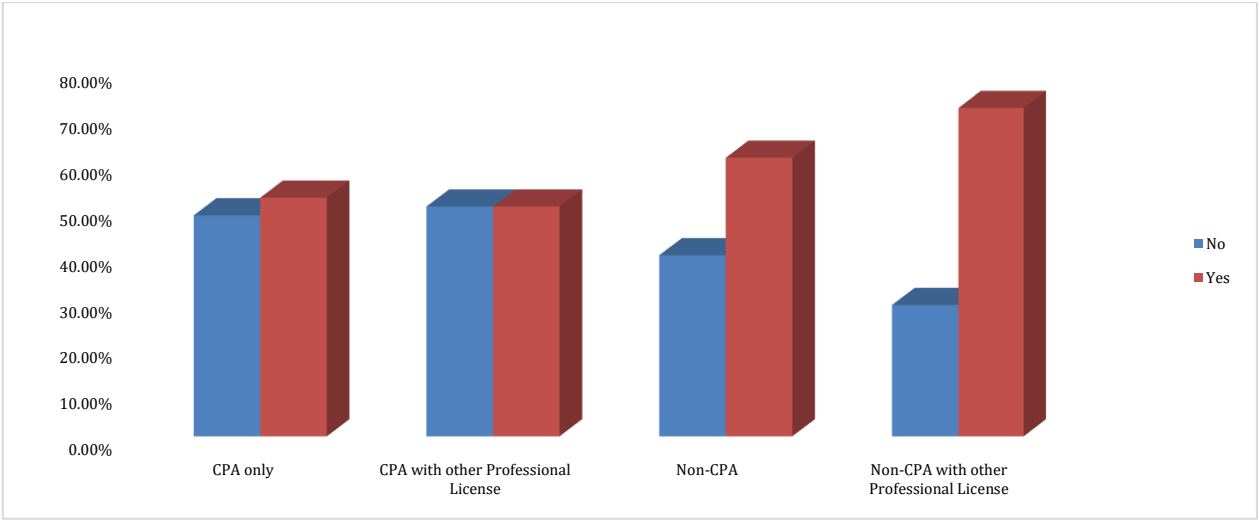

Fig. 4: Salary effect of COVID-19 by professional license

In Table 7, using the (1) license group and (2) COVID-19 employment effect on the COVID-19 effect on accountants' salaries, using the two-way ANOVA test, the p-value was higher than the standard alpha value of 0.05. Thus, the null hypothesis that the (1) license group and (2) COVID-19 effect on employment is independent of the COVID-19 effect on salaries is accepted, resulting in having no significant association between (1) license range group and (2) COVID-19 employment to COVID-19 salary effect.

Table 7: ANOVA test result–salary range*pandemic effect on employment (Dependent variable: Pandemic effect on salary)

Source	Type III sum of squares	df	Mean square	F	Sig.
Corrected model	28.236[a]	7	4.034	29.897	<.001
Intercept	484.014	1	484.014	3587.364	<.001
Pandemic effect on employment	11.813	1	11.813	87.552	<.001
License	.513	3	.171	1.268	.285
Pandemic effect on employment*license	.511	3	.170	1.262	.287
Error	48.302	358	.135		
Total	1137.000	366			
Corrected total	76.538	365			

a: R Squared=.369 (adjusted R squared=.357)

5. Conclusion

This paper discovered that accountants in Mindanao are significantly affected by the COVID-19 Pandemic, negatively impacting the salaries of accountants aged 46 and above, employed in the academe sector or earning P35,000–P39,000, regardless of whether they are CPA or Non-CPA with or without other certifications or licenses. Despite the never-ending demand for accountants in Mindanao, it was proved that accountants are not immune to the risks that the Pandemic may bring.

Also, the study suggests that government agencies, including private and public companies, focus on aiding Mindanao Accountants based on the industry to where they belong.

Compliance with ethical standards

Conflict of interest

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

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